



# Education Development Charges Background Study

Niagara Catholic District School Board  
(Incorporating Addendum of July 17, 2020)

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## List of Acronyms and Abbreviations

Acronym	Full Description of Acronym
DSBN	District School Board of Niagara
NCDSB	Niagara Catholic District School Board
EDC	Education Development Charge
GFA	Gross Floor Area
GSR	Grade Structure Ratio
JK	Junior Kindergarten
LEDA	Localized Education Development Agreements
LPAT	Local Planning Appeal Tribunal
MCR	Municipal Comprehensive Review
NOTL	Niagara-on-the-Lake
OTG	On the Ground
OMB	Ontario Municipal Board
O. Reg.	Ontario Regulation
SK	Senior Kindergarten





## Foreword and Acknowledgements

Section 257.61 (1) of the *Education Act* states that, “Before passing an education development charge by-law, the board shall complete an education development charge background study.” Section 257.61 (2) of the Act and section 9 of Ontario Regulation 20/98, as amended, provide the information that must be contained in the background study. This report contains the background study for the Niagara Catholic District School Board (NCDSB). The information contained within this report pertains to separate education development charge by-laws for the Former Lincoln portion and Former Welland portion of the Board’s jurisdiction.

This report, the EDC Ministry of Education Forms Submission and all assumptions contained herein were prepared during October 2019 to March 2020. Much of the enrolment projections, residential forecasts and financial assumptions were prepared using studies or information prior to the COVID-19 pandemic. The implications and effects of this pandemic may have impacts on the estimates contained in this report and the school board and consultant will provide updates to this report and stakeholders as required and as necessary.

Note that this report contains an addendum dated July 17<sup>th</sup>, 2020 that reflects updated per acre site acquisition costs. These updated costs increased the proposed EDC rates in both the former Lincoln and Welland bylaw areas. The previous proposed residential EDC rate in the former Lincoln bylaw area was \$418 per residential unit and the revised proposed rate is \$486 per unit. In the former Welland area, the previous proposed residential EDC rate was \$383 per unit and the new revised proposed rate is \$391 per residential unit. Revised text and EDC forms have been included in this amended report.



The consultant would like to acknowledge and thank the staff at the NCDSB for their work, time and effort over the past several months. Staff from the Board provided invaluable input and assistance throughout the EDC process.

The consultant would also like to thank Mr. Brad Teichman of the firm Overland LLP, legal counsel for the Board.



# Executive Summary



# Executive Summary

Education development charges (EDCs) are a revenue source, for school boards that qualify, to purchase and develop land for new schools. EDCs are meant as a funding mechanism for boards that are experiencing a growth-related accommodation need in their jurisdiction. In order to enact a by-law, the board must follow certain processes and guidelines as required by provincial legislation. This background study fulfills certain requirements while providing the background necessary to understand and determine the education development charge.

The general authority for school boards to impose EDCs is provided by Division E of Part IX of the *Education Act*. Ontario Regulation 20/98, as amended, provides the requirements necessary to determine an EDC. In addition, the Ministry has published a set of EDC Guidelines to assist boards with the EDC process.

The jurisdiction of the Niagara Catholic District School Board (NCDSB) consists of the Region of Niagara including the Cities of Niagara Falls, Port Colborne, St. Catharines, Thorold and Welland; the Towns of Fort Erie, Grimsby, Lincoln, Niagara-on-the-Lake and Pelham; and the Townships of Wainfleet and West Lincoln. For the purposes of calculating EDCs, the Board's jurisdiction is divided into two regions and each region must have a separate EDC by-law as per section 257.57 of the *Education Act*. The first region is based on the boundary of the former Lincoln County (Niagara-on-the-Lake, St. Catharines, West Lincoln, Lincoln and Grimsby) and the second region is based on the boundary of the former Welland County (Niagara Falls, Port Colborne, Thorold, Welland, Fort Erie, Pelham and Wainfleet).

## **Before an EDC by-law can be passed, school boards must ensure they:**

- Demonstrate that their elementary or secondary enrolment on a jurisdiction-wide basis is greater than the elementary or secondary Ministry-approved On-The-Ground capacity or for Boards that have had a previous by-law, that their EDC reserve fund is in a deficit position;
- Prepare a background study meeting the requirements of the legislation;
- Hold required legislated public meetings; and
- Receive written Ministry approval of certain estimates such as the projected number of students and school sites.



## The NCDSB is eligible to renew its existing by-laws on the basis of:

- **Reserve Fund Qualification** – The Board has a deficit in the EDC reserve funds and outstanding financial obligations in each of its EDC regions.

*The Board intends to hold a statutory public meeting to inform the public as to the new proposed EDC by-laws. The Board intends to hold such a meeting in the late summer or early fall of 2020 as part of a regularly scheduled Board meeting and will consider passage of the EDC by-laws at an additional Board meeting in the fall of 2020. Further details will be provided by official Board notice.*

**Please note that due to the current situation regarding COVID-19, currently scheduled meetings assume a best-case scenario when daily activities and business can resume. Public consultation methods will need to be re-evaluated during the course of the study in order to align with public health measures regarding COVID-19 at that time. As such, public consultation methods may be subject to change.**

Demographic projections form an important component of the EDC analysis. The residential dwelling unit forecast is used both to project pupils from new development and to determine the final quantum of the residential charge. The residential forecasts used in this analysis are consistent with the most recent area forecasts that were available at the time of study preparation. The number of net new units projected in the jurisdiction for the 15 years in the EDC analysis totals **40,588**, with **19,240 (47%)** in the Former Lincoln portion and **21,348 (53%)** in the Former Welland portion. The total net estimated non-residential board-determined gross floor area to be constructed over 15 years from the date of by-law passage is **3,974,829 (1,816,111** within Former Lincoln and **2,158,718** within Former Welland).

The number of growth-related pupils is based on the aforementioned residential forecast and pupil yields have been derived from Statistics Canada custom tabulated data and historical board enrolment information. Pupil yields are mathematical representations of the number of school-aged children that will be generated by particular dwellings. The total growth-related pupils must be offset by any available pupil places that are not required by existing pupils of the Board. These calculations were done for the Board on a review area basis to determine the total net growth-related pupil places.





The 15-year growth projection analysis estimates a total of 1,671 elementary net growth-related pupils and 780 secondary net growth-related pupils for the NCDSB across the jurisdiction. From those estimates, 797 elementary and 366 secondary net growth-related pupils are expected in the Former Lincoln portion and 874 elementary and 414 secondary net-growth-related pupils are anticipated in the Former Welland portion.

Once the net growth-related pupil place requirements have been determined, it is necessary for the Board to decide the number of new schools that will be built to accommodate that need. The EDC legislation provides a table that relates pupil place requirements to school site sizes. The table, as well as a description and methodology, is provided in the background study. The study also provides information on the approximate timing, size and location of the proposed new schools/sites.

The EDC analysis projects that the NCDSB will require a total of three new elementary sites – one in the Former Lincoln portion (ERA11 – Grimsby/Lincoln) and two in the Former Welland portion (two within ERA03 – Niagara Falls South). Two of these sites are currently in the process of being purchased. A detailed summary of the site requirements can be found in each by-law region's Form G in Appendix A.

One of the final steps of the EDC process involves translating the land requirements to actual land costs. In this case, land values were derived from appraised values for the two school sites the Board is currently in the process of purchasing/making offers on. For the Lincoln/Grimsby site, land was valued at between \$1.1 million and \$1.5 million per acre and in Niagara Falls, land was estimated at between \$700,000 and \$800,000 per acre. Similar to many areas in Ontario, the cost to acquire land has been increasing in the region. Due to the uncertain nature of the housing and economic markets at the time this report was prepared, land acquisition costs have not been escalated.

The costs to prepare and develop a school site for school construction are also EDC-eligible costs. The assumed site preparation costs are based on historical data and the rates contained in the 2015 EDC report and escalated to current dollars. A site preparation cost of \$53,974 per acre has been assumed for the NCDSB in this study. Site preparation costs are escalated to the time of site purchase at a rate of 3.1% per year.



The total net land costs (acquisition and servicing costs), as well as study costs, must be included by the Board to determine the final net education land costs. The NCDSB's total net education land costs are estimated to be **\$17,708,778** on a Board-wide basis.

The Former Lincoln total net education land costs are estimated to be **\$9,351,426** which includes a deficit balance of **\$7,075,088** in the existing EDC reserve fund that was added on top of the total costs.

The Former Welland total net education land costs are estimated to be **\$8,357,353**, which includes an existing EDC reserve fund deficit of **\$3,128,536** that was added on top of the total costs.

On the basis of the aforementioned net education land costs and net new unit forecasts, the analysis resulted in a proposed EDC rate of **\$486 per dwelling unit** for the residential charge in Former Lincoln. The new proposed EDC rate for Former Welland is **\$391 per dwelling unit** for the residential charge. The charges contained herein are based on a uniform rate for all types of development, with a 100% residential allocation and applicable jurisdiction-wide charge for each previously mentioned region in the Region of Niagara.

Over the last several years, there have been amendments made to the legislation that governs EDCs. In particular, the EDC rates were “frozen” in 2018 for a short time, while the Ministry of Education reviewed the legislation and public feedback. As a result of the Ministry review, certain changes were made, and EDC rates are now phased in. The phase-in calculation is dependent on the Board’s existing or most recent EDC charge and the new EDC rate that is calculated in the new EDC background study.

Residential EDC rates can be increased by no more than \$300 or 5% (whichever is greater) of the existing or most recent residential EDC rate and can increase by that amount once per year until the “maximum” rate is achieved. The “maximum” rate is the Board’s new proposed EDC rate. Similarly, on the non-residential side, EDC rates can be increased by no more than \$0.10 or 5% (whichever is greater) of the existing or most recent non-residential EDC rate and can also increase once per year until the “maximum” rate is achieved (the maximum being the new proposed rate in the new EDC background study).

The existing in-force EDC rates for the NCDSB within Former Lincoln are **\$186** per residential unit, and **\$172** per residential unit within Former Welland. This means that



their new proposed residential EDC rate can increase by a maximum of \$300 over the existing rate. The new proposed rates are not more than \$300 over the existing rates and as such, upon passage of new by-laws, Former Lincoln EDC residential rates would equal \$486 per unit and Former Welland would equal \$391 per unit.



# Report



# Chapter 1

## Introduction





# 1. Introduction

## 1.1 Background

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Education development charges (EDCs) are a revenue source, for school boards that qualify, to purchase and develop land for new schools. EDCs are meant as a funding mechanism for boards that are experiencing a growth-related accommodation need in their jurisdiction. In order to qualify for EDCs, it is necessary for school boards to meet certain “triggers.”

School boards no longer have the ability to implement property taxes to fund education costs and now rely on a system of per-pupil grants established by the Ministry of Education. The grants are set out to cover expenses such as teacher salaries, textbooks, heating of schools, renewing schools, building schools, etc. EDCs are meant to fund the acquisition and development of growth-related school sites outside this grant envelope. EDCs are based on a formulaic approach that looks at three main areas – enrolment projections to determine need, the number of school sites necessary to meet need, and the costs related to the purchase and development of those school sites.

The EDC may be levied by a school board on both residential and non-residential developments, subject to certain exemptions which are outlined in the legislation. Division E of Part IX of the *Education Act* is the legislation responsible for governing the EDC. Ontario Regulation (O. Reg.) 20/98, as amended, provides guidelines and requirements on the qualification process for a school board as well as the specifics on calculating the charge. The charges are collected at building permit issuance on behalf of the school board by the local area municipality to which the by-law applies.

As mentioned earlier, not all school boards are eligible to implement EDCs due to qualification triggers that must be met. To qualify, there are two triggers that can be met. One trigger is that the board's total projected enrolment for the five-year period following expected by-law passage must exceed the board's Ministry-rated On-The-Ground capacity on either the elementary or secondary panel.

The other qualification trigger deals with unmet financial obligations regarding the purchase and development of growth-related school sites. If the school board has an existing EDC by-law in place and they can demonstrate that there are existing



outstanding financial obligations, the school board will automatically qualify for a subsequent by-law. The *Education Act*, specifically section 257.54, gives school boards the ability to pass EDC by-laws.

“If there is residential development in the area of jurisdiction of a board that would increase education land costs, the board may pass by-laws for the imposition of education development charges against land in its area of jurisdiction undergoing residential or non-residential development.”

School boards are responsible for providing school sites and can do so through such limited revenue sources as selling surplus school sites, revenue from leasing sites, entering into joint use agreements with other school boards or public/private partnerships and the imposition of EDCs – thus making EDCs an important revenue source.

## 1.2 Existing By-Laws

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This EDC background study has been prepared for the Niagara Catholic District School Board (NCDSB) in consideration of renewing their EDC by-laws within the Former Lincoln and Former Welland portions of their jurisdiction. The NCDSB's current in-force by-laws came into effect on June 22, 2015 and are based on 100% recovery of costs from residential development.

The current EDC rates are shown below in Table 1.1. Within the Former Lincoln area, the EDC is currently \$186 per residential dwelling unit; the EDC is currently \$172 per residential dwelling unit within the Former Welland area.

Table 1.1: Current In-Force EDC By-laws for the NCDSB

School Board	In-force Date	Area of By-law	% Residential/ Non-residential	Charge
NCDSB	June 22, 2015	Former Lincoln	100%(Res.)	\$186/Unit
NCDSB	June 22, 2015	Former Welland	100%(Res.)	\$172/Unit



## EDC Policy Review

All school boards with an existing EDC by-law in place must conduct a review of the policies contained in their existing by-laws before passing a new by-law. This process includes a policy review report as well as a public meeting to review the policies in a public forum.

Section 257.60 subsection (1) of the *Education Act* states that:

“Before passing an education development charge by-law, the board shall conduct a review of the education development charge policies of the board.”

Subsection (2) goes on to state that:

“In conducting a review under subsection (1), the board shall ensure that adequate information is made available to the public, and for this purpose shall hold at least one public meeting, notice of which shall be given.”

## 1.3 Area in Which By-law May Apply

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The legislation states that an EDC by-law may apply to the entire area of the jurisdiction of a board or only part of it. In addition, an EDC by-law of the board shall not apply with respect to land in more than one “region” if the regulations divide the area of the jurisdiction of the board into prescribed regions. The NCDSB’s jurisdiction is divided into two “regions” for the purposes of calculating and enacting EDC rates and by-laws. The first region is based on the boundary of the former Lincoln County (Niagara-on-the-Lake, St. Catharines, West Lincoln, Lincoln and Grimsby) and the second region is based on the boundary of the former Welland County (Niagara Falls, Port Colborne, Thorold, Welland, Fort Erie, Pelham and Wainfleet). The existing and proposed EDC by-laws cover each of these areas and as such are area specific by-laws within the Niagara Region. Any revenue that is collected under these EDC by-laws can only be used within that affiliated area (unless otherwise approved by the Minister of Education).

“Education development charges collected under an education development charge by-law that applies to land in a region shall not, except with the prior written approval of the Minister, be used in relation to land that is outside that region” and “money from an EDC reserve fund established under section 16 (1) of O. Reg. 20/98 may be used only for



growth-related net education land costs attributed to or resulting from development in the area to which the EDC by-law applies.”

EDC background studies should clearly outline the areas that will be covered by EDC by-laws. Four maps have been included on the following pages outlining the area to which the EDC by-laws will apply and the respective review areas for each Board panel.

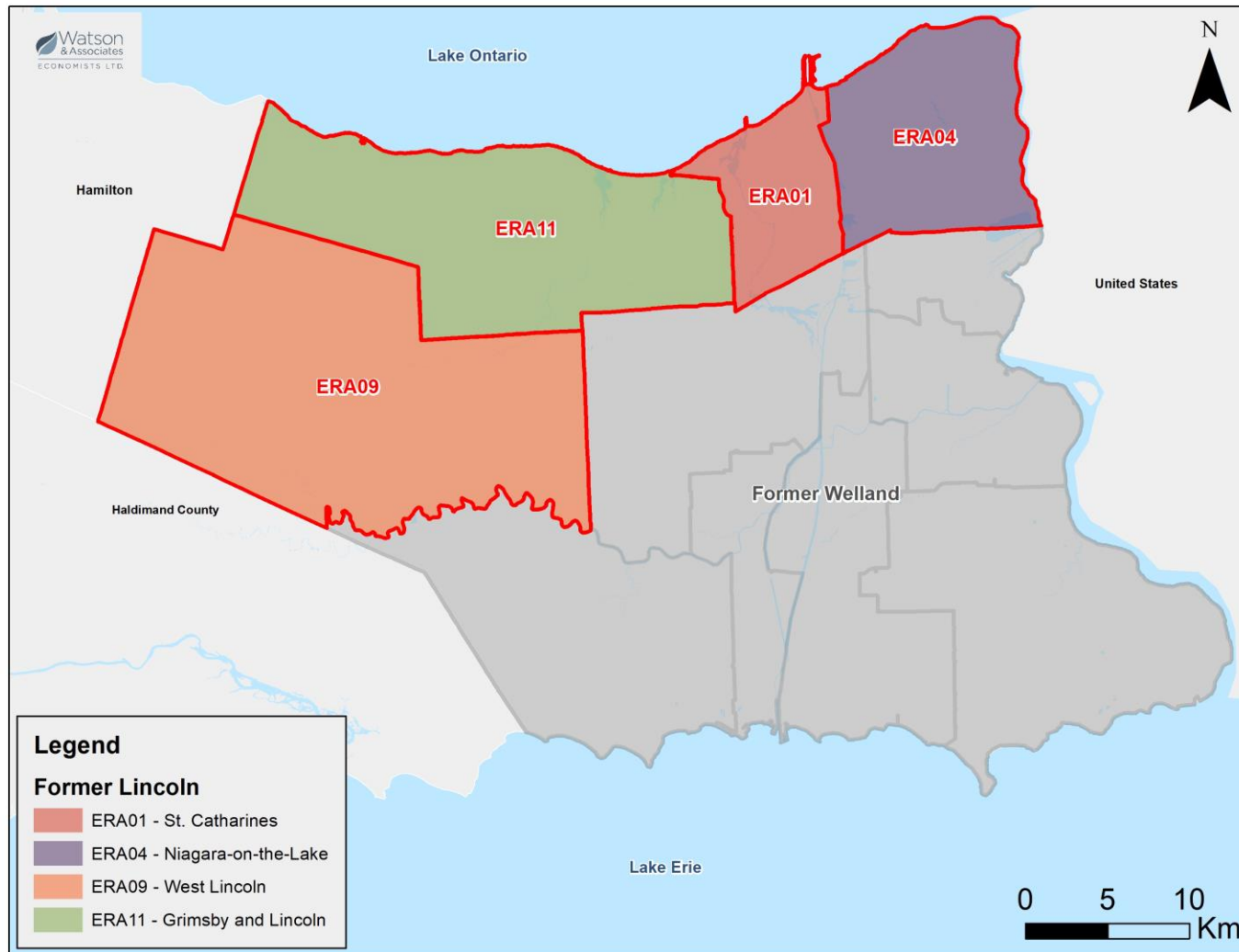
## **1.4 EDC Review Areas**

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The EDC methodology allows school boards to examine growth-related needs on a jurisdiction-wide basis – that is, treat the whole EDC area as one review area – or to examine them on a sub-area basis or review areas. Review areas are artificial constructs intended to divide the board’s jurisdiction into sub-areas in order to more accurately determine the location of new school sites. Board review areas are likely to reflect attendance boundaries for families of schools, natural dividers such as rivers, creeks, etc., or man-made barriers such as major thoroughfares. The Ministry of Education’s EDC Guidelines recommend that review areas are consistent with board review areas used for capital planning purposes and that they try to maintain consistency with review areas of subsequent EDC by-laws.



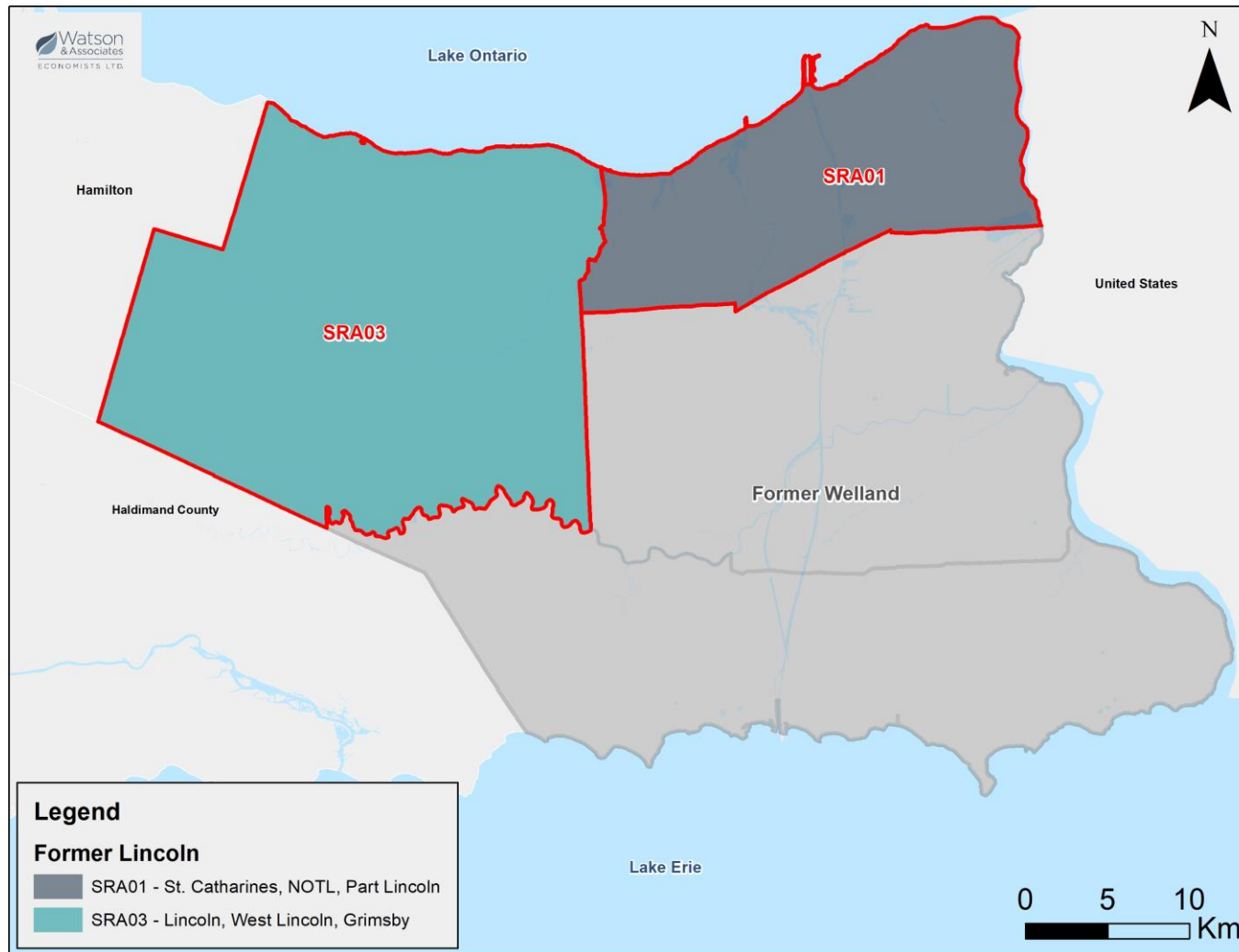
Map 1: NCDSB EDC 2020 – Elementary Review Areas (Former Lincoln)





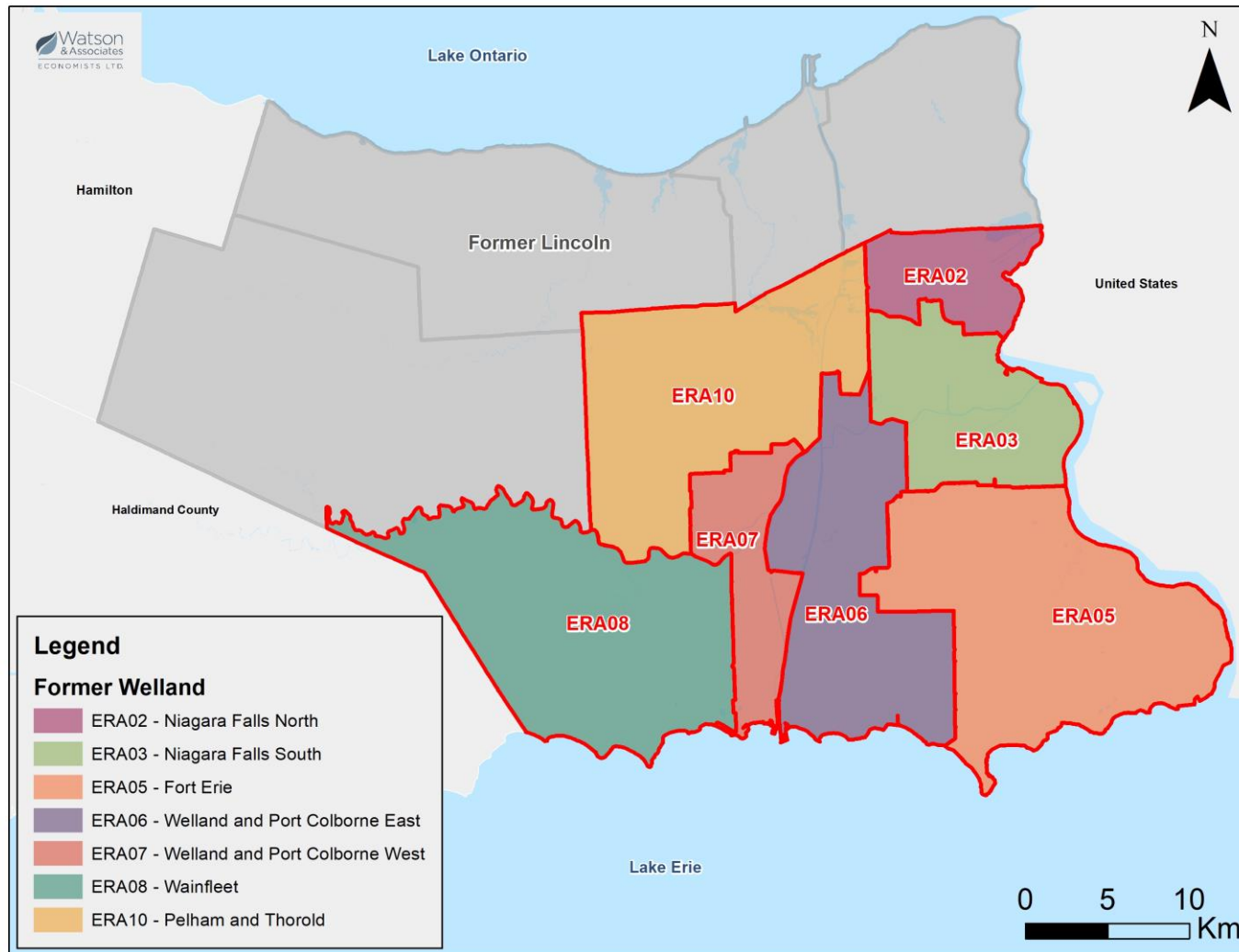


Map 2: NCDSB EDC 2020 – Secondary Review Areas (Former Lincoln)



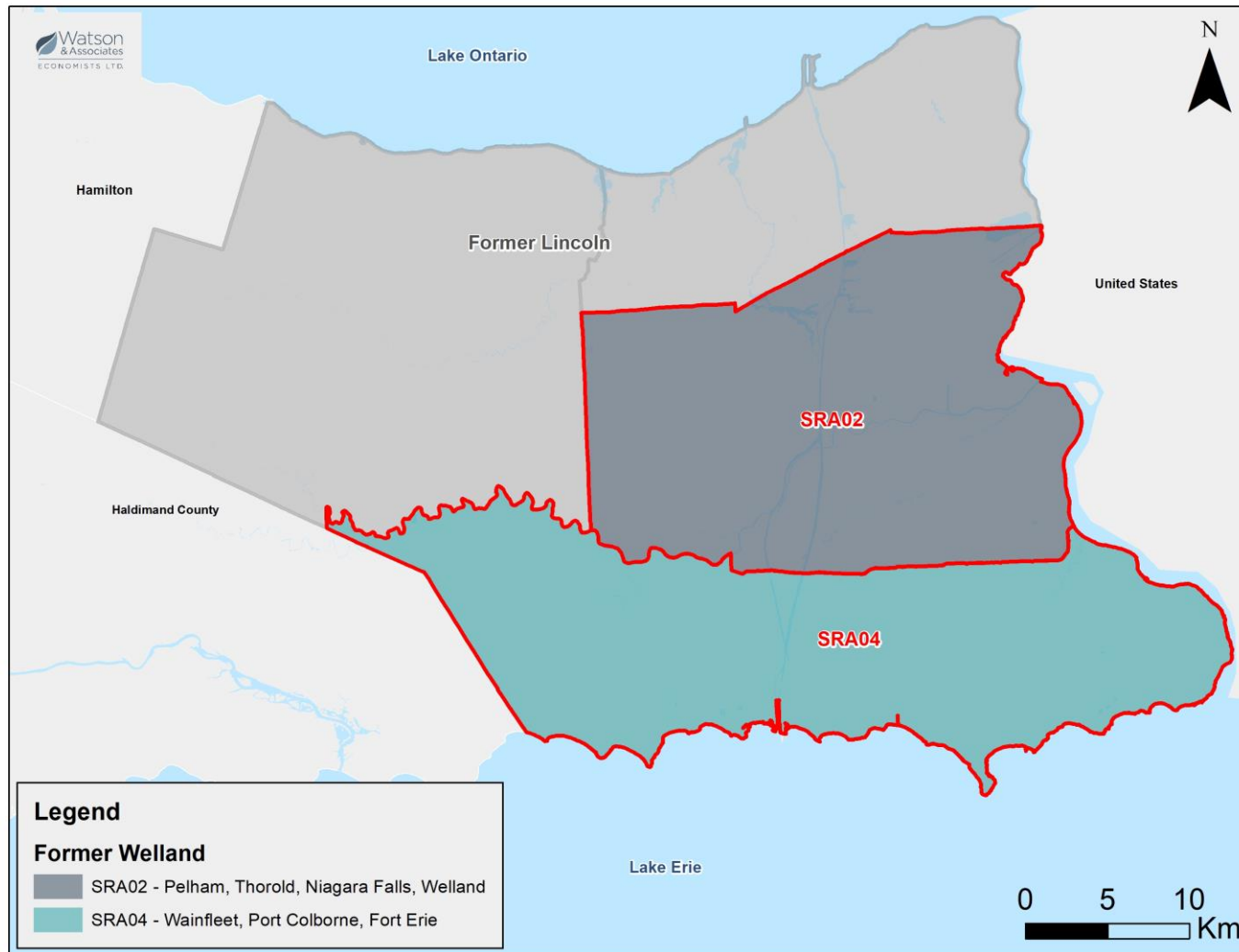


Map 3: NCDSB EDC 2020 – Elementary Review Areas (Former Welland)





Map 4: NCDSB EDC 2020 – Secondary Review Areas (Former Welland)





The NCDSB's review areas used in this background study are largely consistent with the Board's review areas used in their long-term accommodation studies. For the purpose of calculating an EDC, the NCDSB has used a total of **11** elementary review areas and **4** secondary review areas. There are **4** elementary review areas and **2** secondary review areas in the Former Lincoln portion and **7** elementary review areas and **2** secondary review areas in the Former Welland portion.

## **Former Lincoln**

### Elementary Review Areas:

ERA01 – St. Catharines

ERA04 – Niagara-on-the-Lake

ERA09 – West Lincoln

ERA11 – Grimsby and Lincoln

### Secondary Review Areas:

SRA01 – St. Catharines, NOTL, Part Lincoln

SRA03 – Lincoln, West Lincoln, Grimsby

## **Former Welland**

### Elementary Review Areas:

ERA02 – Niagara Falls North

ERA03 – Niagara Falls South

ERA05 – Fort Erie

ERA06 – Welland and Port Colborne East

ERA07 – Welland and Port Colborne West

ERA08 – Wainfleet

ERA10 – Pelham and Thorold

### Secondary Review Areas:

SRA02 – Pelham, Thorold, Niagara Falls, Welland

SRA04 – Wainfleet, Port Colborne, Fort Erie



The EDC, when calculated on a review area basis, assumes that the combined OTG capacity of the existing facilities located within the review area is considered to be the total available capacity. Determining board needs on a review area basis is premised on the following:

- Available space is determined by subtracting the year-15 existing community enrolment number from the current OTG capacity figure;
- Pupils that are generated from new development must fill any available surplus OTG capacity first; and
- Pupils generated from new development, above and beyond those that fill any available surplus space within the review area, are net growth-related pupil place requirements and can potentially be funded through EDCs.

The review area approach to calculating EDCs has been undertaken by both boards and is largely consistent with the way in which future capital needs will be assessed over the long term.





# Chapter 2

## The EDC By-law



## 2. The EDC By-law

### 2.1 Imposition of an EDC

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The passage of an EDC by-law gives school boards the authority to impose and collect EDCs for the purpose of acquiring and developing growth-related school sites. Each by-law has a maximum term of five years and must be passed within one year of EDC background study completion. Before a school board can proceed with an EDC by-law, it must receive confirmation in writing from the Ministry of Education acknowledging receipt of the background study and approving estimates of school capacities, available surplus spaces, enrolment projections and future site needs contained in the background study.

Section 10 of O. Reg. 20/98 sets out the conditions that must be satisfied in order for a board to pass an EDC by-law:

- The Minister has approved the board's estimates of the total number of elementary and secondary pupils over each of the 15 years of the forecast period, as well as the number of existing school pupil places that could reasonably be used to accommodate them;
- The Minister has approved the board's estimates of the number of elementary and secondary school sites used by the board to determine the net education land costs;
- The board has demonstrated that the average elementary or secondary enrolment within its jurisdiction exceeds the board's elementary or secondary capacity; or the board's current EDC financial obligations exceed revenues reported in the EDC reserve fund;
- The board has prepared a background study and given a copy of the EDC background study relating to the by-law to the Minister and each board having jurisdiction within the area to which the by-law would apply;
- The board provides any information regarding the calculation of the EDC if requested by the Minister upon the review of the background study.



## 2.2 The Background Study

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An EDC background study must be completed by a school board that wishes to pass an EDC by-law. The intention of the background study is to provide information on the process and methodology of calculating an EDC, as well as the background and assumptions that make up the estimates of the enrolment projections and site needs.

Section 257.61 (1) of the Act requires that “before passing an education development charge by-law, the board shall complete an education development charge background study.”

Section 257.61 (2) of the Act and O. Reg. 20/98 sections 9 (1) and (2) set out the following information that must be included in an EDC background study:

Section 9 (1):

- Estimates of the anticipated amount, type and location of new dwelling units for each year of the Board’s intended forecast period in the area in which the charge is to be imposed;
- The number of projected new pupil places as a result of new growth and the number of new school sites needed to provide accommodation for those students;
- The number of existing pupil places by school and the number of available spaces to accommodate the projected number of new pupil places; and
- For every existing elementary and secondary pupil place in the board’s jurisdiction that the board does not intend to use to accommodate pupils from new growth, an explanation as to why the board does not intend to do so.

Section 9 (2):

- For each school site, estimates of the net education land cost, the location of the site, the area of the site;
- The number of pupil places the board estimates, provided by the school to be built on the site, and the number of those pupil places that the board estimates will be used to accommodate new pupil places.



## 2.3 Public Meetings

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Before a school board can pass an EDC by-law, the legislation requires that the board hold at least one public meeting. The purpose of the meeting is to advise any interested stakeholders and the public at large of the board's intentions and address the new proposed EDC by-law. The public meeting also gives the community and stakeholders the opportunity to voice any issues or concerns they have regarding the proposed by-law.

The board is required to provide at least 20 days' notice of the meeting and must make the background study, as well as the new proposed by-law, available to the public at least two weeks in advance of said meeting. O. Reg. 20/98 states that notice of a public meeting can be given in two ways:

- To every owner of land in the area to which the proposed by-law would apply by personal service, electronic mail or mail.
- By publication in a newspaper that is, in the Secretary of the Board's opinion, of sufficiently general circulation in the area to which the proposed by-law would apply to give the public reasonable notice of the meeting.

If a school board already has an existing in-force EDC by-law in place, the board must hold an additional meeting to review the existing policies of the current EDC by-law. This part of the process is necessary in order to fulfil the necessary requirements of the policy review process. It should be noted that this policy review meeting can be addressed by the board during its aforementioned EDC public meeting.

The Board intends to hold a statutory public meeting to inform the public as to the new proposed EDC by-laws as well as its existing EDC policies. The Board intends to hold such a meeting in the late summer or early fall of 2020 as part of a regularly scheduled Board meeting and will consider passage of the EDC by-laws at an additional Board meeting in the fall of 2020.

**Please note that due to the current situation regarding COVID-19, currently scheduled meetings assume a best-case scenario when daily activities and business can resume. Public consultation methods will need to be re-evaluated during the course of the study in order to align with public health measures regarding COVID-19 at that time. As such, public consultation methods may be**



**subject to change. Detailed notices will be issued in advance of the meetings as per legislative requirements and include relevant meeting details.**



OFFICIAL NOTICE WILL BE INSERTED WHEN COMPLETE



OFFICIAL NOTICE WILL BE INSERTED WHEN COMPLETE



## Stakeholder Participation

In addition to the legislated public meetings, the Ministry encourages school boards to include relevant stakeholders in the EDC process and discussions. Local developers or development associations, as well as municipalities, should be contacted in advance of the public meetings to ensure they are aware of the proposed EDC and bring to light any potential issues, etc. It is essential that stakeholders are part of the process and that the discussions always remain transparent to help ensure a smooth passage of the EDC by-law.

*The Board had scheduled plans to hold an information session for stakeholders; however, due to the current situation regarding COVID-19 and due to public health policies, these meetings were forced to be cancelled. It is hopeful that an in-person stakeholder session can be re-scheduled. As a result, in the interim, all efforts will be made to provide all applicable information to stakeholders in a manner that abides by public health measures during the pandemic emergency measures.*

## 2.4 Exemptions, Expiration, Collection

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### Exemptions

The EDC by-law is subject to certain statutory exemptions for both residential and non-residential collection. The exemptions for residential development deal with residential intensification and replacement of units. If a new unit is added to an existing dwelling unit, for example a single detached unit is converted to a duplex, the additional unit is exempt from EDCs. Section 3 of O. Reg. 20/98 sets out the classes of residential buildings and the maximum number of dwelling units that can be added under the exemption.

The legislation also allows for exemptions dealing with the replacement of residential units when the unit has been destroyed by fire, demolition or otherwise, or has been rendered uninhabitable, subject to certain conditions prescribed under section 4 of O. Reg. 20/98.

Non-residential statutory exemptions deal similarly with additions/enlargements of space and replacement of existing non-residential space that has been destroyed. A non-residential development that includes the enlargement of existing industrial space,





up to 50% of the gross floor area (GFA) of the existing development, is exempt from EDCs as per section 257.55 of Division E of the *Education Act*. Replacement of non-residential building space is exempt from EDCs if the existing space was destroyed by fire, demolition or otherwise, or has been rendered uninhabitable, subject to certain conditions in section 5 of O. Reg. 20/98.

In addition to the exemptions mentioned, the legislation allows for a limited non-residential exemption for certain institutional developments. Section 257.54 (5) of the *Education Act* stipulates that, “No land, except land owned by and used for the purposes of a board or municipality, is exempt from an EDC under a by-law passed under subsection (1) by reason only that it is exempt from taxation under section 3 of the *Assessment Act*.”

Finally, under new legislation passed in the fall of 2019, additional exemptions were introduced for certain types of properties. A list of the new exemptions can be found below:

- “1. Subject to subsection (2), the development would construct, erect or place a building or structure, or make an addition or alteration to a building or structure for one of the following purposes:
  - i. A private school.
  - ii. A long-term care home, as defined in the *Long-Term Care Homes Act, 2007*.
  - iii. A retirement home, as defined in the *Retirement Homes Act, 2010*.
  - iv. A hospice or other facility that provides palliative care services.
  - v. A child-care centre, as defined in the *Child Care and Early Years Act, 2014*.
  - vi. A memorial home, clubhouse or athletic grounds owned by the Royal Canadian Legion.
2. The owner is a college of applied arts and technology established under the *Ontario Colleges of Applied Arts and Technology Act, 2002*.
3. The owner is a university that receives regular and ongoing operating funds from the Government of Ontario for the purposes of post-secondary education.



4. The owner is an Indigenous Institute prescribed for the purposes of section 6 of the *Indigenous Institutes Act, 2017*. O. Reg. 371/19, s. 1.”

School boards may also decide to impose their own non-statutory exemptions to certain developments, both residentially and non-residentially. These types of exemptions may be for developments like seniors’ housing, social housing or recreational developments. Non-statutory exemptions are entirely at the discretion of the board and any EDC revenues lost as a result cannot be recovered.

### **Expiration**

A school board can specify any date as the expiration date of the EDC by-law if the term of the by-law does not exceed five years. The exception to this rule is that the EDC by-law of one school board automatically expires on the same date as an existing by-law of a coterminous school board if they are in force in any part of the same area. Section 17 of O. Reg. 20/98 prescribes the conditions dealing with this special rule of expiry of by-laws.

### **Collection**

The EDC is collected by local municipalities on behalf of the school boards at the time a building permit is issued. The funds are deposited into an EDC reserve fund. The municipality, under the legislation, cannot issue a building permit if the EDC has not been paid. In addition to collecting the charge and transferring the monies to the school boards, municipalities are also required to provide the boards with detailed reports respecting all EDC transactions (section 20 of O. Reg. 20/98). At a minimum, each report should cover the total EDCs that have been collected, the number of building permits issued (or GFA for non-residential), any exemptions granted and any permits that were issued without an EDC being paid.

The municipalities do not receive any remuneration for collecting EDCs on behalf of the school boards; however, municipalities can retain any interest earned on the monthly EDC balances.



## 2.5 Appeals and Amendments

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### Appeals

The EDC by-law can be appealed by any individual or organization in accordance with the provisions in the *Education Act*. Sections 257.64 to 257.69 of the Act outline the legislation dealing with the appeal of the EDC by-law. The by-law is subject to appeal for a maximum of 40 days after the by-law has been passed. The school board must provide a written notice that an EDC by-law has been passed (within 20 days of passage) and this notice must include information on how to file an appeal.

An appeal of an EDC by-law goes to the Local Planning Appeal Tribunal (LPAT), formerly known as the Ontario Municipal Board (OMB), to be decided. All appeals must be filed in writing with the secretary of the school board within the allotted time allowed. The reasons for the appeal must be included in the notice. It is the responsibility of the secretary of the school board to forward a copy of the Notice of Appeal to the LPAT within 30 days after the last day of the appeal period. In addition to the Notice of Appeal, the secretary must provide:

- A copy of the by-law certified by the secretary;
- A copy of the background study;
- An affidavit or declaration certifying that notice of the passing of the by-law was provided in accordance with the *Education Act*; and
- The original or true copy of all written submissions and material relevant to the by-law.

After hearing an appeal, the LPAT may decide to:

- Dismiss the appeal in whole or in part.
- Order the board to repeal or amend the by-law.
- Repeal or amend the by-law itself.

If the by-law is repealed, the EDCs that have already been paid must be refunded. If the by-law is amended and the amended charge is lower than the original charge, the difference must be refunded. All refunds are due within 30 days of the by-law being repealed or amended. While the LPAT does have the power to repeal or amend the by-



law, they are not able to increase the quantum of the charge, remove or reduce the scope of discretionary exemptions or change the expiration date of the by-law.

## **Amendments**

The EDC legislation gives school boards the authority to amend their by-laws. Section 257.70 (1) of the Act states: “Subject to subsection (2), a board may pass a by-law amending an education development charge by-law.” There are certain limitations to an EDC amendment, specifically laid out in section 257.70 (2) of the Act, as follows:

A board may not amend an education development charge by-law so as to any one of the following more than once in the one-year period immediately following the coming into force of the by-law or in any succeeding one-year period:

- Increase the amount of an EDC.
- Remove or reduce the scope of an exemption.
- Extend the term of the by-law.

There are a variety of reasons why school boards may feel the need to amend their by-law. School boards may be paying more for school sites than what was estimated in the EDC and may need to increase their land cost assumptions, or they may need to change a discretionary exemption. The board does not need Ministry approval to pass an amending by-law; however, boards are required to provide proper notice proposing an amendment and of the amendment itself. Boards are also required to ensure that the original EDC background study is available, as well as any additional information that would explain the reason for the amendment. A public meeting is not required to pass an amending by-law, but it is recommended.



# Chapter 3

## The Process and Methodology of Calculating an Education Development Charge



### 3. The Process and Methodology of Calculating an Education Development Charge

The following chapter will outline the procedures and methodologies utilized to calculate the EDC. As mentioned earlier in this report, the EDC calculation is formulaic and technical in nature and encompasses three main components – demographic projections, determination of need (new school sites) and the associated costs.

#### 3.1 Eligibility

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School boards must first qualify by meeting certain criteria in order to be eligible to impose EDCs. The first criterion deals with the Board's average projected enrolment compared to its OTG capacity. The second criterion, available only to school boards who have an existing in-force by-law, deals with outstanding EDC financial obligations.

##### **Capacity Trigger**

If a school board's average elementary or secondary enrolment on a jurisdiction-wide basis over the five years following proposed by-law passage is greater than the board's elementary or secondary OTG capacity, then it is eligible to impose an EDC.

Qualification on either panel allows the board to impose EDCs throughout its jurisdiction for both elementary and secondary new school sites. Form A of the EDC submission sets out the board's projected average daily enrolment over the proposed five-year term of the EDC by-law (2020 to 2025), as compared to the board's OTG capacity on both the elementary and secondary panels.

The board's OTG capacity for the EDC is based on the Ministry-approved permanent capacity according to the School Facilities Inventory System on the proposed date the new by-law is to come into force. Additional adjustments may be made to the capacity figure used in the study, in consultation with Ministry staff and subject to approval of the Minister, for circumstances such as:

- OTG capacity of schools that are transferred from one panel to the other within 12 months of by-law passage may be attributed to the panel the school will be used for after the transfer is complete. Boards must have passed a resolution for this to take effect.



- The capacity of all schools or additions under construction and that are planned for opening within 12 months of the by-law coming into force are to be included in the capacity determination.
- Purpose built space that cannot be reasonably used to accommodate pupils from new growth may be excluded from the permanent capacity determination.
- The capacity of a leased school must be included if the school has a “New Pupil Place” capacity attributed to it. The “New Pupil Place” capacity is the capacity used in the determination of Ministry grants.
- Any schools that have been closed (in accordance with the board’s school closure policy) may be excluded from the permanent capacity. In addition, if a school is scheduled to close during the tenure of the by-law (with board-passed resolution) then the capacity may also be excluded.

The permanent jurisdiction-wide capacity used for the NCDSB is **16,870** spaces on the elementary panel and **7,278** spaces on the secondary panel.

The NCDSB does not meet the capacity trigger for either the elementary or secondary panel. The NCDSB’s average projected elementary enrolment from 2020/21 to 2024/25 jurisdiction-wide is 14,309, compared to a capacity of 16,870, for a surplus of 2,561 spaces. The secondary panel average projected enrolment jurisdiction-wide is 6,511, compared to the capacity of 7,278, leaving a surplus of 767 spaces.

***Form A from the EDC Ministry Submission for the Board can be found as Figure 1 on the following page.***



Figure 1: NCDSB – Form A

**Niagara Catholic District School Board**  
**Education Development Charges Submission 2020**  
**Form A - Eligibility to Impose an EDC**

**A.1.1: CAPACITY TRIGGER CALCULATION - ELEMENTARY PANEL**

Elementary Panel Board-Wide EDC Capacity	Projected Elementary Panel Enrolment - Jurisdiction Wide						Elementary Average Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
16,870.0	14,169	14,197	14,236	14,372	14,571	14,309	-2,561

**A.1.2: CAPACITY TRIGGER CALCULATION - SECONDARY PANEL**

Secondary Panel Board-Wide EDC Capacity	Projected Secondary Panel Enrolment - Jurisdiction Wide						Secondary Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
7,278.0	6,490	6,470	6,527	6,544	6,526	6,511	-767





## Financial Obligations

A school board that has an existing EDC by-law in place and has outstanding financial obligations related to its existing by-law that exceed the balance of the EDC reserve fund, is eligible to impose EDCs. It is possible for a board to have sufficient capacity to accommodate projected enrolment, yet still be obligated to pay for sites that have been purchased as a result of a growth-related need. Outstanding financial obligations can result from a board not having collected enough revenue because of growth shortfalls or an increase in land prices, or if a board has purchased school sites earlier than what was projected in the background study.

This financial obligation eligibility trigger was added to the original capacity trigger criteria with an amendment to O. Reg. 20/98 and came into force on March 12, 2002.

For school boards to qualify under this trigger, an EDC financial obligation must be demonstrated in the background study, including the following required information:

- Board must have a previous by-law in effect after September 1, 1999;
- Funds borrowed from the EDC reserve fund must be reconciled back;
- Copies of Appendix D1 and D2 must be provided;
- A transaction history of EDC financial activity must be provided from the last Appendix D1 and D2 statements to proposed by-law implementation; and
- A repayment schedule outlining the elimination of the EDC financial obligation must be provided.

An outstanding EDC financial obligation exists if the adjusted outstanding principal as per Appendix D of the board's financial statements (plus any adjustments made), is greater than the adjusted EDC reserve fund balance from Appendix D (including adjustments).

The NCDSB's Former Lincoln EDC reserve fund has an existing EDC financial obligation of -\$7,075,088 which means that the reserve fund is currently in a deficit position and qualifies the Board to pursue an additional by-law in the Former Lincoln area.

The NCDSB's Former Welland EDC reserve fund has an existing EDC financial obligation of -\$3,128,536 which means that the reserve fund is currently in a deficit



position and qualifies the Board to pursue an additional by-law in the Former Welland area.

Form A, part A.2 of the Ministry EDC forms outlines the Board's proposed reserve fund balances at the time of by-law renewal. Part A.2 of Form A for the Board's EDC reserve fund can be found below.

Table 3.1: NCDSB: Former Lincoln – Form A.2

**NCDSB**

**Former Lincoln EDC By-law**

Education Development Charges Submission 2020

Form A – Eligibility to Impose an EDC

A.2: EDC FINANCIAL OBLIGATIONS (Estimated to June 15, 2020)

Total EDC Financial Obligation:	-\$7,075,088
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Table 3.2: NCDSB: Former Welland – Form A.2

**NCDSB**

**Former Welland EDC By-law**

Education Development Charges Submission 2019

Form A – Eligibility to Impose an EDC

A.2: EDC FINANCIAL OBLIGATIONS (Estimated to June 15, 2020)

Total EDC Financial Obligation:	-\$3,128,536
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## 3.2 Demographic Projections

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The demographic projections respecting school enrolment and housing and population growth form an important basis for the entire EDC analysis. These projections ultimately determine eligibility, need and the final quantum of the charge. The housing unit forecasts contained in this study are consistent with the most recent Regional forecasts that were available at the time of study. Background, methodologies and overviews of both the enrolment and housing forecasts can be found in Chapter 4 of this report.

The demographic projection requirements of the EDC consist of three distinct components: projecting the number of annual building permits that will be issued for



new dwelling units and new non-residential space; projecting enrolment of the existing community; and projecting enrolment from new housing growth.

## **New Dwelling Units**

The number of new dwelling units in the area of the EDC by-law must be estimated for each of the next 15 years. The forecast is set out by three types of development, low density (single and semi-detached houses), medium density (townhouses) and high density (apartments) and is broken down by the school board review areas that were outlined earlier in this report in section 1.4.

The forecast is set out by varying types of development for two reasons. The first is that different types of development produce school-aged children in different ways. Lower-density developments typically produce greater numbers of school-aged children than do apartments. Defining various types of developments allows for greater accuracy when projecting the number of new pupils arising from new developments. The second reason is to be able to calculate a differentiated charge should the Board choose to do so. Each Board can charge a uniform EDC rate across all types of development – meaning that the EDC is one rate for a single detached unit or an apartment – or can choose to charge separate rates depending on the type of development.

There are certain situations, as defined by the legislation, where specific developments are exempt from EDCs, such as housing intensification. The forecast of *net new dwelling units* should ensure that these exempt units are factored into any forecast and excluded.

## **Existing Community Projections and Projections of New Pupils**

The enrolment projections required in order to calculate EDCs must be made up of two distinct projections, one for the existing community and one for pupils from new housing growth. This is done because ultimately the number of total growth-related pupils must be offset by any available pupil places that are not required by pupils of the existing community in year 15 of the forecast. The existing community projection must estimate, by school, the number of students for 15 years based on the number of existing students today and assuming no additional new housing growth. The Board's total OTG capacity of the review area (as of by-law inception), less the projected number of existing community pupils in the review area in year 15, is the Board's *total available space*.



The determination of pupils from new development is based on the housing forecast and the use of pupil yield factors. Pupil yields are mathematical representations of the number of school-aged children that will be generated by a particular dwelling over the planning forecast and that will attend a particular school board. Pupil yields used in this analysis are based on Statistics Canada data and board historical enrolment information. Multiplying the pupil yield factors by the appropriate type of developments in the net new dwelling forecast determines the projected pupils from new development.

To determine the total *net growth-related pupil place requirements*, the available pupil places (total available space referenced above) must be subtracted from the total pupils projected from new development. Enrolment projections and the determination of net growth-related pupil places can be done on a jurisdiction-wide basis or on a review area basis. The EDC analysis in this study is based on a review area approach.

## **Site Needs**

The final “planning” or “forecasting” step in the EDC process is to determine the board’s site needs, specifically the number, location and size of sites for new growth-related schools. The calculation of net growth-related pupil place requirements ultimately determines the number of necessary sites and their size. The regulation governing the EDC provides a table of maximum sizes depending on the number of pupil places that will be constructed. These tables can be found on the following page.

While the calculations shown in the tables ultimately determine the amount/size of land that will be necessary for new school sites, the legislation also recognizes that there may be situations in which the necessary site for a new school may exceed the size specified in the table. For example, a board may need a larger site to accommodate certain municipal requirements or Ministry initiatives. Should a site exceed the legislative requirements, justification must be included in the EDC background study.



Table 3.3: Elementary School Maximum Area to Pupils

<b>Elementary Schools</b>	
Number of Pupils	Maximum Area (acres)
1 to 400	4
401 to 500	5
501 to 600	6
601 to 700	7
701 or more	8

Table 3.4: Secondary School Maximum Area to Pupils

<b>Secondary Schools</b>	
Number of Pupils	Maximum Area (acres)
1 to 1,000	12
1,001 to 1,100	13
1,101 to 1,200	14
1,201 to 1,300	15
1,301 to 1,400	16
1,401 to 1,500	17
1,501 or more	18

Form G of the Ministry EDC Forms submission provides specific details on each site the board is proposing to acquire to construct new schools. On a site by site basis, Form G provides information on the general location of the site (by review area or greater detail, if available), the proposed size of the new school, the approximate timing of site purchase as well as the percentage of the site that is considered EDC eligible. The Ministry also recommends that proposed site purchases for new schools are consistent with the board's long-term accommodation plans.



### 3.3 Growth-Related Net Education Land Costs

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The planning or forecasting component of the EDC analysis is critical to determining the overall EDC-eligible needs of the Board. To finalize the calculation process of the EDC, these accommodation needs must be translated into financial requirements. The analysis in the previous section determined the total growth-related pupil needs as well as the amount of land (in acres) that will be required to accommodate those pupils. EDC-eligible expenses are determined by attaching costs to acquire and service the land needed.

Land acquisition costs have been determined by qualified appraisers and the methodologies used as well as relevant data can be found in Chapter 5 of this report. Servicing costs are based on historical costs provided by the School Board with respect to sites that have been recently developed. Once costs for each site have been finalized, the next step is to determine the percentage of each site that is EDC eligible. This is based on the percentage of net growth-related students that make up the total capacity of the proposed new school. For example, if the new proposed school had a capacity of 450, and 400 of the spaces were accounted for by new growth-related pupils, then the site would be 88.88% eligible for EDCs ( $400/450 = 88.88\%$ ).

In addition to site acquisition and servicing costs, there are other EDC-eligible expenses that can be included in the analysis. Examples of other EDC-eligible costs include:

- Interest and borrowing costs related to site acquisition;
- Land escalation costs;
- Costs related to the preparation and distribution of EDC background studies;
- Costs related to studies of land being considered for acquisition (environmental assessments); and
- Costs to service/prepare land for construction (grading, service lines, etc.).

#### Outstanding Financial Obligations

In addition to the costs that have been outlined above, any outstanding financial obligations from previous by-laws are also eligible education land costs. A negative balance in the Board's EDC reserve funds, established for the area to which the proposed by-laws will apply, is considered an outstanding financial obligation and can be added to the total net education land costs. It should be noted that if the Board has



positive balance in its EDC reserve funds, these funds must be used to defray any EDC-eligible expenditures. The total eligible costs are referred to as the *total growth-related net education land costs*.

### **3.4 Alternative Projects and Localized Education Development Agreements**

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As mentioned earlier in this report, legislative changes were made to the legislation pertaining to EDCs in the fall of 2019. Part of those changes introduced the possibility of new options for both school boards and building permit takers or developers.

Section 257.53.1 (1) of the *Education Act* says, “Before an education development charge by is passed under subsection 257.54 (1), a board may request and the Minister may approve, in accordance with subsection (2), an allocation of revenue raised by charges imposed by the by-law towards an alternative project.” The legislation defines an alternative project as “a project, lease or other prescribed measure, approved by the Minister under section 257.53.1, that would address the needs of the board for pupil accommodation and would reduce the cost of acquiring land. This is new legislation and at the time this report was prepared, there have been no alternative projects defined or approved yet.

In addition, section 257.53.2 (1) also introduced what are being called Localized Education Development Agreements or LEDA. The relevant legislation states,

“Before an education development charge by is passed under subsection 257.54 (1), a board may, in accordance with subsection (2), enter into a localized education development agreement with an owner of land that would be subject to the imposition of education development charges under the by-law, in which,

- (a) The owner provides a lease, real property or other prescribed benefit to be used by the board to provide pupil accommodation; and
- (b) The board agrees not to impose education development charges again the land that would otherwise be subject to the charges.”

Similar to the alternative projects legislation, the LEDA legislation is also recent and there have been no LEDAs entered into at the time this report was prepared.



## 3.5 Determination of the Charge

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Once the total growth-related net education land costs have been determined, there are certain prescribed steps that must be followed to determine the actual quantum of the EDC. As discussed in Chapter 2, the legislation allows school boards to determine the type of EDC it will impose. Boards can impose EDCs on residential or non-residential developments and can also charge a uniform rate for all types of developments or can differentiate the rate based on dwelling unit types.

### Apportionment of Land Costs

The legislation allows school boards to allocate up to 40% of their education land costs to non-residential development. If a school board had a non-residential component to their EDCs, then the land costs would be multiplied by whatever percentage the board deemed to be apportioned to non-residential. For example, if the total land costs were estimated to be \$1 million and the non-residential allocation was 10%, then the *non-residential growth-related net education land costs* would total \$100,000. The remaining balance would make up the *residential growth-related net education land costs*.

To determine the residential charge (assuming a uniform charge), the total residential growth-related net education land costs are divided over the projected number of net new dwelling units assumed in the EDC forecast over the next 15 years. The result is the amount of the uniform residential EDC per dwelling unit. If charges are to be imposed on non-residential development, a non-residential forecast of GFA is compiled and the total non-residential growth-related net education land costs are divided by the estimated GFA of proposed non-residential developments.

Once the residential charge is determined, it can be charged uniformly across all types of development or different rates can be charged depending on the types of units being built. If the EDC is applied in a uniform manner, then the total residential land costs are simply divided over the estimated net new dwelling units as described earlier. If the board chooses to impose a differentiated EDC, then the charges are apportioned based on different unit types producing different amounts of pupils. Boards may choose to define developments as they wish (i.e. low density, high density, condos, apartments, single family, etc.) but are encouraged to stay as consistent as possible with categories used by the municipalities impacted by the by-law.





***A flow chart detailing the EDC process can be found at the end of this chapter. In addition, the Ministry EDC Forms, which detail the calculations required to determine the EDC can be found in Appendix A at the end of this report.***

The final step that must be taken by school boards when calculating their EDC rate is to figure out the permitted phase-in of the charge. Certain legislative changes over the last several years have resulted in some changes to the calculation and implementation of the EDC by-laws and rates, as has been discussed previously in this report. In 2018, EDC rates were temporarily frozen while legislation and public feedback was reviewed by the government. EDC consultations occurred with various stakeholders and one of the resultant changes in legislation lifted the EDC rate freeze and implemented a prescribed phase-in system of EDC rates.

The phase-in calculation is dependent on the Board's existing or most recent EDC charge and the new EDC rate that is calculated in the new EDC background study. Residential EDC rates can be increased by no more than \$300 or 5% (whichever is greater) of the existing or most recent residential EDC rate and can increase by that amount once per year until the "maximum" rate is achieved. The "maximum" rate is the Board's new proposed EDC rate. Similarly, on the non-residential side, EDC rates can be increased by no more than \$0.10 or 5% (whichever is greater) of the existing or most recent non-residential EDC rate and can also increase once per year until the "maximum" rate is achieved (the maximum being the new proposed rate in the new EDC background study).

The relevant sections of the new legislation describing the prescribed phase-in calculation are included below.

For residential:

- "i. In respect of the first year of the by-law, take the greater of,
  - A. the product of 1.05 and,
    - 1. if a by-law is currently in force, the residential rate set out in that by-law that would apply, on the day immediately before the day the proposed by-law would come into force, to the area to which the proposed by-law would apply,



2. if a by-law is not currently in force, the residential rate set out in the most recent by-law that would have applied, on the day that by-law expired, to the area to which the proposed by-law would apply, or
  3. zero, if a by-law has never applied to the area to which the proposed by-law would apply, and
- B. the sum of \$300 and,
1. if a by-law is currently in force, the residential rate set out in that by-law that would apply, on the day immediately before the day the proposed by-law would come into force, to the area to which the proposed by-law would apply,
  2. if a by-law is not currently in force, the residential rate set out in the most recent by-law that would have applied, on the day that by-law expired, to the area to which the proposed by-law would apply, or
  3. zero, if a by-law has never applied to the area to which the proposed by-law would apply.
- ii. In respect of the second year of the by-law and each subsequent year, if applicable, take the greater of,
- A. the product of 1.05 and the residential rate determined under subparagraph 9 iii in respect of the previous year of the by-law, and
  - B. the sum of \$300 and the residential rate determined under subparagraph 9 iii in respect of the previous year of the by-law.”

For non-residential:

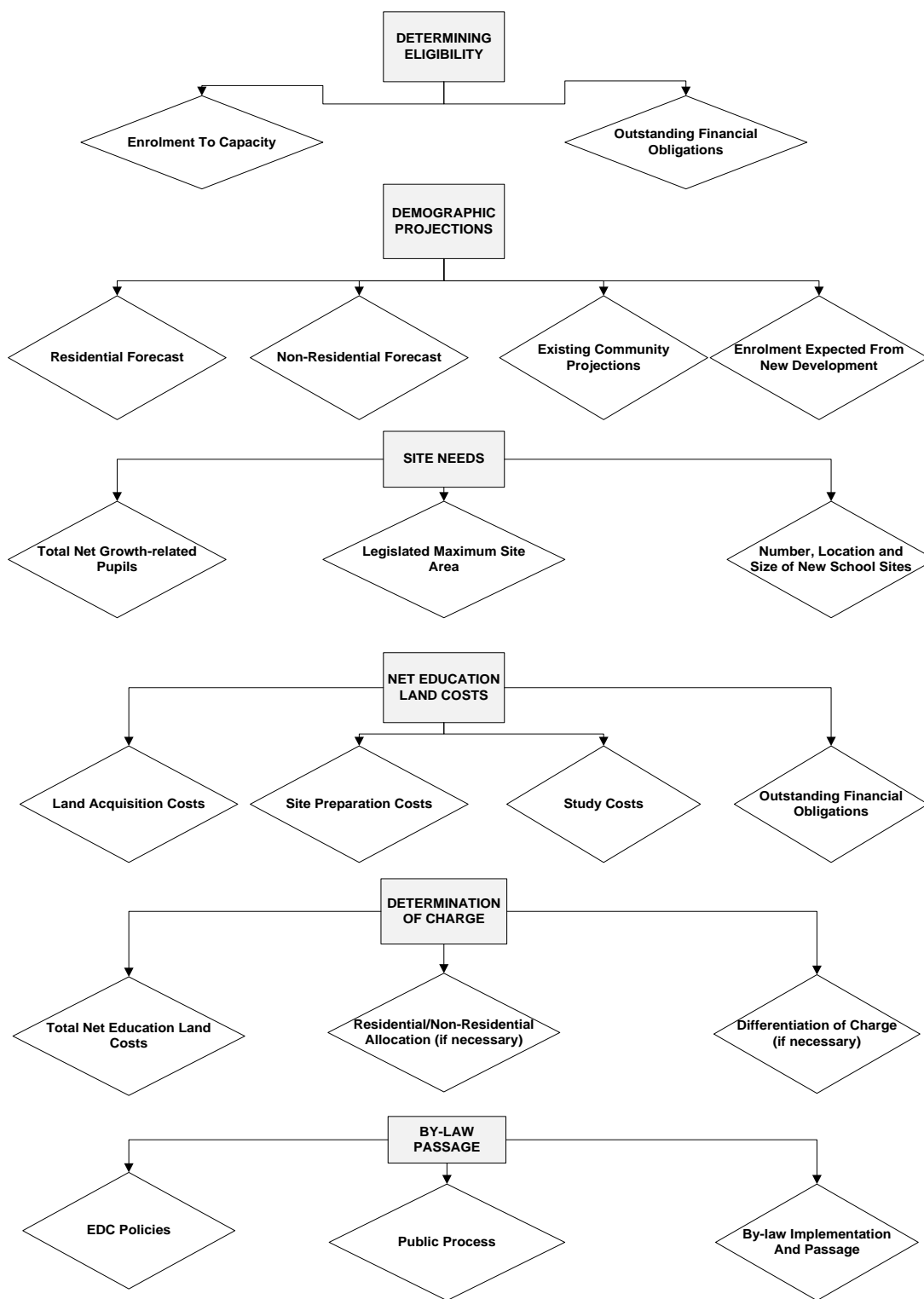
- “i In respect of the first year of the by-law, take the greater of,
- A. the product of 1.05 and,
  1. if a by-law is currently in force, the non-residential rate set out in that by-law that would apply, on the day immediately before the day the proposed by-law would come into force, to the area to which the proposed by-law would apply,
  2. if a by-law is not currently in force, the non-residential rate set out in the most recent by-law that would have applied, on the day that by-law expired, to the area to which the proposed by-law would apply, or



3. zero if a by-law has never applied to the area to which the proposed by-law would apply, and
- B. the sum of \$0.10 and,
  1. if a by-law is currently in force, the non-residential rate set out in that by-law per square foot that would apply, on the day immediately before the day the proposed by-law would come into force, to the area to which the proposed by-law would apply,
  2. if a by-law is not currently in force, the non-residential rate set out in the most recent by-law per square foot that would have applied, on the day that the by-law expired, to the area to which the proposed by-law would apply, or
  3. zero if a by-law has never applied to the area to which the proposed by-law would apply, and
- ii. In respect of the second year of the by-law and each subsequent year, if applicable, take the greater of,
  - A. the product of 1.05 and the non-residential rate determined under subparagraph 11 ii in respect of the previous year of the by-law, and
  - B. the sum of \$0.10 and the non-residential rate determined under subparagraph 11 ii in respect of the previous year of the by-law. O. Reg. 438/18, s. 1; O. Reg. 55/19, s. 1; O. Reg. 371/19, s. 2 (1-6)."



## EDC Process and Methodology





# Chapter 4

## Demographic Projections



## 4. Demographic Projections

As mentioned earlier in the report, the demographic projections form the backbone of the EDC analysis in that they are used to determine eligibility, need and ultimately the quantum of the charge itself. The demographic projections for an EDC consist of forecasts of new housing development as well as projections of school enrolment. Projections of both new housing and enrolment must be provided on an annual basis for a 15-year period following by-law imposition.

***The following chapter provides the methodology and background to the demographic projections as well as the results of those projections for the Region of Niagara and both its EDC-specific areas, Former Lincoln and Former Welland.***

### 4.1 The Residential Growth Forecast

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#### 4.1.1 Residential

The residential growth forecast for the EDC is critical to the analysis because of the direct link between new homes and new pupils for the school board. In addition to determining a board's needs, the number of net new projected residential units in the EDC growth forecast is what the total net education land costs get divided by to determine the final quantum of the residential charge. The dwelling unit forecast contained in this study provides a projection of the number of units on an annual basis for the next 15 years by low- (singles/semis), medium- (townhouses) and high-density (apartments) allocations. O. Reg. 20/98 s. 7 (1) states that a board shall "estimate the number of new dwelling units in the area in which charges are to be imposed for each of the years, for a period chosen by the board of up to 15 years, immediately following the day the board intends to have the by-law come into force."

Housing development and occupancy patterns have changed significantly over the last decade. Housing developments are offering more choice in terms of density, like singles, townhouses and apartments, as well as developments that cater to specific lifestyles or age groups (retirement residences). Policy changes, such as the *Places to Grow* initiative by the provincial government, mandate that future developments will have more units on less land, increasing the likelihood of more urban type developments and infilling projects in the future. The combination of new initiatives,



societal shifts in housing and changes in the economy pose unique challenges for municipalities and school boards to develop long-term population and housing projections.

The development projections contained in this study are derived from the Niagara Region 2016 Municipal Comprehensive Review (MCR) Traffic Zone projections which incorporate regional residential targets. This ensures consistency with local and upper-tier governments and other agencies. The forecast information may be supplemented with other relevant data garnered from historical building permit issuance, small area development plans and prior conversations/meetings with local planning departments.

According to information from regional building permit data, Niagara Region has averaged approximately 1,235 new permits annually for residential construction since 2015. Residential building activity in the Board's jurisdiction has generally increased since 2015, with permit activity reaching 3,415 in 2019 – which is approximately 1,200 more than the number of building permits issued in 2015 as shown below in Table 4.1.

Table 4.1: Niagara Region Historical Building Permit Issuance

Year	Area	Total
2015	Niagara Region	2,185
2016	Niagara Region	3,133
2017	Niagara Region	2,821
2018	Niagara Region	3,271
2019	Niagara Region	3,415
<b>2015-2019</b>		<b>14,852</b>
Average		1,235

The Region's growth forecasts project moderate growth over the next few decades with an average of approximately 2,761 new dwelling units per year from 2020/21 to 2034/35 (15-year EDC forecast term). According to building permits reported by the local municipalities between 2015 and 2019, approximately 55% of all permits were for low-density type units (singles/semis), 25% for medium-density type units, and 20% for high-density type units, totalling 14,825 permits. Within the Region, Former Lincoln accounted for 6,078 units (41%) of growth and Former Welland accounted for 8,747 units (59%) of growth over the 2015 to 2019 period.



The growth forecast for Former Lincoln's EDC by-law for the NCDSB is based on the aforementioned data and totals **19,633** new units that are forecast to be built over the next 15 years. Of these new units, 40% are estimated to be low density, 30% medium density, and 30% high density. While the forecast averages **1,309** units for the 15-year EDC term, it is expected that the growth rates will continue to increase over the 15-year period.

Table 4.2: NCDSB – Former Lincoln Residential Forecast  
2020/21 to 2034/35

Dwelling Type	# of Units	% By Density
Low Density (Singles/Semis)	7,848	<b>40%</b>
Medium Density (Townhouses)	5,958	<b>30%</b>
High Density (Apartments)	5,827	<b>30%</b>
<i>Total</i>	19,633	<b>100%</b>

The growth forecast for Former Welland's EDC by-law for the NCDSB can be found below. It is based on the aforementioned data and totals **21,784** new units that are forecast to be built over the next 15 years. Of these new units, 56% are estimated to be low density, 30% medium density, and 14% high density. While the forecast averages **1,452** units for the 15-year EDC term, it is expected that the growth rates will continue to increase over the 15-year period.

Table 4.3: NCDSB – Former Welland Residential Forecast  
2020/21-2034/35

Dwelling Type	# of Units	% By Density
Low Density (Singles/Semis)	12,253	<b>56%</b>
Medium Density (Townhouses)	6,418	<b>30%</b>
High Density (Apartments)	3,113	<b>14%</b>
<i>Total</i>	21,784	<b>100%</b>

Forecasts for the Board by elementary review area and density type can be found as part of the Ministry Forms package in Appendix A (Form B).





In order to account for intensification of units that are exempt from EDCs, an adjustment to the projections was made to derive the “net” new units housing forecast. This adjustment is intended to estimate the number of units in the forecast that will be created by intensification (e.g. transforming an existing single-family home into duplex/apartment-type units). The overall forecast was reduced by approximately 2% to estimate the number of exempt units and resulted in a projection of **50,588** net new units.

### **Non-residential**

There is currently no non-residential component to the existing in-force by-laws.

## **4.2 Enrolment Projections**

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Enrolment projections for the purposes of the EDC analysis are completed as two separate components – enrolment of the existing community and enrolment expected from new housing growth. The enrolment projections of the existing community are based on a scenario of no new housing growth and examine projected enrolments of the existing population only. The projections of enrolment from new housing focus on pupils that are generated from expected new housing developments. EDC-eligible growth-related pupils must be offset by any available space in the existing community, hence the necessity of examining enrolment projections utilizing the two separate components.

Enrolment projections have been prepared for each review area. The existing community projections have been prepared for each of the schools contained in the EDC analysis. The projections of enrolment from new housing growth are provided on a review area basis only.

The enrolment projections also assume that students are accommodated in their home attendance areas. This means that students that are currently in a holding situation at a school outside their home school boundary are returned to their home boundary. Holding situations typically arise when students in a development area await new school construction and are “held” in nearby schools until the new school is open. Situations where students are permanently accommodated outside their home areas (i.e. program) are not affected.



## Methodology

The prediction of school enrolment involves the consideration of a wide range of factors. There are three common methods of enrolment projection: rate of growth, enrolment ratios and grade transition.

The rate of growth method assumes that past rates of enrolment growth or decline will carry forward. In today's changing demographic and economic landscape, this method of enrolment forecasting is unreliable. The enrolment ratio method looks at historical ratios of school enrolment compared with the overall population and then carries forward these ratios, or makes assumptions about new ratios, and applies them to a population forecast. The grade transition method examines historical progression rates from grade to grade and makes assumptions about the retention of grades from one year to the next.

Watson & Associates Economists Ltd. (Watson) used a combination of the latter two methodologies – enrolment ratio and grade transition – in conjunction with strong demographic background data and historical Board enrolment to produce the enrolment forecast for the EDC. The enrolment projection methodology focuses on the relationships between demographic trends and actual historical enrolment of the Board. The basis of the assumptions for future trends comes from the analysis of these historical relationships.

## Demographic Background

A demographic profile is compiled for each review area within the Board's jurisdiction using data from the 2001, 2006, 2011 and 2016 Censuses. Trends in the demographic data are used to highlight changes in population on both a review area and jurisdiction-wide basis. Examining these historical trends assist in providing perspective and direction when determining future assumptions for the projections.

Tables 4.4 and 4.5, below, depict the demographic trends for the Regional Municipality of Niagara for the 2001, 2006, 2011 and 2016 Census periods. The total population in the jurisdiction has been steadily increasing, but more slowly than both the provincial and national rates. Between 2001 and 2006, the population grew 4.1%, compared to 6.6% in Ontario and 5.4%, nationally. Growth slowed in the 2006/11 period, which resulted in a total jurisdiction population increase of 0.9%, while the populations of Ontario and Canada increased by 5.7% and 5.9%, respectively. Between 2011 and



2016, the population grew by about 3.8%, which was still below the provincial and national rates for this same time period, which were 4.6% and 5%, respectively.

More important from a school board perspective was the significant decrease in the elementary school-aged population (4-13 years), which declined by approximately 5.6% from 2001 to 2006 and by an additional 8.6% between 2006 and 2011. This trend stabilized in the 2011/16 period, in which the population grew by 0.6%. This amounts to an absolute loss of 6,940 inhabitants between 2001 and 2016. The secondary school-aged population (14-19 years) increased by 8.1% between 2001 and 2006 but it has since been decreasing. Between 2006 and 2011, the population fell by about 5.8%, which was followed by a larger drop of approximately 9.6% between 2011 and 2016 – an absolute loss of 2,160 inhabitants between 2001 and 2016.

In addition to the elementary- and secondary-aged cohorts, the pre-school-aged population (0-3) and the population of females aged 25-44 were also examined for the 2001 – 2016 time period. These two groups are important because they are excellent indicators of what is expected to happen in the school-aged population in the short to medium term. The pre-school population is the cohort that will be entering the school system in the next few years, while females between 25 and 44 years of age are the group of women that are said to be in their prime child-bearing years, and examining this population can provide insight into future births/school-aged children. The pre-school-aged population remained fairly stable from 2001 to 2011, decreasing by 1.1% in the first half of the decade, and increasing by 0.4% in the latter half. The population of females aged 25-44, meanwhile, decreased by approximately 3.9% between 2001 and 2006 and then again by 9.2% between 2006 and 2011. From 2011 to 2016, the pre-school population increased by 1.8%, while the number of females aged 25-44 increased by 0.5%.



Table 4.4: NCDSB Total Jurisdiction – Demographic Trends 2001, 2006, 2011, 2016

Population Data	2001 Census	2006 Census	2011 Census	2016 Census
Total Population	410,610	427,415	431,320	447,905
Pre-School Population (0-3)	16,635	16,445	16,510	16,800
Elementary School Population (4-13)	52,430	49,470	45,215	45,490
Secondary School Population (14-18)	27,120	29,315	27,610	24,960
Population Over 18 Years of Age	314,425	332,185	341,985	360,655
<i>Females Aged 25-44</i>	57,570	55,305	50,240	50,500

\*Derived by Watson & Associates Economists Ltd. 2020, using Statistics Canada Census DA Level Single Year of Age data.

Table 4.5: Niagara Region Population Change, 2001 to 2016

Population Data	2001-2006		2006-2011		2011-2016	
	Abs. Change	% Change	Abs. Change	% Change	Abs. Change	% Change
<b>Total Population</b>	<b>16,805</b>	<b>4.1%</b>	<b>3,905</b>	<b>0.9%</b>	<b>16,585</b>	<b>3.8%</b>
Pre-School Population (0-3)	-190	-1.1%	65	0.4%	290	1.8%
Elementary School Population (4-13)	-2,960	-5.6%	-4,255	-8.6%	275	0.6%
Secondary School Population (14-18)	2,195	8.1%	-1,705	-5.8%	-2,650	-9.6%
Population Over 18 Years of Age	17,760	5.6%	9,800	3.0%	18,670	5.5%
<i>Females Aged 25-44</i>	-2,265	-3.9%	-5,065	-9.2%	260	0.5%

A description of the relevant population age cohorts is as follows:

- Pre-school aged (0-3) – used as a lead indicator of potential anticipated enrolment in the short term;
- Elementary (4-13) – represents the predominant age structure of the students that attend elementary schools;
- Secondary (14-18) – represents the predominant age structure of the students that attend secondary schools;
- Adult (18+) – reflects the segment of the population that does not attend elementary or secondary school; and



- Females (25-44) – Group of women said to be in prime child-bearing years; can be an indicator of future births.

## The Enrolment Projection Process

### Determining Entry Year Enrolment

One of the most important and most difficult components of the enrolment forecast is predicting entry year enrolment into Junior Kindergarten (JK). Much of the overall projection relies on the assumptions made with regard to pupils entering the system. To develop forecasts for the JK grade, a review of historical births, pre-school population (0-3 years old) and historical JK enrolment is undertaken. The participation rates of the Board's JK grade enrolment of the 4-year old population are examined from one Census period to the next to determine future participation ratios.

In addition, a population forecast of the pre-school and school-aged population (0-18 years) by single year of age is prepared for the study area. This forecast is based on the population trends of the 2001, 2006, 2011 and 2016 Census periods, as well as other relevant demographic trends of the area. Recent fertility and death rates are applied to the 2016 Census population and the population is aged to provide future births and future school-aged population estimates.

The challenge in this population forecast is to exclude growth/development in this phase of the forecast. The total enrolment forecast is divided into two separate components – existing enrolment and enrolment from future housing. To account for this, trends are examined for 2001, 2006, 2011 and 2016 Census populations to estimate levels of growth and migration that occurred between the Census periods. Assumptions arising from this examination are used to “strip” growth/migration from the projected population forecast to ensure that growth is not double counted.

Comparing historical JK enrolment to actual population provides ratios that are used to determine future JK enrolment from the projected 4-year old population in the review area. This determines the projected JK pupils for the review area for the forecast period. These overall JK students then need to be allocated to their respective schools in the review area. This allocation is based on historical shares combined with any Board information on recent openings/closures or program changes that may affect future share. Table 4.6 depicts an **example** of JK/Elementary participation rates between 2006 and 2016 for one review area in a Board's jurisdiction.



Table 4.6: An Example of Junior Kindergarten/Elementary Participation Rates  
(2006 to 2016)

Single Year of Age	2006	2011	2016
0	286	261	274
1	317	291	274
2	316	296	290
3	315	355	297
4	340	288	285
5	362	328	305
6	363	391	358
7	356	350	374
8	324	372	387
9	321	364	393
10	327	378	334
11	388	365	448
12	336	350	409
13	346	323	384
<b>JK HEADCOUNT ENROLMENT</b>	<b>172</b>	<b>150</b>	<b>145</b>
<b>ELEMENTARY ENROLMENT</b>	<b>1,567</b>	<b>1,591</b>	<b>1,760</b>
<b>JK PARTICIPATION</b>	<b>51%</b>	<b>52%</b>	<b>51%</b>
<b>ELEMENTARY PARTICIPATION</b>	<b>45%</b>	<b>45%</b>	<b>48%</b>

At this stage of the projections, each school in a review area will have a projected number of JKs for the forecast period. The next step then involves using the grade transition method to advance each grade from one year to the next. For every school in the system, retention rates from grade to grade are calculated and applied to grade enrolments as they are advanced through each projection year. Each school and community can be unique when it comes to grade retention. For example, the ratio of Senior Kindergarten (SK) students to JK students is often higher in the more rural areas and an indication that more students routinely enter the SK grade than would be expected, given the JK count from the previous year. Programs, such as French Immersion, etc., can also have a significant impact on grade to grade retention. Table 4.7 provides an **example** of retention rate calculations based on historical enrolment.



Table 4.7: Retention Rate Example

				Historical					
Years			Grade	2011/ 2012	2012/ 2013	2013/ 2014	2014/ 2015	2015/ 2016	2016/ 2017
5	4	2	JK	1,484	1,562	1,539	1,559	1,605	1,730
111%	112%	110%	SK	1,720	1,611	1,745	1,750	1,696	1,797
110%	111%	112%	1	1,613	1,859	1,787	1,919	1,929	1,915
104%	103%	102%	2	1,847	1,682	1,949	1,866	1,947	1,994
104%	104%	104%	3	1,982	1,911	1,765	2,016	1,934	2,047
103%	103%	103%	4	1,971	2,004	1,953	1,846	2,067	1,990
103%	103%	103%	5	2,119	2,058	2,082	2,011	1,895	2,128
102%	102%	103%	6	2,151	2,145	2,093	2,123	2,051	1,953
101%	101%	102%	7	2,184	2,144	2,174	2,114	2,148	2,093
101%	102%	102%	8	2,120	2,210	2,194	2,178	2,145	2,193

Historical enrolment trends, overall participation rates/enrolment share, as well as the overall demographics of the area, are all examined in conjunction with the ratio of the projected enrolment to the population. This examination looks at the reasonableness of the projections, and expected ratios and assumptions in light of recent historical trends.

### Secondary Enrolment Projections

The secondary enrolment projections are based largely on the elementary projections and how the elementary students transition into the secondary panel. Each secondary school of the Board is assigned feeder elementary schools which form a “family” of schools based on Board data. As Grade 8 students graduate, they are assigned to their respective secondary schools. If Grade 8 students can attend more than one secondary school, they are then allocated based on recent trends.

The other factor involved in projecting the entry year or Grade 9 grade for the secondary panel involves the concept of open access. In Ontario, students are permitted to attend the secondary school of their choice, regardless of religious requirements, assuming there is space and program availability. To account for this in the projections, the predicted Grade 9 enrolment at a given secondary school based on its feeder schools and historical retention rates is compared to the actual Grade 9 enrolment at the school.



This ratio provides an approximation of the net students lost or gained due to open access.

The other important variable that is considered in the secondary enrolment projection methodology is the impact of the fifth year of secondary school which was eliminated in 2003/04. The elimination of the fifth year of study does not mean that Grade 12 students are not allowed to come back for a fifth year of study. There are still instances where Grade 12 students may come back to finish the 4-year program in 5 years or to upgrade or retake certain courses. The percentage of students that are coming back for a fifth year varies throughout the Province and even from school to school within a Board. The projections in this analysis typically utilize a 3-year average of Grade 12 retention rates (putting greater emphasis on the last year or two), as well as input from the Board on their experiences and expected future trends.

The remainder of the secondary projection follows the same methodology used in the elementary projections. Grades are advanced by applying historical grade transition rates for each school in the system. Assumptions are derived using historical ratios of enrolment to population and are used to ensure that projected secondary enrolment relates back to the projected secondary populations.

### Examining Historical Enrolment Trends

Historical enrolment provides trends that are used to help form assumptions for projected enrolment and provides an important basis to determine relationships with demographic data. The historical data can provide detail on considerations such as how the change in enrolments compares with the changes in the school-aged populations of the same area, how different sized grade cohorts are moving through the system and how enrolment has changed in light of new housing activity.

An important indicator when examining historical enrolment is the ratio of senior elementary enrolment compared to junior elementary enrolment. This ratio provides a quick “snapshot” of the current enrolment structure and can provide a short-term outlook of expected enrolment.

The comparison is made between the senior elementary grades (6-8) and the junior elementary grades (JK-1). Assuming full-day JK and SK, an equal number of pupils entering JK-1 to those moving through the senior elementary grades would result in a ratio of 1. If the ratio is higher than 1, it indicates that more pupils are leaving the





elementary system or school than are entering and could be an indicator of future enrolment decline, at least in the short term and absent of mitigating factors. A ratio lower than 1 indicates possible enrolment growth (at least in the short term) and is typically found in growing areas where housing attracts young couples or young families with children.

Table 4.8 depicts the historical Grade Structure Ratio (GSR) for the NCDSB. The ratio of senior to junior elementary enrolment was 1.33 in 2006/07, and 1.16 in 2011/12. More recently, the GSR has decreased further to approximately 1.14 in 2016/17.

Table 4.8: NCDSB TOTAL JURISDICTION

<b>GRADES</b>	<b>2006/ 2007</b>	<b>2011/ 2012</b>	<b>2016/ 2017</b>
<b>JK</b>	1,285	1,371	1,315
<b>SK</b>	1,441	1,454	1,357
<b>1</b>	1,475	1,483	1,394
<b>2</b>	1,596	1,518	1,437
<b>3</b>	1,690	1,555	1,533
<b>4</b>	1,561	1,522	1,520
<b>5</b>	1,703	1,606	1,550
<b>6</b>	1,892	1,559	1,515
<b>7</b>	1,800	1,655	1,526
<b>8</b>	1,887	1,767	1,584
<b>SE</b>	37	21	12
<b>ALT/OTH</b>	0	0	0
<b>TOTAL</b>	<b>16,365</b>	<b>15,511</b>	<b>14,743</b>
<b>GSR</b>	<b>1.33</b>	<b>1.16</b>	<b>1.14</b>

### The Impact of Enrolment Share

Board enrolment share refers to the share or percentage of total enrolment a board receives between itself and its co-terminous English language board. Changes in enrolment share can have significant impacts on board enrolment. For example, increases in enrolment share can help mitigate declines or even increase enrolment in areas where the total school-aged population is in decline.



Table 4.9 found below measures the historical elementary enrolment of the NCDSB and the District School Board of Niagara (DSBN) for the Regional Municipality of Niagara. The elementary enrolment share has stayed fairly stable between 2006/07 and 2016/17, decreasing from 38% in 2006/07 to 37%% in 2016/17. This was matched by a 1% increase in the DSBN share over the same period.

Table 4.9: Elementary Historical Enrolment Share

<b>ELEMENTARY PANEL ENROLMENT</b>			
<b>SCHOOL BOARD</b>	<b>2006/07</b>	<b>2011/12</b>	<b>2016/17</b>
NCDSB	16,365	15,511	14,743
DSBN	27,142	24,328	24,754
TOTAL OF BOTH BOARDS	43,507	39,839	39,497
NCDSB SHARE	38%	39%	37%
DSBN SHARE	62%	61%	63%

Similarly, secondary panel enrolment shares have only slightly changed from 2006/07 to 2016/17 – the NCDSB's share increased from 36% to 38%, while the DSBN's share of secondary enrolment decreased from 64% to 62%. These findings are depicted in Table 4.10.

Table 4.10: Secondary Historical Enrolment Share

<b>SECONDARY PANEL ENROLMENT</b>			
<b>SCHOOL BOARD</b>	<b>2006/07</b>	<b>2011/12</b>	<b>2016/17</b>
NCDSB	8,382	8,199	7,160
DSBN	14,937	13,769	11,646
TOTAL OF BOTH BOARDS	23,319	21,968	18,806
NCDSB SHARE	36%	37%	38%
DSBN SHARE	64%	63%	62%

### Enrolment Expected from New Housing

The second phase of the enrolment projection methodology involves predicting housing growth in the study area and its impact on school enrolment. Earlier in this chapter, the residential unit growth forecasts were explained in detail. The residential unit forecast is



used as the basis for predicting future school enrolment from growth. Historical levels of occupancy by school-aged children and by housing type provide us with factors and trends that allow us to make assumptions about how new units might produce children in the future. From an occupancy point of view, the number of people per housing unit has been declining in practically every part of the Province over the last decade or longer. In addition, the number of school-aged children per household has also been in sharp decline. New units today are not producing the same number of people or the same number of children as they have historically.

Each unit in the residential forecast is multiplied by a factor to predict the number of school-aged children that will come from the projected number of units. To derive this pupil generation factor, the methodology involves using custom Census data prepared specifically for Watson by Statistics Canada. The Census data provides information with respect to the number of pre-school and school-aged children that are currently living in certain types and ages of dwelling units. For example, the data is able to provide the number of children aged 4-13 years that live in single-family homes that are between one and five years old for any Census tract in the study area.

Pupil yields were derived for both the elementary and secondary panels for low-, medium- and high-density housing types for each review area in the Board's jurisdiction. The pupil yields and trends can vary significantly from area to area in the Board's jurisdiction. In this way, factors are derived and applied to the appropriate growth forecast to get a forecast of school-aged children from new development. This new development forecast must then be adjusted to reflect only the enrolment for the subject Board. Using historical apportionment and population participation rates, the enrolment forecast is revised to capture the appropriate share for the Board. For the NCDSB, the total yields for the elementary panel range between 0.02 and 0.23 (Table 4.11 to Table 4.13). On the secondary panel, total yields for the secondary panel range from 0.01 to 0.07.

***Figure 2 depicts a flow chart outlining the process of projecting enrolment from new development and can be found on page 4-18.***



Table 4.11: NCDSB Former Lincoln – Growth-Related Pupil Yields

Table 4.11.1: Former Lincoln – Elementary Growth-Related Pupil Yields

Form E – Growth-Related Pupils – Elementary Panel

Municipality	Dwelling Unit Type	Elementary Pupil Yield
St. Catharines	Low Density	0.14
	Medium Density	0.06
	High Density	0.02
	Total	0.06
NOTL	Low Density	0.07
	Medium Density	0.04
	High Density	0.02
	Total	0.05
West Lincoln	Low Density	0.11
	Medium Density	0.04
	High Density	0.02
	Total	0.10
Grimsby & Lincoln	Low Density	0.19
	Medium Density	0.09
	High Density	0.03
	Total	0.12

Table 4.11.2: Former Lincoln – Secondary Growth-Related Pupil Yields

Form E – Growth-Related Pupils – Secondary Panel

Municipality	Dwelling Unit Type	Secondary Pupil Yield
St. Catharines, NOTL, Part Lincoln	Low Density	0.07
	Medium Density	0.04
	High Density	0.01
	Total	0.04
Lincoln, West Lincoln, Grimsby	Low Density	0.06
	Medium Density	0.03
	High Density	0.02
	Total	0.05



Table 4.12: NCDSB Former Welland – Growth-Related Pupil Yields (Elementary)

Table 4.12.1: Former Welland – Elementary Growth-Related Pupil Yields

Form E – Growth-Related Pupils – Elementary Panel

Municipality	Dwelling Unit Type	Elementary Pupil Yield
Niagara Falls North	Low Density	0.14
	Medium Density	0.05
	High Density	0.02
	Total	0.08
Niagara Falls South	Low Density	0.23
	Medium Density	0.08
	High Density	0.03
	Total	0.13
Fort Erie	Low Density	0.10
	Medium Density	0.06
	High Density	0.03
	Total	0.09
Welland & Port Colborne East	Low Density	0.09
	Medium Density	0.04
	High Density	0.02
	Total	0.06

Table 4.12.1: Former Welland – Elementary Growth-Related Pupil Yields

Form E – Growth-Related Pupils – Elementary Panel

Municipality	Dwelling Unit Type	Elementary Pupil Yield
Welland & Port Colborne West	Low Density	0.12
	Medium Density	0.06
	High Density	0.03
	Total	0.09
Wainfleet	Low Density	0.10
	Medium Density	0.00
	High Density	0.00
	Total	0.10
Pelham & Thorold	Low Density	0.10
	Medium Density	0.04
	High Density	0.02
	Total	0.08



Table 4.13: NCDSB Former Welland – Growth-Related Pupil Yields (Secondary)

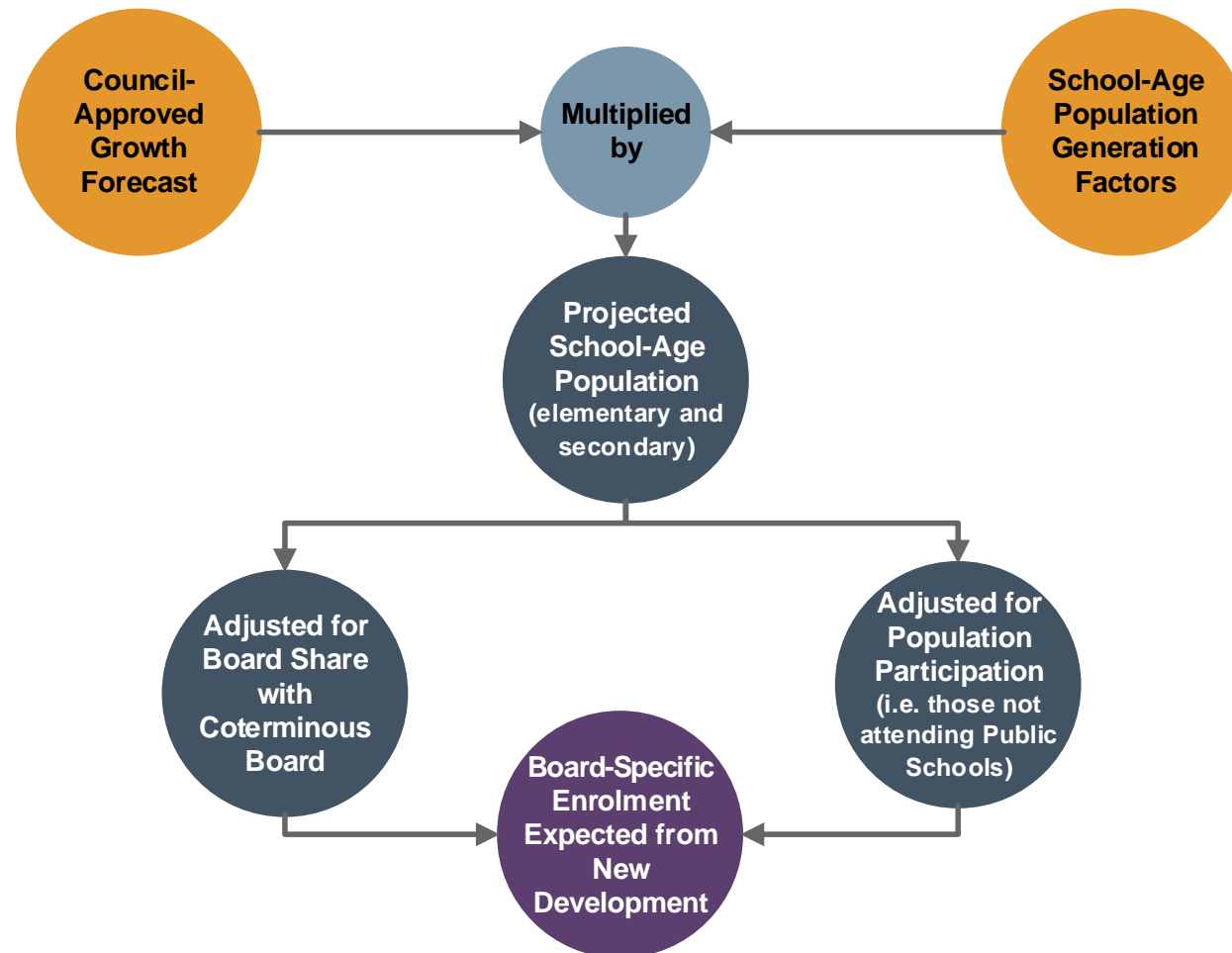
Table 4.13.1: Former Welland – Secondary Growth-Related Pupil Yields

Form E – Growth-Related Pupils – Secondary Panel

Municipality	Dwelling Unit Type	Elementary Pupil Yield
Pelham, Thorold, Niagara Falls, Welland	Low Density	0.05
	Medium Density	0.03
	High Density	0.01
	Total	0.04
Wainfleet, Port Colborne, Fort Erie	Low Density	0.04
	Medium Density	0.02
	High Density	0.01
	Total	0.04



Figure 2: Enrolment Expected from New Development





## 4.3 Summary of Projected Enrolment

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The total EDC enrolment projections for Former Lincoln and Former Welland indicate that by the end of the forecast period (2034/35), the NCDSB can expect a total elementary enrolment of 16,813, compared to the 2019/20 enrolment of 14,210. This results in an increase of 2,603 elementary pupils or 18.3%. Secondary enrolment is similarly expected to increase over the projected term, growing from 6,511 in 2019/20 to 7,308 by 2034/35, for a total increase of 797 pupils or approximately 12.2%. A summary of the projected enrolment for the Board, by review area and panel, is provided in Table 4.13 and Table 4.14 on the following page.





## Summary of Projected Enrolment:

Table 4.14: NCDSB Former Lincoln Enrolment Projections

### Former Lincoln Elementary Review Areas

Review Area	Year 1 2020/21	Year 5 2024/25	Year 10 2029/30	Year 15 2034/35
ERA01	3,663	3,598	3,706	3,849
ERA04	272	280	326	372
ERA09	473	504	549	650
ERA11	1,943	2,027	2,255	2,428
<b>Total</b>	<b>6,351</b>	<b>6,410</b>	<b>6,835</b>	<b>7,298</b>

### Former Lincoln Secondary Review Areas

Review Area	Year 1 2020/21	Year 5 2024/25	Year 10 2029/30	Year 15 2034/35
SRA01	1,823	1,768	1,721	1,896
SRA03	1,094	1,235	1,307	1,460
<b>Total</b>	<b>2,917</b>	<b>3,003</b>	<b>3,028</b>	<b>3,356</b>

Table 4.15: NCDSB Former Welland Enrolment Projections

### Former Welland Elementary Review Areas

Review Area	Year 1 2020/21	Year 5 2024/25	Year 10 2029/30	Year 15 2034/35
ERA02	1,456	1,535	1,577	1,613
ERA03	2,157	2,314	2,587	2,898
ERA05	843	842	929	1,013
ERA06	556	596	637	629
ERA07	1,682	1,670	1,732	1,817
ERA08	80	99	117	124
ERA10	1,043	1,105	1,280	1,420
<b>TOTAL</b>	<b>7,818</b>	<b>8,161</b>	<b>8,859</b>	<b>9,515</b>

### Former Welland Secondary Review Areas

Review Area	Year 1 2020/21	Year 5 2024/25	Year 10 2029/30	Year 15 2034/35
SRA02	2,876	2,817	2,986	3,201
SRA04	697	707	636	751
<b>TOTAL</b>	<b>3,572</b>	<b>3,524</b>	<b>3,622</b>	<b>3,951</b>



# Chapter 5

## Education Development Charge Calculation



## 5. Education Development Charge Calculation

Once eligibility has been determined, the charge is calculated using the aforementioned forecasts and methodologies. The calculation is dependent on the growth/enrolment forecasts to project need, the valuation of land and services to assign a cost to that need, and the residential and non-residential forecast to provide a quotient to determine the final quantum of the charge. O. Reg. 20/98, section 7 provides the basis under which the EDC is determined. The following section will explain and highlight the specific calculation components of the EDC.

### 5.1 The Projections

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The residential dwelling unit forecasts that were used in the EDC analysis are explained in detail in Chapter 4 and outlined below.

#### Residential Unit Forecast

Total Jurisdiction	2020/21-2034/35
TOTAL PROJECTED UNITS	41,417
TOTAL NET NEW UNITS	40,588

Former Lincoln	2020/21-2034/35
TOTAL PROJECTED UNITS	19,633
TOTAL NET NEW UNITS	19,240

Former Welland	2020/21-2034/35
TOTAL PROJECTED UNITS	21,784
TOTAL NET NEW UNITS	21,348



## Net Growth-related Pupil Places

The projected Board enrolments, as well as the residential forecasts, determine the net growth-related pupil places which, in turn, determine the number of EDC-eligible sites. Form E of the EDC Ministry Submission for the Board and each panel is set out below. These forms highlight, by review area, the net number of units, the Board pupil yields and the growth-related pupils.

Board-wide, the enrolment projections predict **1,671** net growth-related pupils on the elementary panel and **780** on the secondary panel. The elementary net growth-related pupils by region are **797** for the Former Lincoln portion and **874** for the Former Welland portion. On the secondary panel, the allocation is **366** pupils for the Former Lincoln portion and **414** for the Former Welland portion.



Table 5.1: NCDSB Education Development Charges Submission 2020 – Former Lincoln Portion

Niagara Catholic District School Board - Former Lincoln Portion By-Law

Education Development Charges Submission 2020

Form E - Growth Related Pupils - Elementary Panel

Niagara Catholic District School Board - Former Lincoln Portion By-Law

Education Development Charges Submission 2020

Form E - Growth Related Pupils - Secondary Panel

Elementary Planning Area	Dwelling Unit Type	Net New Units	Elementary Pupil Yield	Elementary Growth-Related Pupils	Secondary Planning Area	Dwelling Unit Type	Net New Units	Secondary Pupil Yield	Secondary Growth-Related Pupils
St. Catharines	Low Density	1,816	0.14	258	St. Catharines, NOTL, Part Lincoln	Low Density	3,262	0.07	221
	Medium Density	2,964	0.06	169		Medium Density	3,745	0.04	135
	High Density	4,078	0.02	98		High Density	4,467	0.01	62
	Total	8,859	0.06	526		Total	11,474	0.04	418
NOTL	Low Density	1,328	0.07	89	Lincoln, West Lincoln, Grimsby	Low Density	4,586	0.06	281
	Medium Density	627	0.04	27		Medium Density	1,820	0.03	62
	High Density	295	0.02	5		High Density	1,360	0.02	23
	Total	2,250	0.05	122		Total	7,766	0.05	366
West Lincoln	Low Density	2,652	0.11	296					
	Medium Density	541	0.04	23					
	High Density	145	0.02	3					
	Total	3,338	0.10	322					
Grimsby and Lincoln	Low Density	2,051	0.19	396					
	Medium Density	1,434	0.09	132					
	High Density	1,309	0.03	37					
	Total	4,794	0.12	565					
		SUBTOTAL:		1,534			SUBTOTAL:		784
		LESS: Available Pupil Places:		738			LESS: Available Pupil Places:		418
		NET GROWTH RELATED PUPILS:		797			NET GROWTH RELATED PUPILS:		366



Table 5.2: NCDSB Education Development Charges Submission 2020 – Former Welland Portion

Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form E - Growth Related Pupils - Elementary Panel

Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form E - Growth Related Pupils - Secondary Panel

Elementary Planning Area	Dwelling Unit Type	Net New Units	Elementary Pupil Yield	Elementary Growth-Related Pupils	Secondary Planning Area	Dwelling Unit Type	Net New Units	Secondary Pupil Yield	Secondary Growth-Related Pupils
Niagara Falls North	Low Density	681	0.14	99	Pelham, Thorold, Niagara Falls, Welland	Low Density	8,324	0.05	445
	Medium Density	633	0.05	33		Medium Density	5,411	0.03	155
	High Density	340	0.02	7		High Density	2,817	0.01	28
	Total	1,654	0.08	139		Total	16,552	0.04	628
Niagara Falls South	Low Density	3,142	0.23	737	Wainfleet, Port Colborne, Fort Erie	Low Density	3,929	0.04	159
	Medium Density	2,927	0.08	235		Medium Density	572	0.02	13
	High Density	1,570	0.03	53		High Density	296	0.01	4
	Total	7,639	0.13	1,025		Total	4,797	0.04	175
Fort Erie	Low Density	2,673	0.10	255					
	Medium Density	436	0.06	27					
	High Density	233	0.03	6					
	Total	3,342	0.09	287					
Welland and Port Colborne East	Low Density	833	0.09	74					
	Medium Density	547	0.04	24					
	High Density	294	0.02	6					
	Total	1,674	0.06	104					
Welland and Port Colborne West	Low Density	1,610	0.12	191					
	Medium Density	617	0.06	37					
	High Density	313	0.03	8					
	Total	2,541	0.09	236					
Wainfleet	Low Density	209	0.10	20					
	Medium Density	-	0.00	-					
	High Density	-	0.00	-					
	Total	209	0.10	20					
Pelham and Thorold	Low Density	3,104	0.10	299					
	Medium Density	821	0.04	33					
	High Density	364	0.02	6					
	Total	4,289	0.08	338					
		SUBTOTAL:		2,149			SUBTOTAL:		804
		LESS: Available Pupil Places:		1,276			LESS: Available Pupil Places:		390
		NET GROWTH RELATED PUPILS:		874			NET GROWTH RELATED PUPILS:		414



## 5.2 Net Education Land Costs

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The enrolment projections, the Board's long-term accommodation plans, conversations with Board staff and the EDC analyses ultimately determine the number of EDC-eligible sites that are needed for new growth-related schools. Form F of the Ministry Submission outlines by review area the 15-year enrolment projections as well as the net growth-related pupil places. Form G of the Ministry Submission outlines the number of new sites that will be needed as well as the number of EDC-eligible acres of land that are required for those sites.

O. Reg. 20/98, section 7, specifically paragraphs 4-7, deals with the steps involved in moving from the site component of the calculation to the financial or costing component of the calculation. A cost must be attached to the value of the land that needs to be purchased as well as the costs to provide services and prepare the land for construction. In addition, the balance of the existing EDC reserve funds must be calculated and incorporated into the analysis. Finally, the total eligible revenues, expenditures and existing deficits or surpluses are cash flowed over a 15-year period to determine the final charge.

Section 257.53 (2) of the *Education Act*, specifically describes what education land costs are:

1. Costs to acquire land or an interest in land, including a leasehold interest, to be used by the board to provide pupil accommodation.
2. Costs to provide services to the land or otherwise prepare the site so that a building or buildings may built on the land to provide pupil accommodation.
3. Costs to prepare and distribute EDC background studies.
4. Interest on money borrowed to pay for costs described in paragraphs 1 and 2.
5. Costs to undertake studies in connection with an acquisition referred to in paragraph 1.



## Site Valuation

Paragraph 4 of section 7 of O. Reg. 20/98 states that,

“The board shall estimate the net education land cost for the school sites required to provide pupil places for the number of new school pupils determined under paragraph 3.4.”

Land values were derived from appraised values for the two school sites the Board is currently in the process of purchasing or making offers on. For the Lincoln/Grimsby site, land was valued at between \$1.25 and \$1.5 million per acre and a final sale price of approximately \$1.35 million per acre was agreed upon. With the Niagara Falls site, land was valued between \$700,000 and \$800,000 per acre.

Typically, when undertaking appraisals, the two most common approaches to the valuation of development land are utilized and are summarized as follows:

- a) the Direct Comparison Approach which involves comparing or contrasting the recent sale, listing or optioned prices of comparable properties to the subject and adjusting for any significant differences between them; and,
- b) the Land Residual Approach (or Development Approach) which estimates land value based on determining selling prices of serviced lots and considers infrastructure costs and appropriate returns, rendering a “residual” land value component.

The strengths underlying the Land Residual Approach are that it more accurately reflects the specific development parameters of a site, while its weaknesses relate to the preliminary nature of planning and engineering information available. The strengths underlying the Direct Comparison Approach are that it more accurately reflects market attitudes to development land, while its weaknesses relate to the specifics of the subject properties, particularly those that are draft plan approved. For all the subject properties, except where noted, both approaches have been utilized.

The tables on the following page set out the estimated EDC-eligible sites that the Board will require in the 15-year analysis term and its appraised land values on per acre basis. These values were calculated in 2020 and do not include escalation, site improvements, land transfer taxes, HST (net of rebate) or other associated acquisition costs.





Table 5.3: NCDSB Former Lincoln Sites

ELEMENTARY PANEL	
ERA11 Site #1	OWNED(PENDING CLOSURE)

Table 5.4: NCDSB Former Welland Sites

ELEMENTARY PANEL	
ERA03 Site #1	OWNED (PENDING CLOSURE) \$700,000
ERA03 Site #2	

### Land Escalation Over the Forecast Period

As previously mentioned, the EDC report typically contains estimates an annual land escalation rate to be applied to the acreage values in order to sustain the likely site acquisition costs over the next five years. Due to the uncertain economic conditions at the time this report was prepared, no escalation rates have been applied.

### Land Development and Servicing Costs

The *Education Act* includes the “costs to provide services to the land or otherwise prepare the site so that a building or buildings may be built on the land to provide pupil accommodation” as an EDC-eligible education cost. These costs typically include services to the lot line of the property, rough grading and compaction of the site and that the site is cleared of debris. Costs related to studies of land being considered for acquisition such as environmental assessments or soil studies are also considered to be EDC eligible.

Discussions with stakeholders and the Ministry of Education in past EDC by-law processes have resulted in a list that includes some of the primary development and servicing costs that are considered to be EDC eligible:

- Agent/commission fees to acquire sites;
- Municipal requirements to maintain sites prior to construction;
- Appraisal studies, legal fees;
- Expropriation costs;



- Site option agreements; and
- Land transfer taxes.

A figure of \$53,974 per acre was used in the study for site preparation costs. The figure used in this study is consistent with the figure used in the Board's 2015 EDC report and has been escalated to reflect 2020 costs. Using historical construction cost indices, an escalation factor of 3.1% per annum was derived and applied to the assumed per acre site preparation costs. Site preparation costs are escalated to the time of site purchase.

### **Total Land Costs**

The total net education land costs, including the site acquisition costs, the escalation of land over the term of the by-law (five years), the site development/servicing costs, as well as associated financing costs and study costs are projected to be over **\$17.7** million for the Board. Both the Former Lincoln portion and the Former Welland portion are projected to incur total education land costs of **\$9.4 and \$8.3** million respectively over the 15-year term of the proposed by-law.

## **5.3 Reconciliation of the EDC Reserve Fund**

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Before the final growth-related net education land costs can be determined they must be adjusted by any deficit or surplus in the existing EDC reserve fund. Any outstanding EDC financial obligations that have been incurred by the Board under a previous by law are added to the total land costs. If there is a positive balance in the EDC reserve fund, this amount is subtracted from the total land costs and used to defray EDC-eligible expenditures.

Section 7, paragraphs 5-7 of O. Reg. 20/98 describe the process of deriving the final net education land costs.

“The board shall estimate the balance of the education development charge reserve fund, if any, relating to the area in which the charges are to be imposed. The estimate shall be an estimate of the balance immediately before the day the board intends to have the by-law come into force.”

“The board shall adjust the net education land costs with respect to any balance estimated under paragraph 5. If the balance is positive, the



balance shall be subtracted from the cost. If the balance is negative, the balance shall be converted to a positive number and added to the cost.”

“The net education land cost as adjusted, if necessary, under paragraph 6, is the growth-related net education land cost.”

The reserve fund analysis summarizes the EDC collections (both actual and estimated) as well as the EDC costs that have been expended (both actual and estimated) and the estimated EDC reserve fund balance. It is based on the Ministry of Education Appendix D1 and D2 Forms that are prepared and submitted to the Ministry by all school boards with EDC by-laws in place. The balance from the most recent Appendix D1/D2 is used as the base point. The EDC reserve fund must also include certain estimates respecting revenues and expenditures to account for the most recent actual balance and the balance estimated to the new EDC by-law date.

Incorporating actual collections and expenditures since 2015 as well as estimates to the proposed new by-law inception date, the new reserve fund balance for the NCDSB's Former Lincoln portion is a deficit and estimated at **-\$7,075,088**, and the Former Welland portion's reserve fund balance is also in a deficit position estimated at **-\$3,128,536**.

## 5.4 The Education Development Charge

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The total land costs, adjusted by any surplus or deficit in the EDC reserve fund, determine the total net education land costs for which EDCs may be imposed. The final steps in the process involve apportioning the land costs between residential and non-residential as well as differentiating the charge by development type, if necessary. The existing EDC by-laws of both by-law areas are based on a 100% residential charge and the EDCs are a uniform rate across all types of development. The proposed charge in this background study is premised on the same assumptions. In addition, a differentiated residential charge is also presented as part of the EDC Forms package contained in Appendix A.

The final net education land costs that have been apportioned to residential (in this case 100%) are divided over the net new units from the dwelling forecast to determine a final EDC rate per dwelling unit.



The net education land costs for the Former Lincoln by-law are estimated to be **\$9,351,426** and the number of net new units in the EDC forecast is projected to be **19,240**, resulting in a new proposed or “maximum” rate of **\$4,86** per dwelling unit.

The net education land costs for the Former Welland by-law are estimated to be **\$8,357,353** and the number of net new units in the EDC forecast is projected to be **21,348**, resulting in a new proposed or “maximum” rate of **\$391** per dwelling unit.

Table 5.5 and Table 5.6 outline the total growth-related net education land costs, the net new units and the final proposed new EDC “maximum” rates.

Table 5.5: NCDSB – Former Lincoln EDC  
Calculation of Uniform 100% Residential

Residential Growth-Related Net Education Land Costs	\$9,351,426
Net New Dwelling Units (Form C)	19,240
<b>Uniform Residential EDC Per Dwelling Unit</b>	<b>\$486</b>

Table 5.6: NCDSB – Former Welland EDC  
Calculation of Uniform 100% Residential

Residential Growth-Related Net Education Land Costs	\$8,357,353
Net New Dwelling Units (Form C)	21,348
<b>Uniform Non-Residential EDC Per Square Foot of GFA</b>	<b>\$391</b>

## EDC Rate Phase-In

As described earlier in the report, the final step in the EDC calculation is to determine the permitted phase-in of EDC rates. The existing in-force EDC rates for the NCDSB by-laws are \$186 per residential unit in Former Lincoln and \$172 per residential unit in Former Welland. Under these conditions, both areas would not require a phase-in of EDC rates and are permitted to enforce EDC rates of the maximum amount in year 1 of the proposed new by-law. These rates have been calculated to be **\$486** per unit in Former Lincoln and **\$391** per unit in Former Welland. Table 5.7 provides a summary of the existing EDC rates, the proposed phase-in of rates and the new maximum rate over the five-year by-law term.



Table 5.7: NCDSB EDC Phase-in of Rates (100% residential – \$/unit)

AREA SPECIFIC EDC	2015 EDC RATE	YEAR 1	YEAR 2	YEAR 3	YEAR 4	YEAR 5	MAXIMUM RATE
NCDSB - FORMER LINCOLN	\$ 186	\$ 486	\$ 486	\$ 486	\$ 486	\$ 486	\$ 486
NCDSB - FORMER WELLAND	\$ 172	\$ 391	\$ 391	\$ 391	\$ 391	\$ 391	\$ 391

## The Cashflow Analysis

A cashflow analysis was completed, incorporating all eligible EDC expenditures, current reserve fund balances and land escalation factors, to determine the necessary revenues that will be collected through the imposition of EDCs. When revenue in any given year is insufficient to cover the expenditures, interim financing (on a short- or long-term basis) is assumed. The methodology used for the cashflow analysis is consistent with accounting practices used by many school boards, municipalities and financial lenders across the Province.

### General Assumptions Used

The cashflow analysis must incorporate certain assumptions respecting interest rates, terms, escalation, etc. The table below outlines the general assumptions that have been used for the EDC analysis.

Site Acquisition Escalation Rate	No Escalation
Site Preparation Escalation Rate	3.1% per annum
EDC Reserve Fund Interest Earnings	1.5%
Debt Terms (term/rate)	5 Years at 3.00%

### Description of Cashflow

The first section of the cashflow deals with **revenue**. There are two distinct components to the revenue section of the cashflow:

1. The first component deals with any debt the Board incurs. The total debt issuance for any given year will be identified in Lines 1 or 2 of the analysis.



2. The second component deals with the actual expected collections through the imposition of the EDC incorporating the annual net new dwelling unit forecast and non-residential forecast (if available). Projected EDC collections by year can be found on Lines 4, 5 and 6 of the cashflow.

The second section of the cashflow deals with **expenditures** – the eligible EDC expenditures incorporate the site acquisition and development costs, study costs and financing costs for incurred debt.

- Site acquisition costs are found on Line 8 of the analysis and are escalated for up to a five-year period (term of the by-law).
- Site preparation/development costs are found on Line 9 of the cashflow and are escalated up to the time of site purchase.
- Study costs (Line 10) are based on actual and projected board data and are included for each expected subsequent by-law renewal (every five years).
- Long- and short-term financing costs (debt carrying costs) are found on Lines 11 and 12 of the cashflow analysis.

The final section of the cashflow provides the projected opening and closing balances of the EDC reserve fund incorporating any existing deficit or surplus as well as annual interest earnings on any balance in the account. Total borrowing, debt payments and outstanding debt can be found in the bottom right portion of the cashflow analysis.

Cashflows for the School Board and each by-law are included in Table 5.8 and Table 5.9 on the following pages.



Table 5.8: NCDSB 15-Year Cashflow  
Former Lincoln EDC By-law

Cash Flow Assumptions	
A. Reserve Fund Interest Rate	1.50%
B. Borrowing Rate	3.00%
C. Borrowing Term (Years)	5

		Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10	Year 11	Year 12	Year 13	Year 14	Year 15
		2020/ 2021	2021/ 2022	2022/ 2023	2023/ 2024	2024/ 2025	2025/ 2026	2026/ 2027	2027/ 2028	2028/ 2029	2029/ 2030	2030/ 2031	2031/ 2032	2032/ 2033	2033/ 2034	2034/ 2035
Projected Revenues																
1	Long Term Financing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2	Short Term Financing	\$6,900,000	\$1,000,000	\$1,150,000	\$1,400,000	\$1,800,000	\$2,050,000	\$1,050,000	\$950,000	\$900,000	\$900,000	\$600,000	\$400,000	\$0	\$0	\$0
3	Subtotal (1 through 2)	\$6,900,000	\$1,000,000	\$1,150,000	\$1,400,000	\$1,800,000	\$2,050,000	\$1,050,000	\$950,000	\$900,000	\$900,000	\$600,000	\$400,000	\$0	\$0	\$0
4	Education Development Charge Revenue (Res) 486 per unit	\$520,799	\$520,799	\$578,550	\$578,550	\$578,550	\$578,550	\$578,550	\$665,298	\$665,298	\$665,298	\$665,298	\$665,298	\$696,864	\$696,864	\$696,864
5	Education Development Charge Revenue (Non-Res) 0.00 per sq.ft	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
6	Subtotal EDC Revenue (4 + 5)	\$520,799	\$520,799	\$578,550	\$578,550	\$578,550	\$578,550	\$578,550	\$665,298	\$665,298	\$665,298	\$665,298	\$665,298	\$696,864	\$696,864	\$696,864
7	Total Revenue (3 + 6)	\$7,420,799	\$1,520,799	\$1,728,550	\$1,978,550	\$2,378,550	\$2,628,550	\$1,628,550	\$1,615,298	\$1,565,298	\$1,565,298	\$1,265,298	\$1,065,298	\$696,864	\$696,864	\$696,864
Education Development Charge Expenditures																
8	Site acquisition costs (Escalation Rates Included) 1	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9	Site preparation costs (Escalation Rates Included) 1	\$298,476	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
10	Projected Future Study Costs	\$0				\$75,000					\$75,000					\$75,000
11	Long Term Debt Costs	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
12	Short Term Debt Costs	\$0	\$1,506,647	\$1,725,001	\$1,976,109	\$2,281,805	\$2,674,843	\$1,615,824	\$1,626,742	\$1,583,071	\$1,473,893	\$1,277,374	\$960,760	\$818,830	\$611,393	\$414,874
13	Total Expenditures (8 through 12)	\$298,476	\$1,506,647	\$1,725,001	\$1,976,109	\$2,356,805	\$2,674,843	\$1,615,824	\$1,626,742	\$1,583,071	\$1,548,893	\$1,277,374	\$960,760	\$818,830	\$611,393	\$489,874
Cashflow Analysis:																
14	Revenues Minus Expenditures (7 - 13)	\$7,122,323	\$14,152	\$3,549	\$2,441	\$21,745	-\$46,294	\$12,726	-\$11,444	-\$17,773	\$16,404	-\$12,077	\$104,537	-\$121,966	\$85,471	\$206,990
15	Opening Balance (previous year's closing balance)	-\$7,075,088	-\$7,075,088	\$47,235	\$62,308	\$66,845	\$70,325	\$93,451	\$47,864	\$61,499	\$50,806	\$33,528	\$50,681	\$39,183	\$145,876	\$24,269
16	Sub total (14 + 15)	-\$7,075,088	\$47,235	\$61,387	\$65,857	\$69,286	\$92,070	\$47,157	\$60,590	\$50,055	\$33,033	\$49,932	\$38,604	\$143,720	\$23,910	\$318,376
17	Interest Earnings	\$0	\$921	\$988	\$1,039	\$1,381	\$707	\$909	\$751	\$495	\$749	\$579	\$2,156	\$359	\$1,646	\$4,776
18	Closing Balance (16 + 17)	-\$7,075,088	\$47,235	\$62,308	\$66,845	\$70,325	\$93,451	\$47,864	\$61,499	\$50,806	\$33,528	\$50,681	\$39,183	\$145,876	\$24,269	\$323,152

1 Land acquisition costs have not been escalated.  
Escalation rates for site preparation costs are applied to the date of acquisition and are escalated by 3.1% compounded annually.

Borrowing (Total of Line 3 and 4):\$19,100,000

Total Debt Payments:\$20,852,862

Outstanding Debt At End Of Forecast(15 years):\$305,696

Outstanding Debt Will Be Fully Funded In:2036



Table 5.9: NCDSB 15-Year Cashflow  
Former Welland EDC By-law

Cash Flow Assumptions	
A. Reserve Fund Interest Rate	1.50%
B. Borrowing Rate	3.00%
C. Borrowing Term (Years)	5

		Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
Projected Revenues																
1	Long Term Financing	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
2	Short Term Financing	\$3,000,000	\$250,000	\$200,000	\$250,000	\$350,000	\$350,000	\$3,600,000	\$400,000	\$450,000	\$600,000	\$600,000	\$650,000	\$0	\$0	\$0
3	Subtotal (1 through 2)	\$3,000,000	\$250,000	\$200,000	\$250,000	\$350,000	\$350,000	\$3,600,000	\$400,000	\$450,000	\$600,000	\$600,000	\$650,000	\$0	\$0	\$0
4	Education Development Charge Revenue (Res) 391 per unit	\$410,921	\$410,921	\$516,523	\$516,523	\$516,523	\$516,523	\$516,523	\$604,234	\$604,234	\$604,234	\$604,234	\$604,234	\$643,908	\$643,908	\$643,908
5	Education Development Charge Revenue (Non-Res) 0.00 per sq.ft	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
6	Subtotal EDC Revenue (4 + 5)	\$410,921	\$410,921	\$516,523	\$516,523	\$516,523	\$516,523	\$516,523	\$604,234	\$604,234	\$604,234	\$604,234	\$604,234	\$643,908	\$643,908	\$643,908
7	Total Revenue (3 + 6)	\$3,410,921	\$660,921	\$716,523	\$766,523	\$866,523	\$866,523	\$4,116,523	\$1,004,234	\$1,054,234	\$1,204,234	\$1,204,234	\$1,254,234	\$643,908	\$643,908	\$643,908
Education Development Charge Expenditures																
8	Site acquisition costs (Escalation Rates Included) <sup>1</sup>	\$0	\$0	\$0	\$0	\$0	\$0	\$3,446,916	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
9	Site preparation costs (Escalation Rates Included) <sup>1</sup>	\$269,870	\$0	\$0	\$0	\$0	\$0	\$305,061	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
10	Projected Future Study Costs	\$0				\$75,000					\$75,000					\$75,000
11	Long Term Debt Costs	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0
12	Short Term Debt Costs	\$0	\$655,064	\$709,652	\$753,323	\$807,912	\$884,336	\$305,696	\$1,037,184	\$1,080,855	\$1,124,526	\$1,179,115	\$1,233,703	\$589,557	\$502,216	\$403,956
13	Total Expenditures (8 through 12)	\$269,870	\$655,064	\$709,652	\$753,323	\$882,912	\$884,336	\$4,057,673	\$1,037,184	\$1,080,855	\$1,199,526	\$1,179,115	\$1,233,703	\$589,557	\$502,216	\$478,956
Cashflow Analysis:																
14	Revenues Minus Expenditures (7 - 13)	\$3,141,051	\$5,857	\$6,871	\$13,200	-\$16,389	-\$17,813	\$58,850	-\$32,950	-\$26,621	\$4,708	\$25,119	\$20,530	\$54,351	\$141,693	\$164,952
15	Opening Balance (previous year's closing balance)	-\$3,128,536	-\$3,128,536	\$12,515	\$18,648	\$25,902	\$39,689	\$23,650	\$5,925	\$65,747	\$33,289	\$6,768	\$11,648	\$37,319	\$58,717	\$260,304
16	Sub total (14 + 15)	-\$3,128,536	\$12,515	\$18,372	\$25,519	\$39,102	\$23,300	\$5,837	\$64,775	\$32,797	\$6,668	\$11,476	\$36,767	\$57,849	\$113,068	\$425,256
17	Interest Earnings	\$0	\$276	\$383	\$587	\$350	\$88	\$972	\$492	\$100	\$172	\$552	\$868	\$1,696	\$3,847	\$6,379
18	Closing Balance (16 + 17)	-\$3,128,536	\$12,515	\$18,648	\$25,902	\$39,689	\$23,650	\$5,925	\$65,747	\$33,289	\$6,768	\$11,648	\$37,319	\$58,717	\$114,764	\$431,635

1 Land acquisition costs have not been escalated.  
Escalation rates for site preparation costs are applied to the date of acquisition and are escalated by 3.1% compounded annually.

Borrowing (Total of Line 3 and 4):	\$10,700,000
Total Debt Payments:	\$11,681,970
Outstanding Debt At End Of Forecast(15 years):	\$414,874
Outstanding Debt Will Be Fully Funded In:	2036





# Appendices



# Appendix A

## Education Development Charges Ministry of Education Forms Submission



# Appendix A: Education Development Charges Ministry of Education Forms Submission

The Ministry of Education has prepared a set of standard forms that are required to be part of the EDC background study. The forms are used by the Ministry to review the EDC analysis and are standardized so that information is presented in a consistent manner for all school boards. The forms for the Board's EDC analysis are found in this Appendix. In addition, a description of each form and its purpose can be found below.

## **FORM A1 AND A2**

This form is used to determine whether a school board is eligible to impose EDCs. The A1 section of the form includes the Board's approved OTG capacity for each panel, as well as the projected five-year enrolment. If the average five-year projected enrolment is greater than the Board's OTG capacity (on either panel), the Board is eligible to impose EDCs. The A2 section of the form deals with any outstanding EDC financial obligations. The form highlights any outstanding principal less the existing reserve fund balance. A positive financial obligation results in a board being eligible to impose future EDCs.

## **FORM B**

Form B outlines the dwelling unit forecast that was used in the EDC analysis. The forecast is provided by EDC review area and by year for low-, medium- and high-density types of development.

## **FORM C**

This form provides the net new dwelling units that are a requirement of the EDC analysis. Due to certain statutory exemptions (intensification) that were discussed earlier in this report, a certain percentage of units is removed from the forecast to determine the "net new units."

## **FORM D**

Not included as the Board does not have a non-residential EDC component.



## **FORM E**

Form E provides the total number of growth-related pupils by EDC review area. The form includes the net number of units, associated pupil yields and the number of pupils by density type for both the elementary and secondary panels. The bottom of the form provides the total number of growth-related pupils less any existing available space to determine the total “net” growth-related pupils.

## **FORM F**

These forms provide the total “net” growth-related pupil places on a review area basis. Each form provides a projection of the existing community enrolment by school for each of the 15 years in the EDC forecast as well as their current OTG capacities. In addition, the total projected enrolment expected from new development is provided for the total review area. The total requirements from new development less any available existing space are the net growth-related pupil places for that review area.

## **FORM G**

Form G highlights the EDC-eligible sites that the Board is proposing to purchase. Each site listing includes information on location, status, proposed school size and site size. The form also provides information on what percentage of each site is EDC eligible based on eligible pupil places as a percentage of the total proposed capacity of the school. In addition to providing site and eligibility information, Form G is noteworthy because it includes the translation from site requirements to site costs. On a site-by-site basis, the form highlights the expected per acre acquisition costs, site development costs as well as associated escalation and financing costs.

## **FORM H1 or H2**

These forms outline the EDC calculation – Form H1 is used for a uniform EDC rate and Form H2 is used if the Board is proposing a differentiated EDC rate. This EDC analysis assumes a uniform rate and includes Form H1. This form includes all relevant information needed to calculate the final EDC. The total education land costs (derived from Form G) are added to any existing EDC financial obligations (Form A2) and study costs to determine the growth-related net education land costs for which EDCs may be collected. These costs must then be allocated to the proposed residential and non-residential splits. The amount determined to be borne by residential development



(between 60% and 100%) is divided by the total net new units to determine a residential charge by unit.



**NCDSB EDC Forms**  
**(Former Lincoln)**

**Niagara Catholic District School Board - Former Lincoln Portion By-Law**  
**Education Development Charges Submission 2020**  
**Form A - Eligibility to Impose an EDC**

**A.1.1: CAPACITY TRIGGER CALCULATION - ELEMENTARY PANEL**

Elementary Panel Board-Wide EDC Capacity	Projected Elementary Panel Enrolment - Jurisdiction Wide						Elementary Average Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
16,870.0	14,169	14,197	14,236	14,372	14,571	14,309	-2,561

**A.1.2: CAPACITY TRIGGER CALCULATION - SECONDARY PANEL**

Secondary Panel Board-Wide EDC Capacity	Projected Secondary Panel Enrolment - Jurisdiction Wide						Secondary Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
7,278.0	6,490	6,470	6,527	6,544	6,526	6,511	-767

**A.2: EDC FINANCIAL OBLIGATIONS**

Total Outstanding EDC Financial Obligations (Reserve Fund Balance):	-\$ 7,075,088
---	---------------

**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form B - Dwelling Unit Summary**

**PROJECTION OF GROSS NEW DWELLING UNITS BY ELEMENTARY EDC REVIEW AREA**

	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035	Total All Units
<b>St. Catharines</b>																
Low Density	95	95	108	108	108	108	108	132	132	132	132	132	142	142	142	1,816
Medium Density	164	164	189	189	189	189	189	231	231	231	231	231	248	248	248	3,173
High Density	211	211	243	243	243	243	243	297	297	297	297	297	318	318	318	4,078
<b>Total</b>	<b>470</b>	<b>470</b>	<b>540</b>	<b>540</b>	<b>540</b>	<b>540</b>	<b>540</b>	<b>661</b>	<b>661</b>	<b>661</b>	<b>661</b>	<b>661</b>	<b>708</b>	<b>708</b>	<b>708</b>	<b>9,068</b>
<b>NOTL</b>																
Low Density	121	121	93	93	93	93	93	71	71	71	71	71	89	89	89	1,328
Medium Density	49	49	48	48	48	48	48	41	41	41	41	41	44	44	44	671
High Density	18	18	21	21	21	21	21	19	19	19	19	19	20	20	20	295
<b>Total</b>	<b>188</b>	<b>188</b>	<b>161</b>	<b>161</b>	<b>161</b>	<b>161</b>	<b>161</b>	<b>131</b>	<b>131</b>	<b>131</b>	<b>131</b>	<b>131</b>	<b>153</b>	<b>153</b>	<b>153</b>	<b>2,294</b>
<b>West Lincoln</b>																
Low Density	91	91	155	155	155	155	155	207	207	207	207	207	219	219	219	2,652
Medium Density	24	24	38	38	38	38	38	49	49	49	49	49	32	32	32	579
High Density	6	6	9	9	9	9	9	12	12	12	12	12	8	8	8	145
<b>Total</b>	<b>121</b>	<b>121</b>	<b>203</b>	<b>203</b>	<b>203</b>	<b>203</b>	<b>203</b>	<b>269</b>	<b>269</b>	<b>269</b>	<b>269</b>	<b>269</b>	<b>259</b>	<b>259</b>	<b>259</b>	<b>3,376</b>
<b>Grimsby and Lincoln</b>																
Low Density	88	88	125	125	125	125	125	155	155	155	155	155	158	158	158	2,051
Medium Density	115	115	97	97	97	97	97	102	102	102	102	102	103	103	103	1,535
High Density	113	113	89	89	89	89	89	80	80	80	80	80	81	81	81	1,309
<b>Total</b>	<b>316</b>	<b>316</b>	<b>311</b>	<b>311</b>	<b>311</b>	<b>311</b>	<b>311</b>	<b>337</b>	<b>337</b>	<b>337</b>	<b>337</b>	<b>337</b>	<b>342</b>	<b>342</b>	<b>342</b>	<b>4,895</b>
<b>Total Jurisdiction</b>																
Low Density	396	396	481	481	481	481	481	565	565	565	565	565	608	608	608	7,848
Medium Density	352	352	372	372	372	372	372	423	423	423	423	423	426	426	426	5,958
High Density	347	347	362	362	362	362	362	408	408	408	408	408	427	427	427	5,827
<b>Total</b>	<b>1,095</b>	<b>1,095</b>	<b>1,215</b>	<b>1,215</b>	<b>1,215</b>	<b>1,215</b>	<b>1,215</b>	<b>1,397</b>	<b>1,397</b>	<b>1,397</b>	<b>1,397</b>	<b>1,397</b>	<b>1,462</b>	<b>1,462</b>	<b>1,462</b>	<b>19,633</b>



**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form C - Net New Dwelling Units - By-Law Summary**

<b>Elementary Planning Review Areas</b>	<b>Number of Units</b>
St. Catharines	9,068
NOTL	2,294
West Lincoln	3,376
Grimsby and Lincoln	4,895
<b>Grand Total Gross New Units In By-Law Area</b>	<b>19,633</b>
<b>Less: Statutorily Exempt Units In By-Law Area</b>	<b>393</b>
<b>Total Net New Units In By-Law Area</b>	<b>19,240</b>

**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form D - Non-Residential Development**

**D1 - Non-Residential Charge Based On Gross Floor Area (sq. ft.)**

<b>Total Estimated Non-Residential Board-Determined Gross Floor Area to be Constructed Over 15 Years From Date of By-Law Passage:</b>	<b>2,399,208</b>
<b>Less: Board-Determined Gross Floor Area From Exempt Development:</b>	<b>583,097</b>
<b>Net Estimated Board-Determined Gross Floor Area:</b>	<b>1,816,111</b>

## Niagara Catholic District School Board - Former Lincoln Portion By-Law

## Education Development Charges Submission 2020

## Form E - Growth Related Pupils - Elementary Panel

Elementary Planning Area	Dwelling Unit Type	Net New Units	Elementary Pupil Yield	Elementary Growth-Related Pupils
St. Catharines	Low Density	1,816	0.14	258
	Medium Density	2,964	0.06	169
	High Density	4,078	0.02	98
	Total	8,859	0.06	526
NOTL	Low Density	1,328	0.07	89
	Medium Density	627	0.04	27
	High Density	295	0.02	5
	Total	2,250	0.05	122
West Lincoln	Low Density	2,652	0.11	296
	Medium Density	541	0.04	23
	High Density	145	0.02	3
	Total	3,338	0.10	322
Grimsby and Lincoln	Low Density	2,051	0.19	396
	Medium Density	1,434	0.09	132
	High Density	1,309	0.03	37
	Total	4,794	0.12	565
		SUBTOTAL:		1,534
		LESS: Available Pupil Places:		738
		NET GROWTH RELATED PUPILS:		797

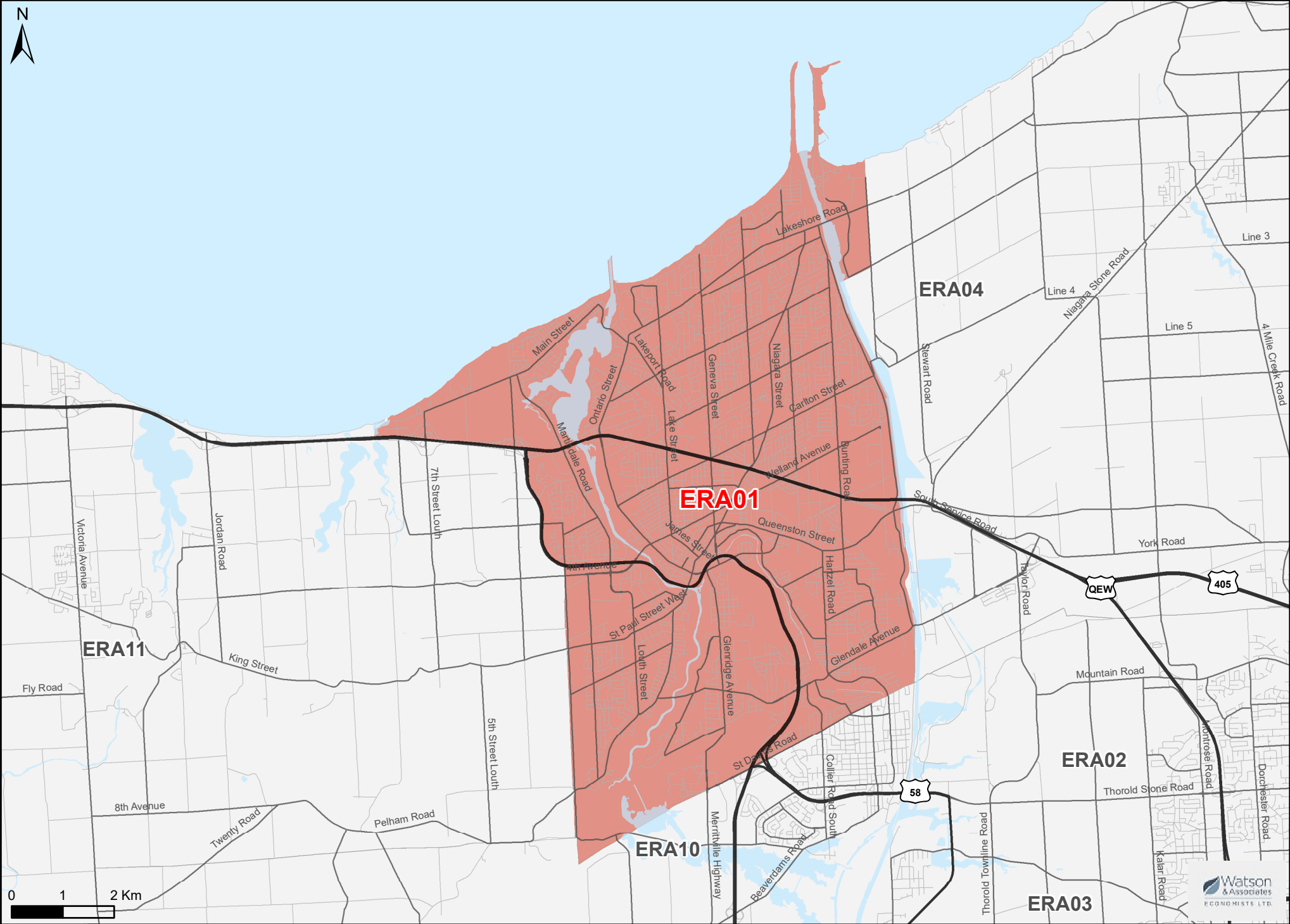
## Niagara Catholic District School Board - Former Lincoln Portion By-Law

## Education Development Charges Submission 2020

## Form E - Growth Related Pupils - Secondary Panel

Secondary Planning Area	Dwelling Unit Type	Net New Units	Secondary Pupil Yield	Secondary Growth-Related Pupils
St. Catharines, NOTL, Part Lincoln	Low Density	3,262	0.07	221
	Medium Density	3,745	0.04	135
	High Density	4,467	0.01	62
	Total	11,474	0.04	418
Lincoln, West Lincoln, Grimsby	Low Density	4,586	0.06	281
	Medium Density	1,820	0.03	62
	High Density	1,360	0.02	23
	Total	7,766	0.05	366
		SUBTOTAL:		784
		LESS: Available Pupil Places:		418
		NET GROWTH RELATED PUPILS:		366

# ERA01: St. Catharines



Panel:	<u>Elementary Panel</u>	
Review Area:	ERA01	St. Catharines

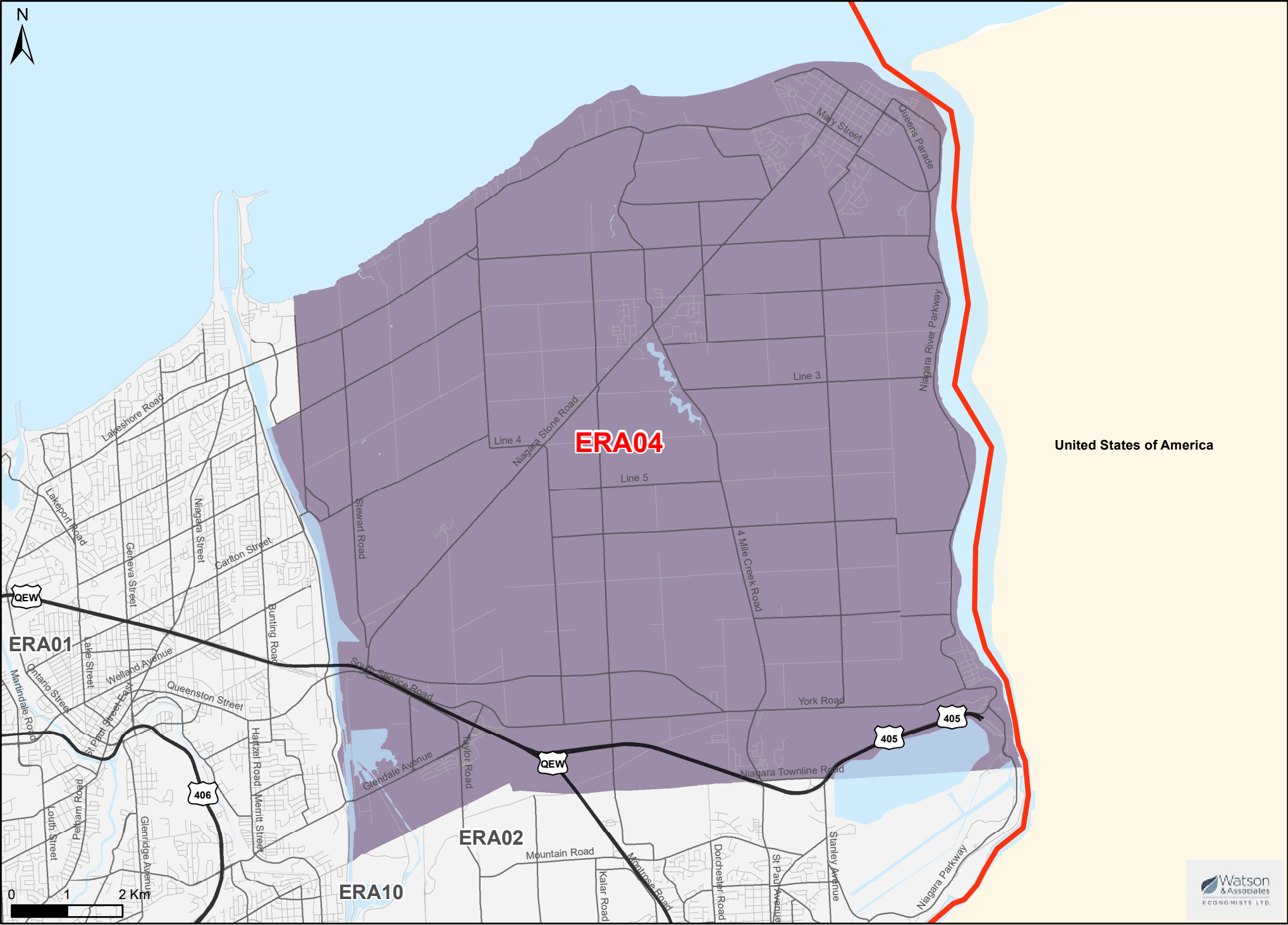
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	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	27	54	85	116	147	175	203	238	272	307	349	391	436	481	526

1	Requirements of New Development (Pupil Places)	526
2	Available Pupil Places in Existing Facilities	1127
3	Net Growth-Related Pupil Place Requirements (1-2)	0

## NOTES

# ERA04: Niagara-on-the-Lake



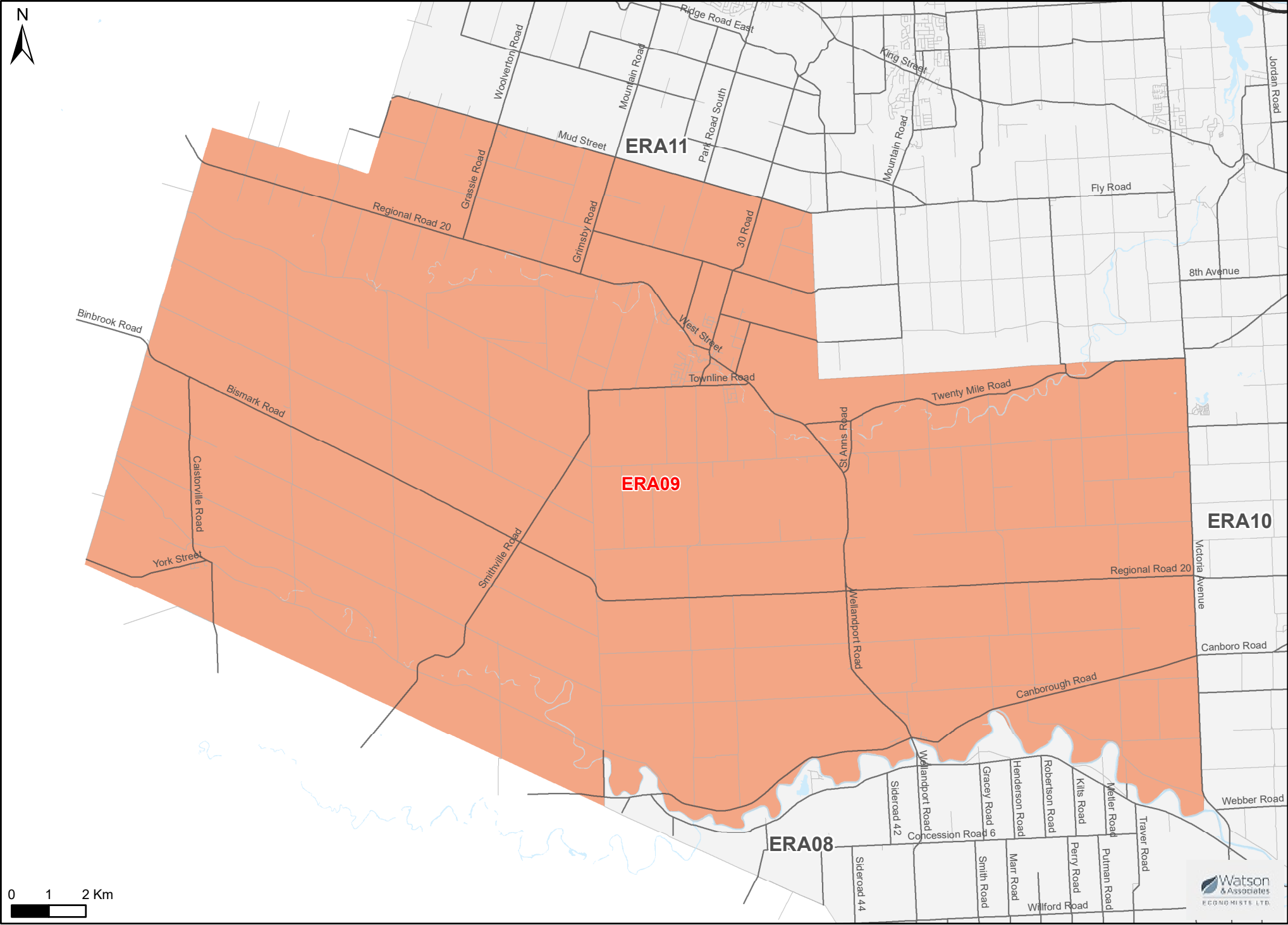
Panel:	<u>Elementary Panel</u>	
Review Area:	ERA04	<u>NOTL</u>
<u>REQUIREMENTS OF EXISTING COMMUNITY</u>		

#### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

#### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

## NOTES

# ERA09: West Lincoln





Panel:	<u>Elementary Panel</u>	
Review Area:	ERA09	<u>West Lincoln</u>
<u>REQUIREMENTS OF EXISTING COMMUNITY</u>		

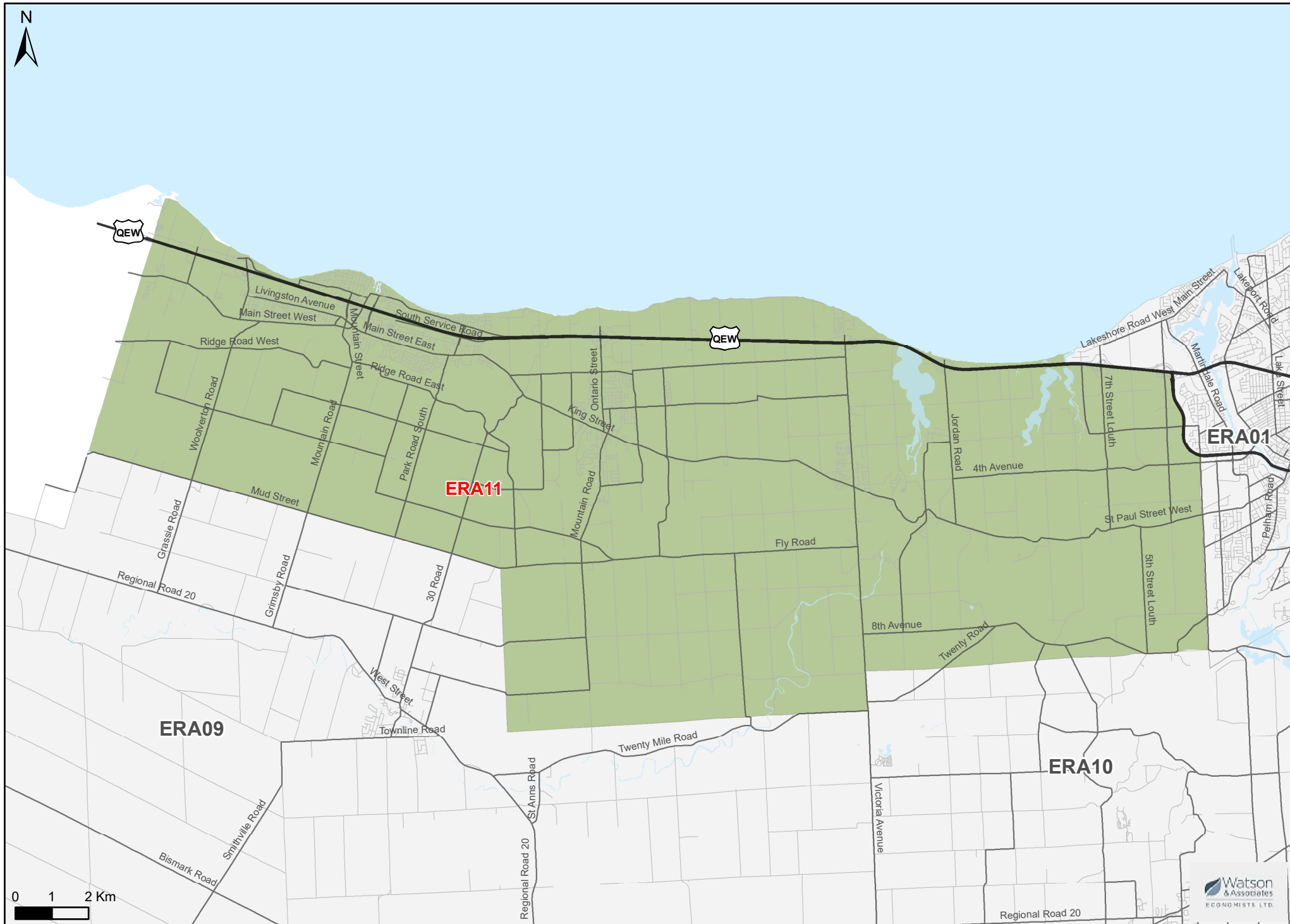
#### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

#### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

1	Requirements of New Development (Pupil Places)	322
2	Available Pupil Places in Existing Facilities	130
3	Net Growth-Related Pupil Place Requirements (1-2)	191

## NOTES

## ERA11: Grimsby and Lincoln



## NOTES

The map displays the Niagara Region, divided into three Strategic Planning Areas (SRAs): SRA01 (dark grey), SRA02 (light grey), and SRA03 (white). The SRA01 area is the largest and is located in the northern part of the region. SRA02 is located in the southern part, and SRA03 is located in the western part. The map shows a network of roads, including major highways like 406, 405, 420, and 58. Water bodies, including Lake Erie and the Niagara River, are shown in blue. The international border with the United States of America is marked with a red line. A scale bar at the bottom right indicates distances of 0, 1, and 2 Km. A north arrow is located in the top left corner. The map also includes labels for various streets and roads, such as Queen Street, Main Street, Lakeshore Road, and Niagara Stone Road. The SRA01 area is labeled with 'SRA01' in red text. The SRA02 area is labeled with 'SRA02' in black text. The SRA03 area is labeled with 'SRA03' in black text. The map is credited to 'Watson & Associates ECONOMISTS LTD.' in the bottom left corner.

Panel:	Secondary Panel
Review Area:	SRA01 St. Catharines, NOTL, Part Lincoln

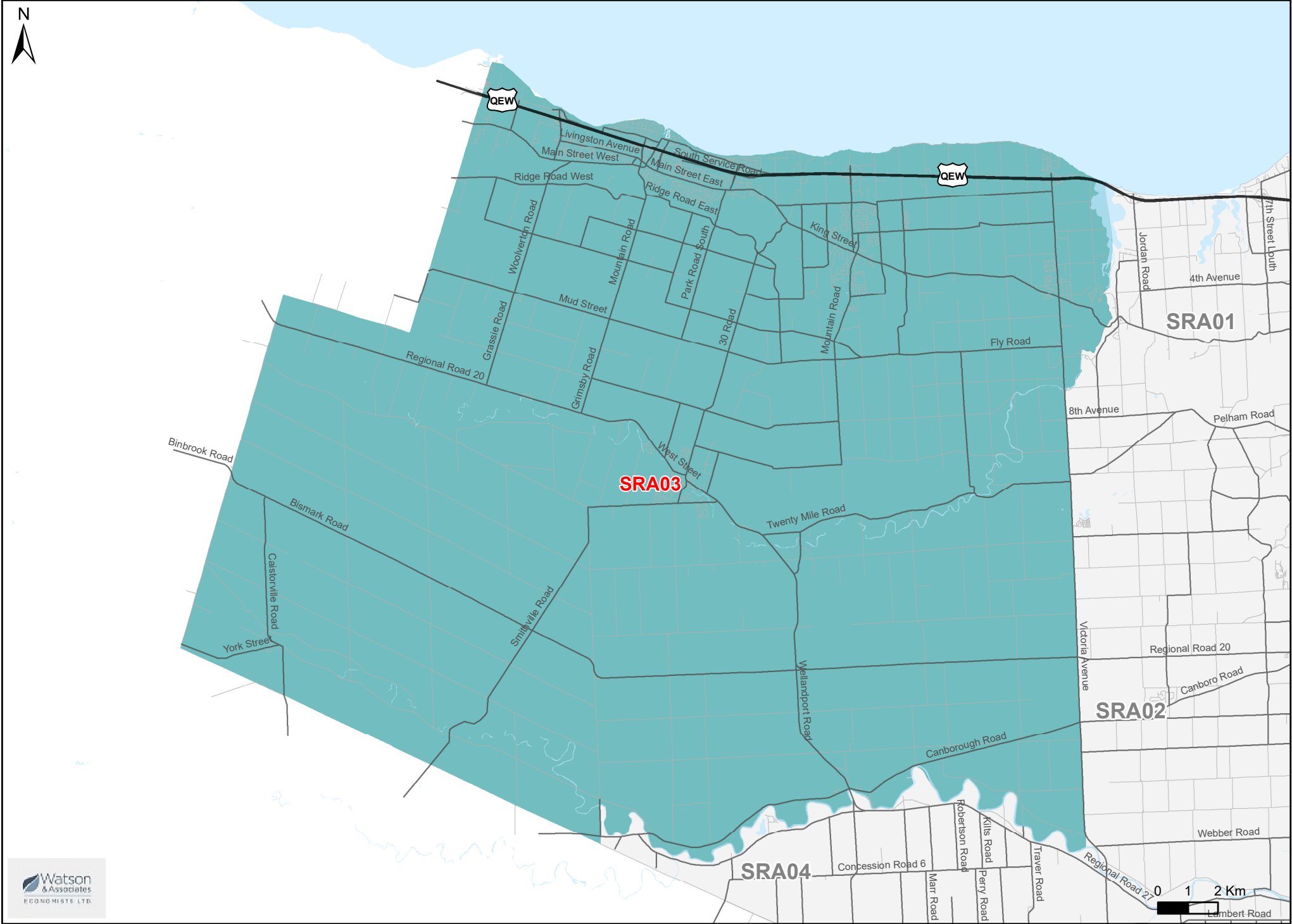
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	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	22	46	69	91	114	138	162	189	216	242	274	306	343	381	418

1	Requirements of New Development (Pupil Places)	418
2	Available Pupil Places in Existing Facilities	925
3	Net Growth-Related Pupil Place Requirements (1-2)	-

## NOTES

# SRA03: Lincoln, West Lincoln, Grimsby



**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form F - Growth Related Pupil Place Requirements**

**Review Area:**

SRA03	Lincoln, West Lincoln, Grimsby
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### REQUIREMENTS OF EXISTING COMMUNITY

[illegible]

### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	14	28	47	66	85	107	128	155	182	209	240	272	303	335	366

#### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

1	Requirements of New Development (Pupil Places)	366
2	Available Pupil Places in Existing Facilities	-
3	Net Growth-Related Pupil Place Requirements (1-2)	366

## NOTES

Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2019  
Form G - Growth-Related Net Education Land Costs

ELEMENTARY PANEL

	Review Area	Site Status  (Optioned,  Purchased,  Reserved, Etc.)	Proposed  Year Of  Acquisition	Site Location/  Facility Type	Net Growth-  Related Pupil  Place  Requirements	Proposed  School  Capacity	Percent of Capacity  Attributed to Net Growth-  Related Pupil Place  Requirements	Total Number of  Acres Required  (Footnote Oversized Sites)	Acreage To Be  Funded in EDC  By-Law Period	Cost Per  Acre	Education  Land Costs	Eligible Site  Preparation  Costs	Land  Escalation  Costs	Financing  Costs	Total  Education  Land Costs
	ERA04			Accommodated In Existing Facilities Or Through Additions/Temporary Space	41										
	ERA09			Accommodated In Existing Facilities Or Through Additions/Temporary Space	191										
	ERA11	Close Of Sale Pending	2020	New School Or Addition (New Lincoln/Grimsby Elementary School Site)	501	501	100.00%	5.53	5.53	\$ -	\$ -	\$ 298,476		\$ 1,752,862	\$ 2,051,338
	ERA11			Accommodated In Existing Facilities Or Through Additions/Temporary Space	64										
	Total:				797	501		5.5	5.5		\$ -	\$ 298,476	\$ -	\$ 1,752,862	\$ 2,051,338

SECONDARY PANEL

	Review Area	Site Status  (Optioned,  Purchased,  Reserved, Etc.)	Proposed  Year Of  Acquisition	Facility  Type	Net Growth-  Related Pupil  Place  Requirements	Proposed  School  Capacity	Percent of Capacity  Attributed to Net Growth-  Related Pupil Place  Requirements	Total Number of  Acres Required  (Footnote Oversized Sites)	Acreage To Be  Funded in EDC  By-Law Period	Cost Per  Acre	Education  Land Costs	Eligible Site  Preparation  Costs	Land  Escalation  Costs	Financing  Costs	Total  Education  Land Costs
	SRA03			Accommodated In Existing Facilities Or Through Additions/Temporary Space	366						\$ -				
	Total:				366	-		0.00	0.00		\$ -	\$ -	\$ -	\$ -	\$ -



**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2019  
Form H1 - EDC Calculation - Uniform Residential**

**Determination of Total Growth-Related Net Education Land Costs**

<b>Total:</b>	<b>Education Land Costs (Form G)</b>	<b>\$</b>	<b>2,051,338</b>
<b>Add:</b>	<b>EDC Financial Obligations (Form A2)</b>	<b>\$</b>	<b>7,075,088</b>
<b>Subtotal:</b>	<b>Net Education Land Costs</b>	<b>\$</b>	<b>9,126,426</b>
<b>Subtotal:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$</b>	<b>9,126,426</b>
<b>Add:</b>	<b>EDC Study Costs</b>	<b>\$</b>	<b>225,000</b>
<b>Total:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$</b>	<b>9,351,426</b>

**Apportionment of Total Growth-Related Net Education Land Costs**

<b>Total Growth-Related Net Education Land Costs to be Attributed to Non-Residential Development (Maximum 40%)</b>	<b>0%</b>	<b>\$</b>	<b>-</b>
<b>Total Growth-Related Net Education Land Costs to be Attributed to Residential Development</b>	<b>100%</b>	<b>\$</b>	<b>9,351,426</b>

**Calculation of Uniform Residential Charge**

<b>Residential Growth-Related Net Education Land Costs</b>	<b>\$</b>	<b>9,351,426</b>
<b>Net New Dwelling Units (Form C)</b>		<b>19,240</b>
<b>Uniform Residential EDC per Dwelling Unit</b>	<b>\$</b>	<b>486</b>

**Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form H2 - EDC Calculation - Differentiated Residential (Part 1 of 2)**

**Determination of Total Growth-Related Net Education Land Costs**

<b>Total:</b>	Education Land Costs (Form G)	\$ 2,051,338
<b>Add:</b>	EDC Financial Obligations (Form A2)	\$ 7,075,088.00
<b>Subtotal:</b>	<b>Net Education Land Costs</b>	<b>\$ 9,126,426</b>
<b>Subtotal:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$ 9,126,426</b>
<b>Add:</b>	EDC Study Costs	\$ 225,000.00
<b>Total:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$ 9,351,426</b>

**Apportionment of Total Growth-Related Net Education Land Costs**

<b>Total Growth-Related Net Education Land Costs to be Attributed to Non-Residential Development (Maximum 40%)</b>	<b>0%</b>	<b>\$ -</b>
<b>Total Growth-Related Net Education Land Costs to be Attributed to Residential Development</b>	<b>100%</b>	<b>\$ 9,351,426</b>

Niagara Catholic District School Board - Former Lincoln Portion By-Law  
Education Development Charges Submission 2020  
Form H2 - EDC Calculation - Differentiated Residential (Part 2 of 2)

Residential Growth-Related Net Education Land Costs:	\$ 9,351,426
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Determination of Distribution of New Development:

Type of Development (Form B)	Net New Units (Form B & C)	15-Year Elementary Pupil Yield (Form E)	Elementary Gross Requirements of New Development	Distribution of Elementary Gross Requirements of New Development	15-Year Secondary Pupil Yield (Form E)	Secondary Gross Requirements of New Development	Distribution of Secondary Gross Requirements of New Development	Total Gross Requirements of New Development	Distribution Factor
Low Density	7,848	0.132	1,040	67.8%	0.064	502	64%	1,542	67%
Medium Density	5,565	0.063	351	22.9%	0.035	197	25%	548	24%
High Density	5,827	0.025	143	9.3%	0.015	85	11%	229	10%
<b>Total</b>	<b>19,240</b>	<b>0.080</b>	<b>1,534</b>	<b>100%</b>	<b>0.041</b>	<b>784</b>	<b>100%</b>	<b>2,319</b>	<b>100%</b>

Calculation of Differentiated Charge:

Type of Development (Form B)	Apportionment of Residential Net Education Land Cost By Development Type	Net New Units (Carried over from above)	Differentiated Residential EDC per Unit by Development Type
Low Density	\$ 6,219,267	7,848	\$ 792
Medium Density	\$ 2,210,221	5,565	\$ 397
High Density	\$ 921,938	5,827	\$ 158



## **NCDSB EDC Forms (Former Welland)**

**Niagara Catholic District School Board - Former Welland Portion By-Law**  
**Education Development Charges Submission 2020**  
**Form A - Eligibility to Impose an EDC**

**A.1.1: CAPACITY TRIGGER CALCULATION - ELEMENTARY PANEL**

Elementary Panel Board-Wide EDC Capacity	Projected Elementary Panel Enrolment - Jurisdiction Wide						Elementary Average Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
16,870.0	14,169	14,197	14,236	14,372	14,571	14,309	-2,561

**A.1.2: CAPACITY TRIGGER CALCULATION - SECONDARY PANEL**

Secondary Panel Board-Wide EDC Capacity	Projected Secondary Panel Enrolment - Jurisdiction Wide						Secondary Projected Enrolment less Capacity
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Average Projected Enrolment Over Five Years	
7,278.0	6,490	6,470	6,527	6,544	6,526	6,511	-767

**A.2: EDC FINANCIAL OBLIGATIONS**

Total Outstanding EDC Financial Obligations (Reserve Fund Balance):	-\$ 3,128,536
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**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form B - Dwelling Unit Summary**

**PROJECTION OF GROSS NEW DWELLING UNITS BY ELEMENTARY EDC REVIEW AREA**

	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035	Total All Units
<b>Niagara Falls North</b>																
Low Density	18	18	28	28	28	28	28	31	31	31	31	31	117	117	117	681
Medium Density	18	18	28	28	28	28	28	31	31	31	31	31	117	117	117	680
High Density	9	9	14	14	14	14	14	15	15	15	15	15	59	59	59	340
<b>Total</b>	<b>44</b>	<b>44</b>	<b>69</b>	<b>69</b>	<b>69</b>	<b>69</b>	<b>69</b>	<b>77</b>	<b>77</b>	<b>77</b>	<b>77</b>	<b>77</b>	<b>293</b>	<b>293</b>	<b>293</b>	<b>1,700</b>
<b>Niagara Falls South</b>																
Low Density	191	191	211	211	211	211	211	239	239	239	239	239	169	169	169	3,142
Medium Density	191	191	211	211	211	211	211	239	239	239	239	239	168	168	168	3,140
High Density	96	96	106	106	106	106	106	120	120	120	120	120	84	84	84	1,570
<b>Total</b>	<b>478</b>	<b>478</b>	<b>528</b>	<b>528</b>	<b>528</b>	<b>528</b>	<b>528</b>	<b>598</b>	<b>598</b>	<b>598</b>	<b>598</b>	<b>598</b>	<b>421</b>	<b>421</b>	<b>421</b>	<b>7,852</b>
<b>Fort Erie</b>																
Low Density	106	106	167	167	167	167	167	198	198	198	198	198	212	212	212	2,673
Medium Density	28	28	29	29	29	29	29	33	33	33	33	33	34	34	34	468
High Density	14	14	14	14	14	14	14	17	17	17	17	17	17	17	17	233
<b>Total</b>	<b>148</b>	<b>148</b>	<b>210</b>	<b>210</b>	<b>210</b>	<b>210</b>	<b>210</b>	<b>248</b>	<b>248</b>	<b>248</b>	<b>248</b>	<b>248</b>	<b>263</b>	<b>263</b>	<b>263</b>	<b>3,374</b>
<b>Welland and Port Colborne East</b>																
Low Density	24	24	58	58	58	58	58	65	65	65	65	65	57	57	57	833
Medium Density	21	21	44	44	44	44	44	50	50	50	50	50	25	25	25	587
High Density	10	10	22	22	22	22	22	25	25	25	25	25	12	12	12	294
<b>Total</b>	<b>54</b>	<b>54</b>	<b>124</b>	<b>124</b>	<b>124</b>	<b>124</b>	<b>124</b>	<b>140</b>	<b>140</b>	<b>140</b>	<b>140</b>	<b>140</b>	<b>95</b>	<b>95</b>	<b>95</b>	<b>1,714</b>
<b>Welland and Port Colborne West</b>																
Low Density	117	117	87	87	87	87	87	97	97	97	97	97	152	152	152	1,610
Medium Density	43	43	42	42	42	42	42	46	46	46	46	46	46	46	46	662
High Density	19	19	20	20	20	20	20	22	22	22	22	22	21	21	21	313
<b>Total</b>	<b>179</b>	<b>179</b>	<b>148</b>	<b>148</b>	<b>148</b>	<b>148</b>	<b>148</b>	<b>166</b>	<b>166</b>	<b>166</b>	<b>166</b>	<b>166</b>	<b>219</b>	<b>219</b>	<b>219</b>	<b>2,586</b>
<b>Wainfleet</b>																
Low Density	10	10	13	13	13	13	13	15	15	15	15	15	16	16	16	209
Medium Density	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
High Density	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0
<b>Total</b>	<b>10</b>	<b>10</b>	<b>13</b>	<b>13</b>	<b>13</b>	<b>13</b>	<b>13</b>	<b>15</b>	<b>15</b>	<b>15</b>	<b>15</b>	<b>15</b>	<b>16</b>	<b>16</b>	<b>16</b>	<b>209</b>
<b>Pelham and Thorold</b>																
Low Density	113	113	190	190	190	190	190	248	248	248	248	248	230	230	230	3,104
Medium Density	32	32	46	46	46	46	46	59	59	59	59	59	97	97	97	881
High Density	13	13	18	18	18	18	18	23	23	23	23	23	44	44	44	364
<b>Total</b>	<b>159</b>	<b>159</b>	<b>253</b>	<b>253</b>	<b>253</b>	<b>253</b>	<b>253</b>	<b>331</b>	<b>331</b>	<b>331</b>	<b>331</b>	<b>331</b>	<b>371</b>	<b>371</b>	<b>371</b>	<b>4,349</b>
<b>Total Jurisdiction</b>																
Low Density	579	579	753	753	753	753	753	894	894	894	894	894	953	953	953	12,253
Medium Density	332	332	399	399	399	399	399	459	459	459	459	459	488	488	488	6,418
High Density	161	161	194	194	194	194	194	222	222	222	222	222	237	237	237	3,113
<b>Total</b>	<b>1,072</b>	<b>1,072</b>	<b>1,347</b>	<b>1,347</b>	<b>1,347</b>	<b>1,347</b>	<b>1,347</b>	<b>1,575</b>	<b>1,575</b>	<b>1,575</b>	<b>1,575</b>	<b>1,575</b>	<b>1,678</b>	<b>1,678</b>	<b>1,678</b>	<b>21,784</b>

**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form C - Net New Dwelling Units - By-Law Summary**

<b>Elementary Planning Review Areas</b>	<b>Number of Units</b>
Niagara Falls North	1,700
Niagara Falls South	7,852
Fort Erie	3,374
Welland and Port Colborne East	1,714
Welland and Port Colborne West	2,586
Wainfleet	209
Pelham and Thorold	4,349
<b>Grand Total Gross New Units In By-Law Area</b>	<b>21,784</b>
<b>Less: Statutorily Exempt Units In By-Law Area</b>	<b>436</b>
<b>Total Net New Units In By-Law Area</b>	<b>21,348</b>

**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form D - Non-Residential Development**

**D1 - Non-Residential Charge Based On Gross Floor Area (sq. ft.)**

<b>Total Estimated Non-Residential Board-Determined Gross Floor Area to be Constructed Over 15 Years From Date of By-Law Passage:</b>	<b>2,851,812</b>
<b>Less: Board-Determined Gross Floor Area From Exempt Development:</b>	<b>693,097</b>
<b>Net Estimated Board-Determined Gross Floor Area:</b>	<b>2,158,715</b>



## Niagara Catholic District School Board - Former Welland Portion By-Law

## Education Development Charges Submission 2020

## Form E - Growth Related Pupils - Elementary Panel

Elementary Planning Area	Dwelling Unit Type	Net New Units	Elementary Pupil Yield	Elementary Growth-Related Pupils
Niagara Falls North	Low Density	681	0.14	99
	Medium Density	633	0.05	33
	High Density	340	0.02	7
	Total	1,654	0.08	139
Niagara Falls South	Low Density	3,142	0.23	737
	Medium Density	2,927	0.08	235
	High Density	1,570	0.03	53
	Total	7,639	0.13	1,025
Fort Erie	Low Density	2,673	0.10	255
	Medium Density	436	0.06	27
	High Density	233	0.03	6
	Total	3,342	0.09	287
Welland and Port Colborne East	Low Density	833	0.09	74
	Medium Density	547	0.04	24
	High Density	294	0.02	6
	Total	1,674	0.06	104
Welland and Port Colborne West	Low Density	1,610	0.12	191
	Medium Density	617	0.06	37
	High Density	313	0.03	8
	Total	2,541	0.09	236
Wainfleet	Low Density	209	0.10	20
	Medium Density	-	0.00	-
	High Density	-	0.00	-
	Total	209	0.10	20
Pelham and Thorold	Low Density	3,104	0.10	299
	Medium Density	821	0.04	33
	High Density	364	0.02	6
	Total	4,289	0.08	338
		SUBTOTAL:		2,149
		LESS: Available Pupil Places:		1,276
		NET GROWTH RELATED PUPILS:		874

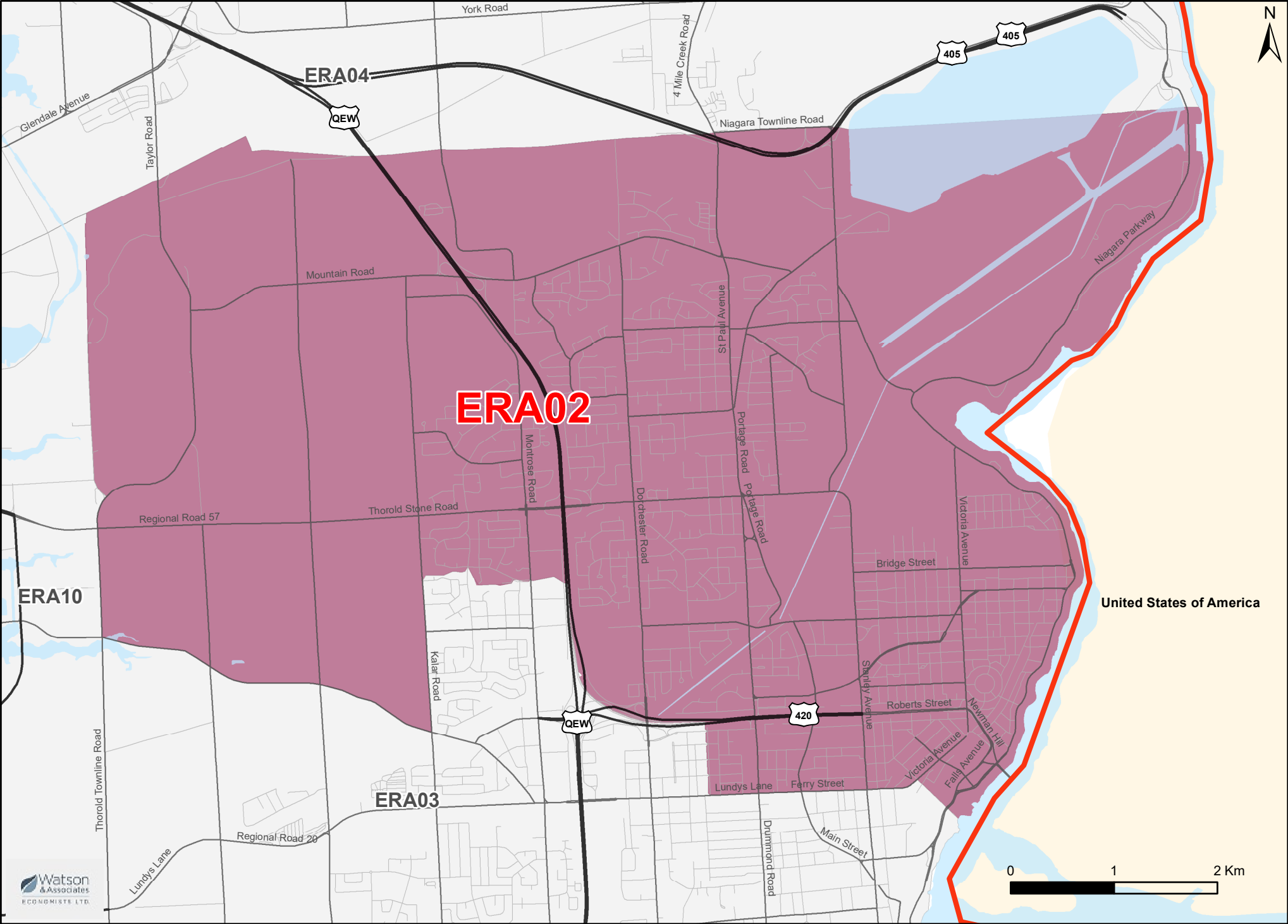
## Niagara Catholic District School Board - Former Welland Portion By-Law

## Education Development Charges Submission 2020

## Form E - Growth Related Pupils - Secondary Panel

Secondary Planning Area	Dwelling Unit Type	Net New Units	Secondary Pupil Yield	Secondary Growth-Related Pupils
Pelham, Thorold, Niagara Falls, Welland	Low Density	8,324	0.05	445
	Medium Density	5,411	0.03	155
	High Density	2,817	0.01	28
	Total	16,552	0.04	628
Wainfleet, Port Colborne, Fort Erie	Low Density	3,929	0.04	159
	Medium Density	572	0.02	13
	High Density	296	0.01	4
	Total	4,797	0.04	175
		SUBTOTAL:		804
		LESS: Available Pupil Places:		390
		NET GROWTH RELATED PUPILS:		414

# ERA02: Niagara Falls North



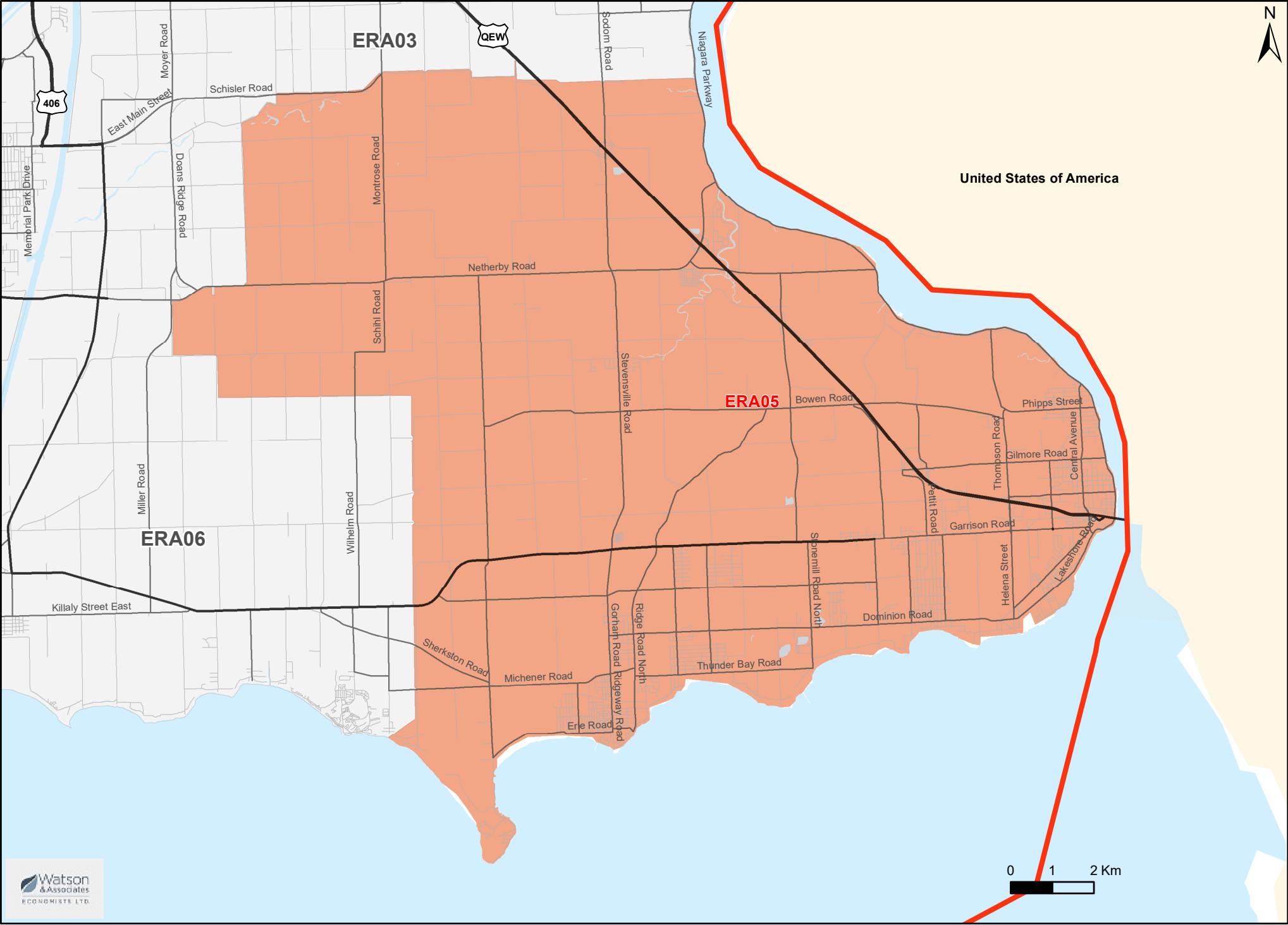
## NOTES

# ERA03: Niagara Falls South



## NOTES

# ERA05: Fort Erie



**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form F - Growth Related Pupil Place Requirements**

**Panel:**

### Elementary Panel

**Review Area:**

**ERA05:**

## Fort Erie

### REQUIREMENTS OF EXISTING COMMUNITY

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#### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

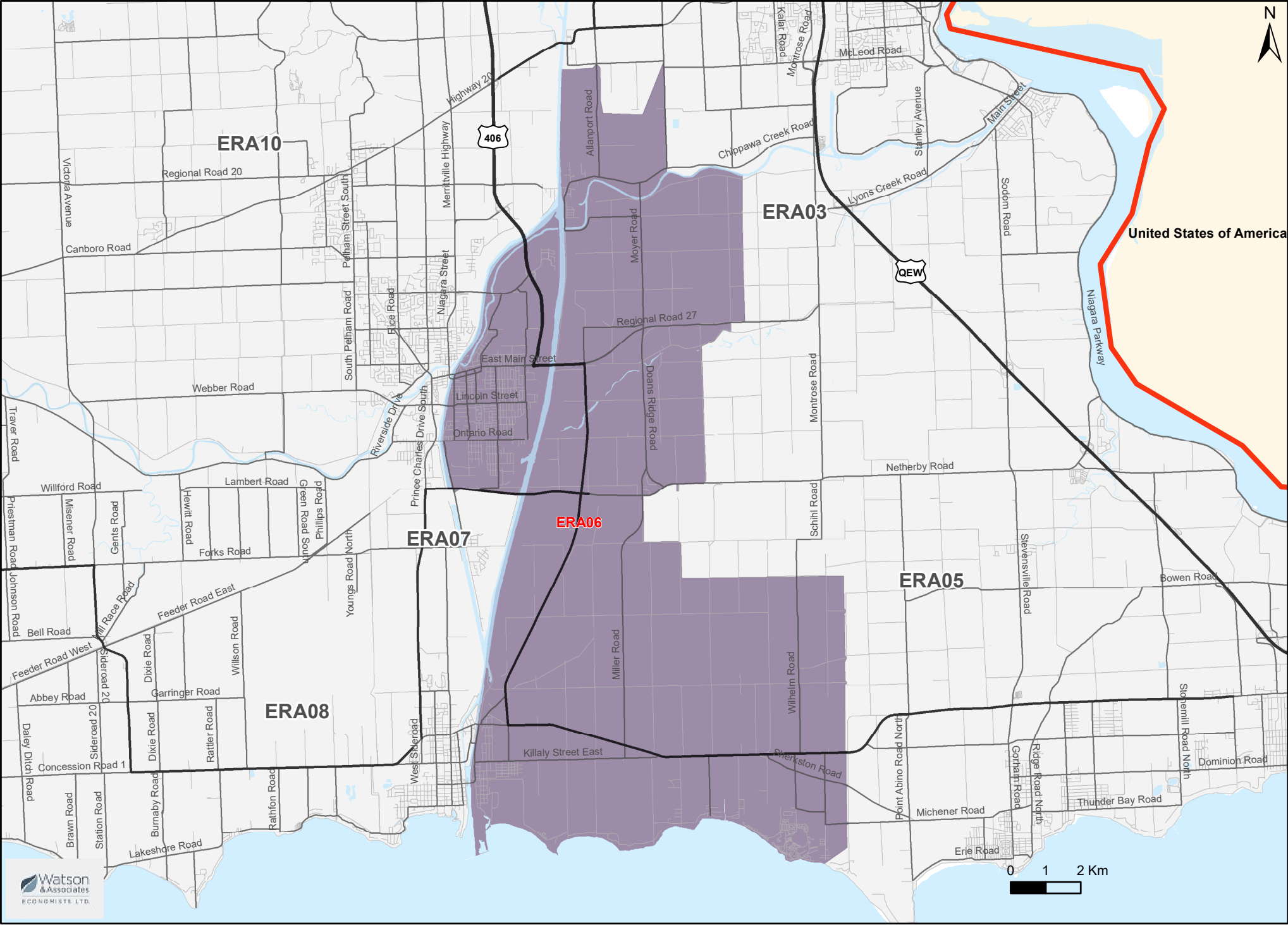
	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	12	23	40	57	74	90	106	125	144	162	185	208	235	261	287

#### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

Requirements of New Development (Pupil Places)	287
Available Pupil Places in Existing Facilities	487
Net Growth-Related Pupil Place Requirements (1-2)	0

## NOTES

# ERA06: Welland and Port Colborne East





**Panel:**

**Review Area:**

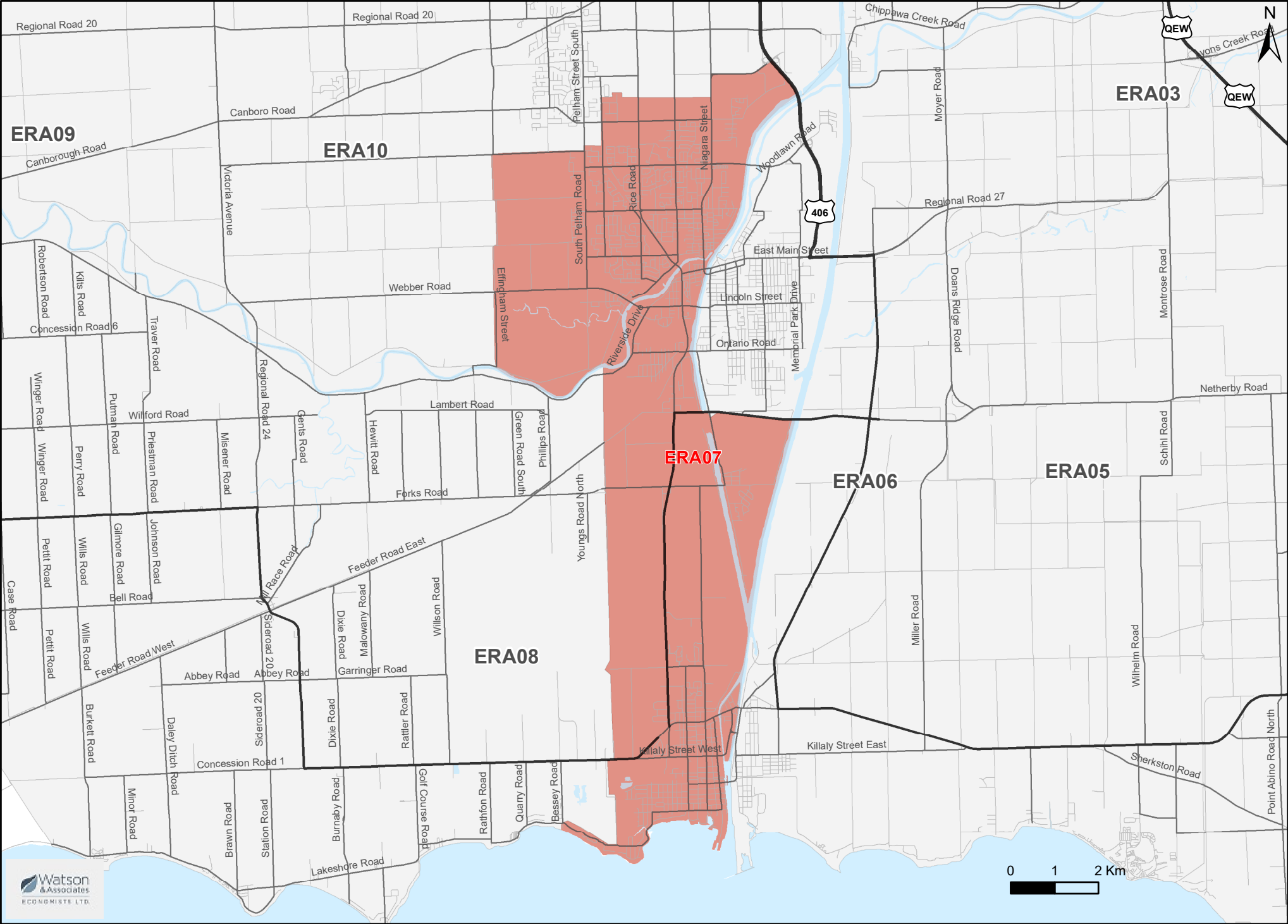
### REQUIREMENTS OF EXISTING COMMUNITY

#### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

#### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

## NOTES

# ERA07: Welland and Port Colborne West



**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form F - Growth Related Pupil Place Requirements**

**Panel:**

### Elementary Panel

**Review Area:**

**ERA07:**

### Welland and Port Colborne West

### REQUIREMENTS OF EXISTING COMMUNITY

Existing Schools and Projects	Current OTG Capacity	Number of Temp Facilities	Current 2019/ 2020	15 Year Projections														
				Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
ALEXANDER KUSKA	458	0	410	407	409	397	397	389	377	367	367	366	365	364	363	364	364	351
HOLY NAME	435	4	426	411	406	403	412	409	400	402	402	399	400	400	398	396	393	392
ST AUGUSTINE	236	0	134	135	131	135	131	132	137	136	132	134	131	127	125	124	124	122
ST JOHN BOSCO	259	0	241	225	216	214	211	209	209	207	209	201	198	200	199	196	192	190
ST KEVIN	423	0	343	333	328	328	327	319	322	330	336	335	344	349	353	355	355	354
ST PATRICK, PORT COLBORNE	164	1	156	154	144	142	141	137	134	137	134	141	147	151	156	162	167	172

#### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	17	35	48	62	75	89	103	118	133	148	161	174	195	215	236

#### **CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS**

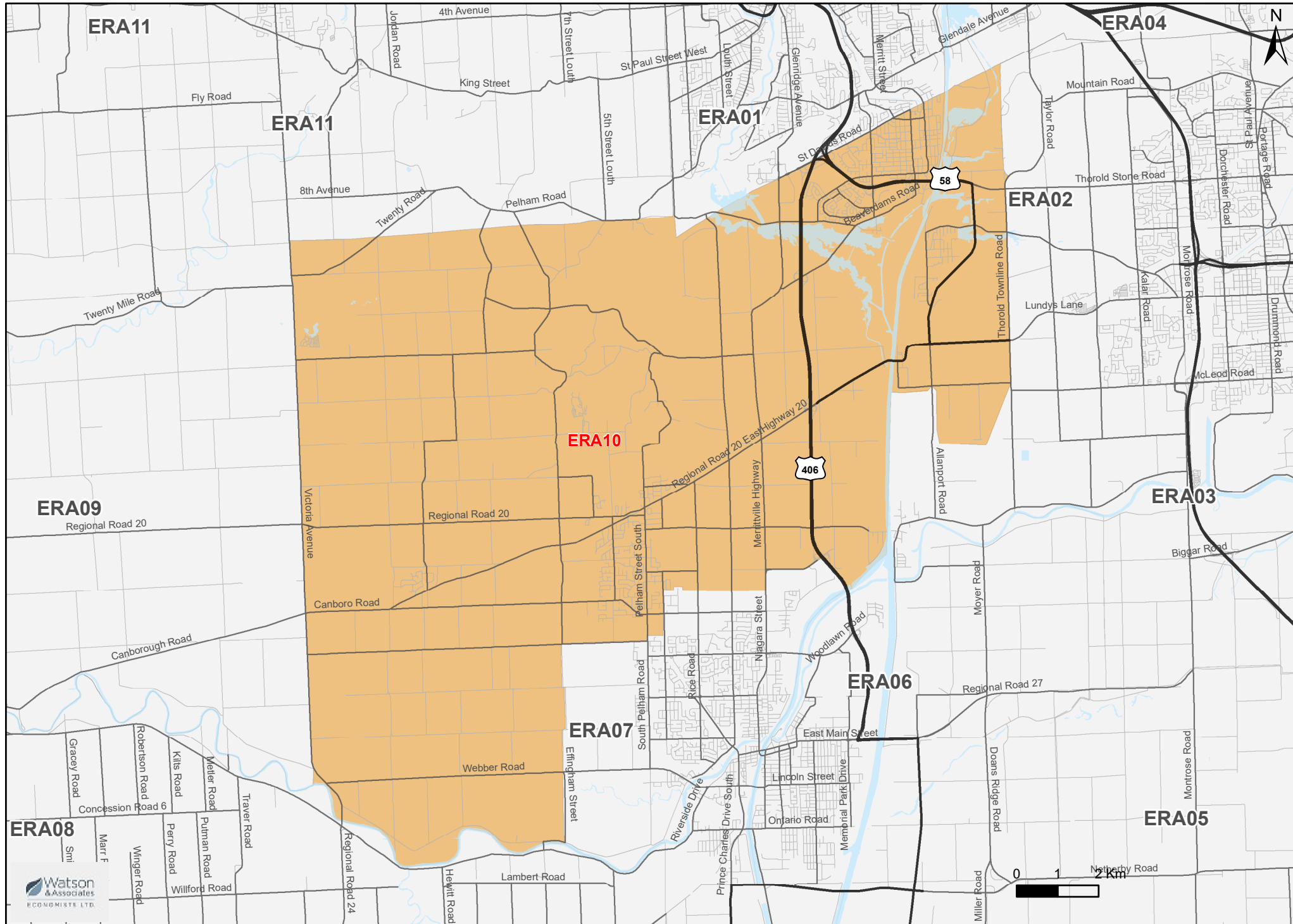
Requirements of New Development (Pupil Places)	236
Available Pupil Places in Existing Facilities	394
Net Growth-Related Pupil Place Requirements (1-2)	0

## NOTES

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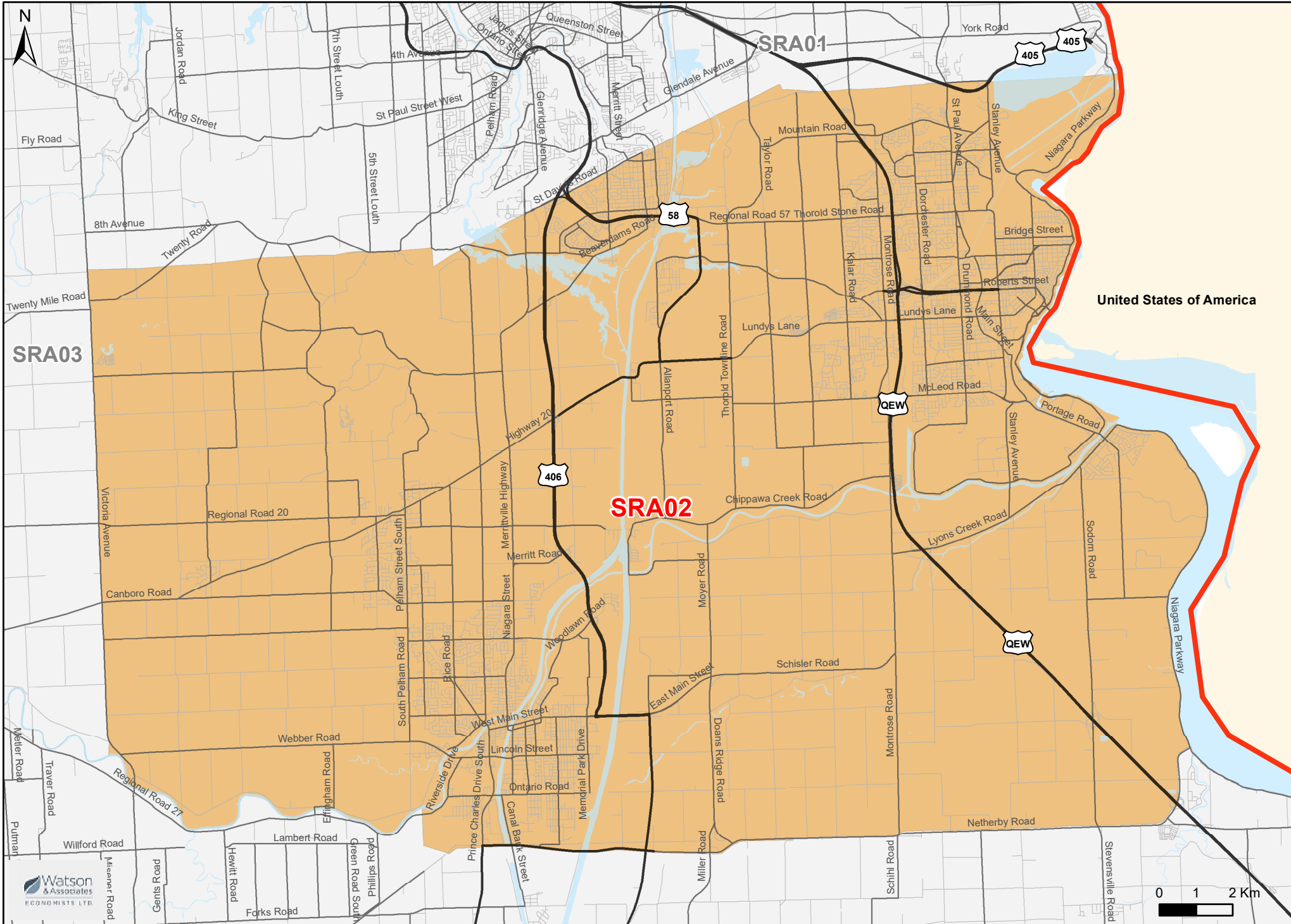
## NOTES

# ERA10: Pelham and Thorold



## NOTES

## SRA02: Pelham, Thorold, Niagara Falls, Welland





### Form F - Growth Related Pupil Place Requirements

**Review Area:**

**SRA02** Pelham, Thorold, Niagara Falls, Welland

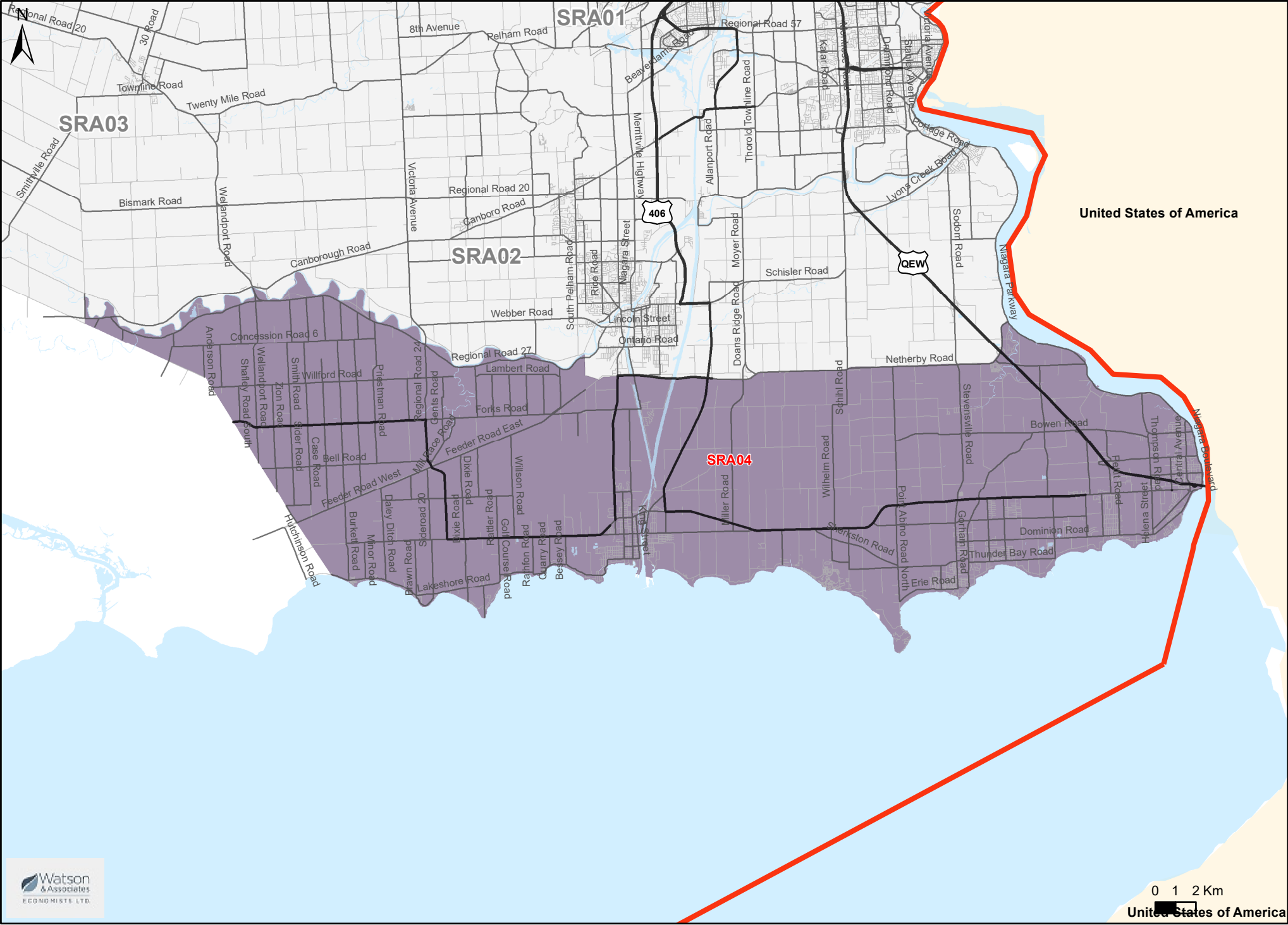
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	15 Year Projections														
	Year 1 2020/ 2021	Year 2 2021/ 2022	Year 3 2022/ 2023	Year 4 2023/ 2024	Year 5 2024/ 2025	Year 6 2025/ 2026	Year 7 2026/ 2027	Year 8 2027/ 2028	Year 9 2028/ 2029	Year 10 2029/ 2030	Year 11 2030/ 2031	Year 12 2031/ 2032	Year 13 2032/ 2033	Year 14 2033/ 2034	Year 15 2034/ 2035
	22	45	72	101	130	175	219	272	325	377	426	475	526	577	628

1	Requirements of New Development (Pupil Places)	628
2	Available Pupil Places in Existing Facilities	214
3	Net Growth-Related Pupil Place Requirements (1-2)	414

## NOTES

# SRA04: Wainfleet, Port Colborne, Fort Erie



**Panel:**

### Secondary Panel

### REQUIREMENTS OF EXISTING COMMUNITY

### REQUIREMENTS OF NEW DEVELOPMENT (CUMULATIVE)

### CALCULATION OF GROWTH-RELATED PUPIL PLACE REQUIREMENTS

## NOTES

Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2019  
Form G - Growth-Related Net Education Land Costs

ELEMENTARY PANEL

Review Area	Site Status (Optioned, Purchased, Reserved, Etc.)	Proposed Year Of Acquisition	Site Location/ Facility Type	Net Growth- Related Pupil Place Requirements	Proposed School Capacity	Percent of Capacity Attributed to Net Growth- Related Pupil Place Requirements	Total Number of Acres Required (Footnote Oversized Sites)	Acreage To Be Funded in EDC By-Law Period	Cost Per Acre	Education Land Costs <sup>1</sup>	Eligible Site Preparation Costs	Land Escalation Costs	Financing Costs	Total Education Land Costs
ERA03	Close Of Sale Pending	2020	New School	450	450	100.00%	5.00	5.00	\$ -	\$ -	\$ 269,870	\$ -	\$ 490,985	\$ 760,855
ERA03	TBD	2026	New School	424	450	94.22%	5.00	4.71	\$ 700,000	\$ 3,446,916	\$ 305,061	\$ 0	\$ 490,985	\$ 4,242,962
Total:				874	900		10.0	9.7		\$ 3,446,916	\$ 574,931	\$ 0	\$ 981,970	\$ 5,003,817

SECONDARY PANEL

Review Area	Site Status (Optioned, Purchased, Reserved, Etc.)	Proposed Year Of Acquisition	Facility Type	Net Growth- Related Pupil Place Requirements	Proposed School Capacity	Percent of Capacity Attributed to Net Growth- Related Pupil Place Requirements	Total Number of Acres Required (Footnote Oversized Sites)	Acreage To Be Funded in EDC By-Law Period	Cost Per Acre	Education Land Costs	Eligible Site Preparation Costs	Land Escalation Costs	Financing Costs	Total Education Land Costs
SRA02			Accommodated In Existing Facilities Or Through Additions/Temporary Space	414						\$ -	\$ -	\$ -		
Total:				414	-		0.00	0.00		\$ -	\$ -	\$ -	\$ -	\$ -

<sup>1</sup> Includes Land Transfer Tax and HST

**Niagara Catholic District School Board - Former Welland Portion By-Law**  
**Education Development Charges Submission 2019**  
**Form H1 - EDC Calculation - Uniform Residential**

**Determination of Total Growth-Related Net Education Land Costs**

Total:	Education Land Costs (Form G)	\$	5,003,817
Add:	EDC Financial Obligations (Form A2)	\$	3,128,536
<b>Subtotal:</b>	<b>Net Education Land Costs</b>	<b>\$</b>	<b>8,132,353</b>
<b>Subtotal:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$</b>	<b>8,132,353</b>
Add:	EDC Study Costs	\$	225,000
<b>Total:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$</b>	<b>8,357,353</b>

**Apportionment of Total Growth-Related Net Education Land Costs**

Total Growth-Related Net Education Land Costs to be Attributed to Non-Residential Development (Maximum 40%)	0%	\$	-
Total Growth-Related Net Education Land Costs to be Attributed to Residential Development	100%	\$	8,357,353

**Calculation of Uniform Residential Charge**

Residential Growth-Related Net Education Land Costs	\$	8,357,353
Net New Dwelling Units (Form C)		21,348
Uniform Residential EDC per Dwelling Unit	\$	391

**Niagara Catholic District School Board - Former Welland Portion By-Law  
Education Development Charges Submission 2020  
Form H2 - EDC Calculation - Differentiated Residential (Part 1 of 2)**

**Determination of Total Growth-Related Net Education Land Costs**

<b>Total:</b>	Education Land Costs (Form G)	\$ 5,003,817
<b>Add:</b>	EDC Financial Obligations (Form A2)	\$ 3,128,536.00
<b>Subtotal:</b>	<b>Net Education Land Costs</b>	<b>\$ 8,132,353</b>
<b>Subtotal:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$ 8,132,353</b>
<b>Add:</b>	EDC Study Costs	\$ 225,000.00
<b>Total:</b>	<b>Growth-Related Net Education Land Costs</b>	<b>\$ 8,357,353</b>

**Apportionment of Total Growth-Related Net Education Land Costs**

<b>Total Growth-Related Net Education Land Costs to be Attributed to Non-Residential Development (Maximum 40%)</b>	<b>0%</b>	<b>\$ -</b>
<b>Total Growth-Related Net Education Land Costs to be Attributed to Residential Development</b>	<b>100%</b>	<b>\$ 8,357,353</b>

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Form H2 - EDC Calculation - Differentiated Residential (Part 2 of 2)

Residential Growth-Related Net Education Land Costs:	\$ 8,357,353
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Determination of Distribution of New Development:

Type of Development (Form B)	Net New Units (Form B & C)	15-Year Elementary Pupil Yield (Form E)	Elementary Gross Requirements of New Development	Distribution of Elementary Gross Requirements of New Development	15-Year Secondary Pupil Yield (Form E)	Secondary Gross Requirements of New Development	Distribution of Secondary Gross Requirements of New Development	Total Gross Requirements of New Development	Distribution Factor
Low Density	12,253	0.137	1,675	77.9%	0.049	604	75%	2,279	77%
Medium Density	5,982	0.065	389	18.1%	0.028	167	21%	557	19%
High Density	3,113	0.027	85	4.0%	0.010	32	4%	117	4%
<b>Total</b>	<b>21,348</b>	<b>0.101</b>	<b>2,149</b>	<b>100%</b>	<b>0.038</b>	<b>804</b>	<b>100%</b>	<b>2,953</b>	<b>100%</b>

Calculation of Differentiated Charge:

Type of Development (Form B)	Apportionment of Residential Net Education Land Cost By Development Type	Net New Units (Carried over from above)	Differentiated Residential EDC per Unit by Development Type
Low Density	\$ 6,450,903	12,253	\$ 526
Medium Density	\$ 1,575,402	5,982	\$ 263
High Density	\$ 331,047	3,113	\$ 106