

COMMITTEE OF THE WHOLE (PUBLIC)
Report No. 21-046

8 June 2021

**Examination of Elementary and Secondary Program Pathways and
Achievement Outcomes**

Key Contact: Michèle Giroux, Executive Officer, Corporate Services,
613-596-8211 ext. 8310
Nadia Towaij, Superintendent of Program and Learning, ext.
8573
Eric Hardie, Superintendent of Instruction, ext. 8401

PURPOSE:

1. To present a report that examines enrollment distribution in elementary and secondary programs and student achievement outcomes in relation to demographic data collected through the *Valuing Voices – Identity Matters! Student Survey* conducted in 2019-2020. The information presented seeks to address the following questions:
 - What is the representation of students across elementary programs (English with core French, early French immersion, middle French immersion) and secondary pathways (academic, applied, locally developed)?
 - How well is the system doing to support students in meeting high expectations in French, Language, and mathematics (elementary panel) and English, math, and science (secondary panel)?

STRATEGIC LINKS:

2. The OCDSB Strategic Plan 2019-2023 has three main objectives designed to drive a cultural shift to build and promote a culture of innovation, caring and social responsibility. This report is directly linked to goals that focus on the system's responsibility to foster positive learning conditions for students and allow them to reach their full potential, including:
 - Championing high expectations for all students in all programs;
 - Prioritizing the dignity and well-being of students in inclusive and caring classrooms; and
 - Removing barriers to equity of access, opportunities and outcomes.

Specifically, the disaggregation of program enrolment data by student demographics provides insight into who is being served within each program. Where there are differences in student demographics across programs, barriers to student access must be identified and removed. Similarly, setting high expectations for all students requires a mindset that all students are capable of achieving high standards with the proper infrastructure and supports. Examining student achievement data through the lens of the provincial standard (equivalent to a mark of 70%) reinforces this goal. When this standard is not met, it is important to determine what barriers or biases exist within our system that could be preventing them from doing so, and work towards dismantling these oppressive practices.

CONTEXT:

3. In 2012, the Organisation for Economic Cooperation and Development (OECD) reported that “streaming” practices such as those employed in Ontario secondary schools have significant negative and long-term impacts on students. One of the recommendations emerging from this report was for school systems to eliminate streaming for students who are younger than 15 years of age. Over the past decade, streaming practices in Ontario secondary schools have come under heavy criticism, pointing to issues of systemic racism and bias (Bush, 2017; Brown & Tam, 2017; People for Education, 2019; Pichette et al., 2020). Critics have also argued that streaming occurs long before students get to secondary school, citing such practices as program choice (e.g., French immersion vs. English) or grouping students into classes based on real or perceived ability (e.g., special education).
4. In the OCDSB, there are multiple programs available to students in Kindergarten through Grade 12. In the elementary panel, for example, families have access to four programs: English/core French (grades 1-8), alternative program (also English with core French, grades 1-8), early French immersion (grades 1-8), and middle French immersion (grades 4-8). While French immersion and core French continue to be available in the secondary panel, beginning in grade 9 students must choose between academic, applied, and locally developed courses. Not all secondary courses are necessarily taken at the same level. For example, a student may be enrolled in an academic English course, but an applied level math course. In grade 11, course designations change to University (U), College/University (sometimes referred to as Mixed, M), College (C), and Workplace (E).

Although not the focus of this report, students identified with an exceptionality may also be placed in specialized special education classes, depending upon the severity of their needs – this occurs in both the elementary and secondary panels. There are also several district-level programs at secondary (e.g., Adaptive, Alternate, Arts, High Performance Athlete, International Baccalaureate) offering even more choice for students and parents.

5. Effective September 2021, school districts in Ontario will begin the process of “destreaming”, beginning with Grade 9 mathematics. The Ontario Ministry of Education will require school districts to undertake comprehensive monitoring of program enrolment and outcomes, particularly for students who have historically been underserved by the system. A key component of this work will be the establishment of baseline measures of disproportionality and disparity against which progress can be evaluated.
6. Annually, as part of the *Annual Student Achievement Report (ASAR)*, the OCDSB analyzes provincial assessment data (grades 3 and 6 reading, writing, and mathematics; grade 9 applied and academic mathematics; OSSLT), as well as report card data for grades 9 and 10 compulsory courses. For several years, this data has been disaggregated for specific groups of students including English Language Learners (ELLs), students who identify as Indigenous (INDG), students with special education needs (SPED), students residing in lower-income neighbourhoods (SES), and by gender.

Given the absence of provincial assessment data for 2019-2020, report card data for the subjects that are most closely aligned with the provincial assessments has been used to measure achievement outcomes in this report. Disaggregation of data by student group has been undertaken for the full population of students, as well as for the subset of students who participated in the *Valuing Voices – Identity Matters! Student Survey* conducted in the 2019. Reporting this data in alignment with the requirements under the *Anti-Racism Act* and accompanying *Data Standards* allows for a deeper analysis of additional groups of students based on self-reported Indigenous identity, race, gender identity, and disability from the *Valuing Voices – Identity Matters! Student Survey*.

KEY CONSIDERATIONS:

Collection, Analysis and Reporting of Identity Based Data

7. The OCDSB has a commitment to improving equity of access and opportunity for all students. The collection of identity-based data that resulted from this commitment serves the following purposes:
 - (i) to gather demographic information about the unique and diverse characteristics of the OCDSB’s student population;
 - (ii) to identify and respond to barriers to student learning and well-being; and
 - (iii) to enhance the District’s capacity to serve its increasingly diverse student population and client communities.

This is the third in a series of reports that begins to look at barriers to student achievement and well-being with a view to effecting change that will result in greater support and more equitable outcomes for students who have been minoritized.

8. Data collection, analysis and reporting of identity data is governed by the *Ontario Anti-Racism Act* (2017), and the [Data Standards for the Identification and Monitoring of System Racism](#) (2018).
9. Ongoing discussions with the OCDSB Technical Advisory Group over the course of this year have helped guide our approach to analysis and reporting. In order to make the information more accessible to a broader audience, reporting has shifted to simplify the language and presentation of information for the reader, and include calculations of disproportionality and disparity in tables at the end of the document for reference.

Bringing Together the Data Sets

10. A QuantCrit framework (Gillborn, Warmington & Demack, 2018) has continued to guide the approach to the analysis and reporting of this data. Despite the multidimensional nature of identity, this initial phase of reporting focuses only on single aspects of identity – Indigenous, race, gender, and disability – and does not yet take into account intersectionality (e.g., race x gender).
11. Three years of data (2017-2018, 2018-2019, and 2019-2020) have been examined. In order to allow for the establishment of a baseline to support district monitoring of efforts to dismantle the structures and practices associated with streaming students into grade 9 applied, academic, and locally developed mathematics. Results are primarily discussed in relation to 2019-2020 (the most recent full year of data currently available).

Calculating Disproportionality and/or Disparity Indices

12. This phase of reporting requires the calculation of disproportionality and/or disparity indices for each unit of analysis (Standard 29). In an attempt to create greater distinction between these two terms, only one measure has been calculated, depending upon the data being examined. Specifically, in the case of program enrolment, disproportionality indices have been calculated to reinforce that the focus is on over/underrepresentation of a particular group in a program, service, or function relative to their representation in the overall population. Language has been simplified in this section of the report referring to whether there are “higher” or “lower” proportions of specific groups of students enrolled in a particular program.

In the case of achievement, where the focus is on measuring group differences in outcomes, disparity indices have been calculated. To reinforce responsibility is on the system to support students in meeting high expectations, language has been simplified in this section of the report to indicate which subjects (elementary) tend to yield higher outcomes and for which groups of students, and at secondary which program pathways and subjects do so.

Meaningful interpretation of both disproportionality and disparity requires the selection of appropriate benchmarks and reference groups, respectively (Standards 30 and 31), as well as the establishment of thresholds (Standard 32)

to support monitoring of progress over time.

Measuring Equity: Overview of Findings

13. For the benefit of the reader, Appendix A presents more detailed results and explains some of the more detailed technical/methodological elements of analysis that are required under the provincial *Data Standards*. Highlights of District-level results for 2019-2020 are as follows:

Program Enrolment

Elementary:

- Early French Immersion (EFI) continues to be the most popular program amongst families, with 53% of students enrolled. 37% of students are enrolled in English with Core French, and 6 % of students are enrolled in Middle French Immersion (MFI - grades 4-8 only).
- The Early French Immersion program had 1.5 to 2.8 times lower proportions of English language learners (ELLs), students who identify as Indigenous (INDG), males, those with special education needs (SpED), and those residing in lower income neighbourhoods (Low-SES), relative to their representation in the overall student population.
- The English with core French program had 1.5 to 2 times higher proportions of English language learners (ELLs), students who identify as Indigenous (INDG), males, those with special education needs (SpED), and those residing in lower income neighbourhoods (Low-SES), relative to their representation in the overall student population.
- The MFI program had higher proportions of ELLs and females.
- Specific groups of students identified through the *Valuing Voices* survey were disproportionately represented in the Early French Immersion program. The following groups had at least 1.5 times the proportion of students enrolled relative to their representation in the population: First Nations, Inuit, Middle Eastern, Trans Boy or Man, Two-Spirit and students identifying with the following disabilities - addiction, Autism, Blind or Low Vision, Developmental, Learning, Mobility, and Speech Impairment.
- Many groups of students identified through the *Valuing Voices* survey were disproportionately represented in the English with core French program. The following groups had at least 1.5 times the proportion of students enrolled relative to their representation in the population: First Nations, Inuit, Middle Eastern, Trans Boy or Man, Two-Spirit, Gender Fluid and students identifying with the following disabilities - addiction, Autism, and Mobility.
- The disproportionate representation in the MFI program was most pronounced for students who identified as East Asian, Non-Binary, Trans Boy or Man, Two Spirit, and Blind or Low Vision who had at least 1.5 times higher proportion relative to their representation in the population.

Secondary:

- The vast majority of students in the OCDSB are enrolled in academic level courses in grades 9 and 10, ranging from 72% in mathematics to 83% in English.
- Applied and locally developed courses had higher proportions of English language learners (ELLs), students who identify as Indigenous, those with special education needs, and those residing in lower income neighbourhoods. This disproportionate representation was most pronounced in locally developed courses where the proportions of these students were 1.5 to 4.5 times higher relative to their representation in the population.
- For the subset of students who participated in the *Valuing Voices* survey, academic level courses (English, math, and science) had higher proportions of students who self-identified: as non-Indigenous, White, South Asian, Southeast Asian, East Asian, Girl/Woman, and those reporting no disability. In contrast, the proportions of students in applied and locally developed English, math, and science courses from the following groups were at least 1.5 times higher than their representation in the population: First Nation, Metis, Inuit, Black, Indigenous, Gender Fluid, and those reporting the following disabilities - addiction, Autism, learning, mental, physical, speech impairment, undisclosed, and another disability not listed.
- The program pathway students choose in Grade 9 is the pathway they are most likely to continue in as they progress through secondary school.

Achievement Outcomes

Elementary:

- The percentage of all students meeting or exceeding the provincial standard ranged from 77% in French (Reading and Writing) to 86% in Mathematics (a composite of all strands). The English with core French program tended to yield lower achievement outcomes, and immersion programs yielded higher ones.
- Differences in outcomes (disparities) were evident for ELLs, students residing in lower income neighbourhoods, males, and students residing in lower income neighbourhoods, however, they were most pronounced for students with special education needs (excluding gifted) who were between 0.76 times as likely to meet the provincial standard in French (Writing) and 0.84 times as likely to meet the standard in Language (Writing) compared to students who did not have special education needs.
- All five subjects-strands yielded higher outcomes for students who self-identified as East Asian, South Asian, Southeast Asian, White, and

Girl or Woman on the *Valuing Voices* survey compared to other students (disparities ranged from 1.02 to 1.15). In contrast, students who identified as First Nation, Inuit, Black, Indigenous, Latino, Middle Eastern, another race not listed, Boy or Man, Gender Fluid, Trans Boy or Man, a gender identity not listed, or any disability (other than addiction, chronic pain and undisclosed) were found to have lower outcomes compared to other students across all five subjects-strands. Differences in outcomes were most pronounced for students identifying as Trans Boy or Man in Language (Reading) where 55% of students met standard compared to 85% of all survey respondents (disparity of 0.65).

Secondary (Grades 9 and 10 English, Math, and Science):

- The percentage of all students meeting or exceeding the provincial standard ranged from 69% in Mathematics to 75% in English. Academic level courses yielded the highest percentages of students meeting/exceeding the provincial standard compared to applied and locally developed.
- Outcomes in academic, applied, and locally developed English, math, and science tended to be lower for males, ELLs, students residing in lower income neighbourhoods, students identifying as Indigenous, and students with special education needs (excluding gifted). The largest differences in outcomes (disparities) were observed for: students identifying as Indigenous in locally developed English (where 18% met the standard; disparity of 0.64) and locally developed science (where 36% met the standard; disparity of 0.68); and, students with special education needs (excluding gifted) in academic math (where 57% met the standard; disparity of 0.75).
- Outcomes for students who self-identified as First Nation, Metis or Inuit on the *Valuing Voices* survey were lower in all program pathways (academic, applied, and locally developed) and across all three subjects, compared to non-Indigenous students. Outcomes for students identifying as First Nations were higher than other students in locally developed math; higher outcomes were also observed in the Inuit population, where numbers were relatively small.
- Trends across programs and pathways were less consistent for race, gender identity and disability. Specifically,
 - in English, outcomes were higher in all three program pathways for students identifying as South Asian (60-89% of students meeting standard; disparity ranging from 1.09 to 1.79), White (40-85% meeting standard; disparity ranging from 1.05 to 1.57), and Questioning (58-100% meeting standard; disparity ranging from 1.04 to 2.65) when compared to all other students.

- in math, only two of these groups, South Asian and Questioning, exhibited higher outcomes in all three program pathways (67-100% of students meeting standard; disparity ranging from 1.08 to 1.81); those identifying as Girl or Woman also had higher outcomes in this subject area (disparity ranging from 1.02 to 1.07).
- in science, outcomes in academic, applied, and locally developed courses were higher for students identifying as East Asian (64-91% meeting standard; disparity ranging from 1.13 to 1.46).

In sum, the data confirms what other jurisdictions have reported - that there is disproportionate representation of some groups of students, particularly those who are racialized or have been minoritized, in certain programs which can limit opportunities as they transition from secondary to post secondary pathways. Similarly, these same groups of students tend to experience lower achievement outcomes regardless of the program/pathway in which they are enrolled. Together, these results are a call to action to address systemic barriers and biases that continue to oppress these individuals. The OCDSB *Strategic Plan 2019-2023* and the [Indigenous, Equity and Human Rights Roadmap](#) express the District's commitment to equity and dismantling systemic barriers and bias.

Current Initiatives and Next Steps

15. The OCDSB has a number of key initiatives underway which are intended to narrow achievement gaps for specific groups of students and remove systemic barriers to their success. Many of these are detailed in the [Indigenous, Equity and Human Rights Roadmap](#) which provides a framework for work that is actively underway and/or planned. The following is an overview of some of the current key initiatives.

Equity:

- Creation of a core Culturally Relevant and Responsive Pedagogy (CRRP) team with the first year of implementation completed.
- The introduction of Indigenous and Black Students Graduation coaches which is showing early signs of a positive impact on student success (through increased credit accumulation) and overall well-being.
- Partnership with Inuuqattigiit education hubs for Inuit students
- Implementation of Indigenous Speakers Series, Rainbow Youth Forum, Black Student Forum.
- Expansion of Indigenous Education Team to include two additional graduation coaches.
- Hiring of Gender Diverse and Trans Student Support Coordinator.
- Expansion of reach ahead and summer courses to support Indigenous, Black and English Language Learners

Innovation and Adolescent Learning:

- Winning Attitudes is a full-time cooperative education program, supported by two teachers, for underserved youth who are at risk of disengaging from school. To-date this year 72 students have been re-engaged and 260 credits have been earned;
- Project True North which is designed to engage OCDSB students in primary document research focussing on the forgotten, and ignored, stories of Canadian history. The project's first focus has been the Black Canadian soldiers of the No 2 Construction Battalion from WWI; the research is being integrated into grade 10 History classes and aligns with the Equity Roadmap;
- Implementation of the Authentic Student Learning Experience (ASLE) Tool which is designed to support credit rescue and credit recovery that take into account student interests and pathways. The tool is being used by Student Success Teachers across the district to re-engage students by starting with their areas of interest and pathways and linking it to curricular expectations in order to earn credits and get back on track towards graduation. There are currently approximately 114 ASLEs currently in use, aimed at saving 190 credits;
- The development of a professional learning community in eight secondary schools (G8) to focus on the needs of students who are falling behind in credit accumulation through a learner focused experience. Schools have been using student voice, data, and ongoing monitoring to re-think and re-shape learning experiences for underserved students in order to better meet their needs. For example, schools have been creating multi-credit packages for ELD/ESL students which allow them to build deeper relationships with students while connecting their learning to their pathway goals.
- The new School Within a College (SWAC), run in partnership with Algonquin College, and established in September 2020, has produced 22 high school graduates. All of these students had left school and were re-engaged through the SWAC program, where they attend full time, in order to get them to the finish line with their diplomas. Programming for the students is highly individualized in order to meet their pathway goals. While earning their high school diplomas, these students also earned 18 college credits. In September 2021, 8 are going to college, 5 are connected with apprenticeships and 8 are working and exploring future options.
- The district's Dual Credit program with Algonquin (in this model students are still attending their high schools but take a single course with the college). This provides students the opportunity to explore post secondary opportunities while earning a college and a high school credit simultaneously. Students have earned 200 college credits this school year.
- Experiential Learning is being supported throughout the district to engage students in innovative learning, while connecting schools with community partners. For examples of some of the work from this year, please visit <https://ocdsbxi.com/>.
- Innovation and Adolescent Learning, in response to the 16x16 data from the previous report, is working closely with the Indigenous team to create

new program offerings and content to support Indigenous students to improve their outcomes. For example, working on a multi-credit package which will include land-based and language learning, with the opportunity for students to earn more than 4 credits in a semester in order to get them back on track towards graduation.

- IAL has also been working with Indigenous, Equity and ESL to support new Canadians who come into the district via the Family Reception Centre to enhance the consistency and provision of credits to students whose education to-date has happened outside of Canada. For example, offering students credits for their first languages in order to support graduation requirements.

Learning Support Services

- Working collaboratively with several departments, Learning Support Services (LSS) is working to support the implementation of The Third Path - A Relationship-Based Approach to Student Well-being and Achievement. This work will help to reinforce setting the conditions for learning by creating intentional and responsive relationships across several key areas (e.g., identity, safety, belonging, etc.);
- A cross-departmental, multi-disciplinary team continues to explore the use of a Universal Screener to assist educators in identifying emerging student needs and determining appropriate instructional strategies to support students;
- The online resource "Learning Support for Students with Special Education Needs" will help to revisit the development of quality Individual Education Plans (IEPs) including a focus on the reason for developing an IEP, high yield strategies to support student learning, and articulate the key elements of quality special education programming in schools; and
- Mental health promotion and prevention is essential in building social emotional learning skills (e.g., identifying and managing emotions, healthy relationships, coping skills and problem solving skills) which helps reduce the likelihood of mental health problems developing or reduces the intensity of pre-existing mental health difficulties.

Program and Learning:

- The Student Achievement Through Inquiry (S.A.T.E) project which uses factors known to contribute to successful schools to bring children, families and communities together into the educational environment as participants and partners in the learning process, with the school becoming the "Heart of the Community." This particular project involves 14 OCDSB schools (elementary and secondary) and focuses on the following factors: achievement and standards; leadership and management; teaching and learning; innovative curriculum; targeted intervention and support; inclusion; parental engagement; use of data; effective use of pupil's voice; and celebration of cultural diversity.
- The Intensive Reading Intervention program is a new cross departmental Summer Learning Program which is available to support students in kindergarten to Grade 9 to address identified gaps in reading. Schools

involved have been identified based on multiple sources of data including raise index, student achievement and credit accumulation at the secondary level.

- The literacy assessment field test project is currently underway. Over 150 educators from across the district in kindergarten, Grade 1,2, 5, 7, 8, and 9 are testing a variety of new literacy assessment tools. The focus of this project is on early intervention, planning for learning, and gap filling.
- A detailed Scope and Sequence in all curricular areas in grades 1-8 has been developed cross-departmentally and is currently being employed across the system. Key instructional supports for both in-person and remote learning, diagnostic assessments, parent supports (Building Bridges) etc. have been embedded. Further considerations for CRRP, differentiation, and assessment continue to be added.
- A district de-streaming cross departmental team has been established including all departments to lead the work in de-streaming. Elementary and secondary school teams have been involved in a series of professional learning sessions focussed on the impacts of streaming and the disproportionate negative impact on specific groups of students through the streaming process. In addition to mathematics in grade 9, PAL is supporting schools who are focussing on de-streaming other compulsory courses including English, Science, Geography and Science in the 2021/2022 school year. This will involve cross-departmental support as well as cross-school learning re. key strategies, practices and supports that best address the needs of all learners through the lens of CRRP, universal design for learning and differentiation. All parents of grade 8 students registered in a locally developed or applied level course in grade 9 have been contacted and key information has been shared to ensure that parents are fully aware of the pathway options based on their present course selections, as well as graduation rates based on course pathway etc. These phone calls have resulted in an increase enrolment in Academic level courses at the grade 9 level.

Identity-based Data

16. This marks the first year in which identity data has been analyzed in conjunction with other information about student experiences (i.e., suspension/discipline, program representation) and achievement outcomes. A measured approach to this work was taken to allow for important conversations to take place with community representatives and to integrate their perspectives into reporting. In so doing, some aspects of identity have yet to be examined, as does intersections between different dimensions of identity.

In the fall of 2021, a report that examines sense of belonging and experiences of students in our school system will be shared. A schedule for additional reports is yet to be determined, however, it is clear that the establishment of thresholds will be necessary in order to facilitate interpretation of the differences being observed and monitoring over time. Establishment of data sharing protocols with First Nations communities and development of an open data policy also remain priorities for the READ team.

RESOURCE IMPLICATIONS:

17. Over the past three years, the District has received \$223,000 in one-time funding through Transfer Payment Agreements to support this work up to August 2021. These funds were used to hire research staff and consultant services for the facilitation of focus groups and community partner meetings. An additional \$200,000 was allocated through the annual budget process for the 2020-2021 school year to support the governance work (e.g., establishment of data sharing agreements with First Nations communities, development of an open data policy) and extension of contract staff in the *Research, Evaluation and Analytics Division*.
18. The District receives annual funding from the Ministry of Education to support student success. Much of the funding is targeted for staffing (i.e., Student Success Lead, Student Success Teachers in each secondary school, and intermediate Student Success Teachers in sites offering grades 7 and 8), however, a portion of the funds is distributed to schools. The initiative involves ongoing monitoring of student achievement and progress towards successful completion of high school (e.g., pass rates in key subject areas and courses, credit accumulation, and completion of the compulsory community service hours and literacy requirements).
19. A Technical Advisory Group has been established to support ongoing work on reporting with identity based data to ensure alignment with the Data Standards. TAG has met four times over the course of this year, providing a forum for engaging community organizations in ongoing input/dialogue regarding research methodology and statistical analysis of identity data. These opportunities have been instrumental in helping to shape our thinking and shift our approaches to reporting to meet the needs of the diverse community we serve. TAG will continue to guide our work through the 2020-2021 school year.
20. A full day of professional learning in applying a data equity framework to project planning and implementation took place through We All Count in January/February 2021. Twenty OCDSB staff, including the READ team, Communications, LSS, PAL, and HR participated in one of two sessions offered. The READ team, strategic business analysts, and evaluator from Learning Support Services have benefitted from participating in four 1.5 hour follow-up discussion sessions with the founder, allowing us to go deeper in our understanding and application of the work; two sessions remain and will be completed before the end of June. Costs associated with this portion of the work were approximately \$8,000 and were absorbed by the operating budget.
21. Ongoing communication about the use of the survey data to the community, particularly to participants, is a vital part of the process. Sharing the process and results, both in report format, infographic and through an open data set for public use, increases credibility, usability and impact. It is important for participants to

see how the data is treated, how their responses are being used, and the impact that their participation has on the future work of the organization.

DISCUSSION QUESTIONS:

The following questions are provided for discussion purposes:

- What stands out for you in the data/information that is presented?
- What questions does the data/information raise?
- Will the key initiatives lead to the dismantling of systemic barriers and bias?
- What actions, next steps and/or resources should be considered?

Michèle Giroux
Executive Officer, Corporate Services

Camille Williams-Taylor
Director of Education/
Secretary of the Board

Appendix A-Elementary and Secondary Program Streaming and Achievement Outcomes