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Predictors and patterns of absenteeism among students with disabilities: implications for inclusive education

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Introduction: Inclusive education requires that students with disabilities are present and supported to participate meaningfully, yet many continue to experience limited access to schooling. School absenteeism—including partial-day schedules and informal exclusions—remains an overlooked barrier to inclusive education.
Methods: Parents/caregivers of 540 Ontario students with disabilities completed a survey about attendance patterns, school belonging, and reasons for absences. Analyses included descriptive statistics, linear regression, and content analysis of open-ended responses.
Results: Twenty-one percent of students attended school on a part-time or modified schedule, most commonly 2–3 h per day, and about 40% met criteria for chronic absenteeism. The most frequent reasons for absences included emotionally based school avoidance, parents keeping children home due to unmet needs, and school-initiated exclusion tied to behavior or insufficient staffing. Students reporting lower school belonging, who attended school on a part-time or modified schedule, and from families with lower income had significantly higher levels of absenteeism.
Discussion: High levels of absenteeism and part-time attendance represent systemic forms of exclusion that undermine participation and achievement in inclusive education. Findings point to the critical role of school belonging, adequate supports, and socioeconomic context in promoting regular attendance and advancing inclusive education.

KEYWORDS

inclusive education, school absenteeism, school attendance, school belonging, school exclusion, students with disabilities

1 Introduction

Inclusive education has long been advanced as the most equitable and effective approach to educating students with and without disabilities. Internationally, imperatives such as the Salamanca Statement (UNESCO, 1994) and the UN Convention on the Rights of Persons with Disabilities (United Nations, 2006) have advanced this view, as have many individual countries and education systems to varying degrees (e.g., Ianes et al., 2020; Government of New Brunswick, 2013; UK Department for Education, 2015). The benefits of inclusive education

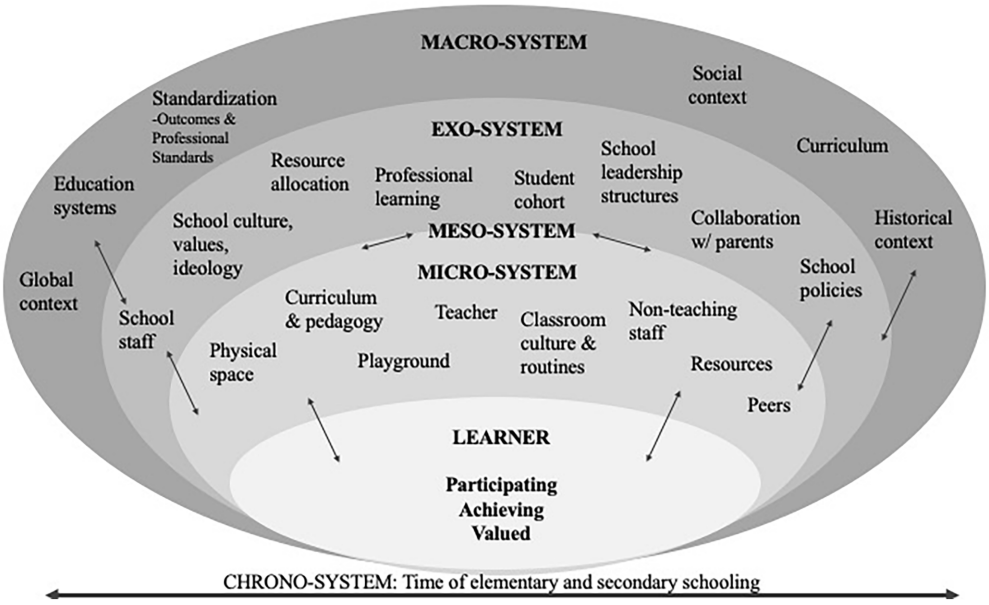

FIGURE 1
Ecology of inclusive education (Anderson et al., 2014).

are typically touted as being broader than the academic advancement of individual children, as is evidenced within Salamanca:

> Regular schools with this inclusive orientation are the most effective means of combating discriminatory attitudes, creating welcoming communities, building an inclusive society and achieving education for all; moreover, they provide an effective education to the majority of children and improve the efficiency and ultimately the cost-effectiveness of the entire education system (p. 3).

While definitions of inclusive education vary, most include the education of children in their local neighborhood school, spending all or most of their time in regular classrooms alongside same-age peers, with the instructional approaches and services necessary for them to access the general curriculum (Schuelka, 2018; U.S. Department of Education, 2025). Inclusive education means that children are supported to participate fully in their environment, to have their needs met, and to experience academic and social benefits.

Despite the decades of efforts dedicated to translating high level inclusive education policies and guidelines into on-the-ground reality for children, there is currently scattered evidence of their realization. While most children with disabilities spend most of their day in general education classes in Canada, the United States, and several other countries, they continue to experience poorer outcomes on a range of measures than their non-disabled peers (e.g., OECD, 2022). Currently, research literature focuses on the practices necessary within inclusive education (e.g., attitudes and beliefs, differentiated instruction, inclusive leadership), and on the quality of the education provided rather than simply the physical access of the child to the learning space (e.g., Fairbrother et al., 2025; Whitley et al., 2019).

Alongside efforts to improve meaningful access to education for students with disabilities, is a growing awareness of the many students with disabilities who are chronically absent from school (Anderson, 2020). While limited research has been conducted on the topic, available data from certain jurisdictions confirm disproportionate rates of absenteeism, including suspensions and expulsions as well as absences motivated by a range of health, family and educational factors (Gee, 2018; Gottfried et al., 2019; Klan et al., 2024). Better understanding absenteeism among students with disabilities is an important step in efforts toward truly inclusive education where physical presence is a necessary if insufficient condition. The current study explores the absenteeism of a sample of students with a range of disabilities in relation to key demographic and educational variables. We adopt the definition developed by Ontario Ministry of Education (2017) where students with disabilities[1] include those behavioral, communicational, intellectual, physical, and multiple needs which affect a student's ability to learn.

1.1 Ecology of inclusive education

In exploring absenteeism in relation to inclusive education, we draw on an application of Bronfenbrenner's bioecological model of human development put forward by Anderson et al. (2014; see Figure 1). In their ecology of inclusive education framework, these authors situate the learner in the center of the model, with the three determinants of inclusive education: participation, achievement, and value. Participation "requires the learner to be actively engaged in all aspects of schooling, both academically and socially"; achievement necessitates "access to learning goals and meaningful assessment, and value includes

1 The Ontario Ministry of Education uses the term 'exceptionality.' We use the term 'disabilities' to allow for ease of interpretation internationally.

recognizing learners "for who they are and what they have to offer, to others and to the school itself" (p. 29). School attendance is an insufficient but necessary condition of participation, achievement, and value. Within the ecological framework, the learner and the three determinants, which include their access to and engagement with formal schooling, are affected by multiple systems, as depicted in Figure 1. The more proximal systems have the strongest influence on learner's experience of inclusive education. In exploring absenteeism as one aspect of inclusive education, we draw on this ecological model and consider the dynamic, interacting roles of layered systems as both facilitating and hampering student's attendance at school.

1.2 School absenteeism

In most countries, school attendance, at least at the primary level, is legally mandated. As a social determinant, absenteeism has been found to be negatively correlated with academic achievement, school completion, mental health, and long-term economic and psychological outcomes (Gottfried, 2014; Krause et al., 2025; Rocque et al., 2017). In the UK, the government estimates that each day of absence for the typical student is associated with a decrease of £750 ($875USD) in future earnings (2025). Many studies have confirmed increasing rates of school absenteeism for students with and without disabilities (Gottfried et al., 2019).

Students may miss school for a range of reasons that are often categorized as 'excused' or authorized by school and home, such as illness or medical appointments; they may also miss school for a range of reasons that are not seen as legitimate by school or home (Kearney et al., 2019). Heyne et al. (2019) have reviewed existing research literature exploring school attendance problems and have identified four typologies of (1) school refusal (emotional/anxiety-based absenteeism), (2) truancy (unexcused absences, student-motivated), (3) school withdrawal (parent-motivated), and (4) school exclusion (school-motivated). These types of school attendance may operate dynamically or in tandem—for example in the case of an adolescent skipping class to work extra hours with the support of their family or a student with a learning disability receiving insufficient support at school who experiences anxiety at the thought of going to school and whose parent keeps them home if they seem highly distressed. There is some evidence from the US and the UK that absences that are not sanctioned by home and/or school are more predictive of later academic difficulties compared to authorized although both play a role in long-term educational outcomes for the general student population (Dräger et al., 2024; Henderson and Fantuzzo, 2023; Pyne et al., 2023).

1.3 Absenteeism and students with disabilities

While most research has focused on population-level analyses without disaggregation, several studies have explored rates of absenteeism for students with and without disabilities. For example, Gottfried et al. (2019) drew on data from 653,736 elementary-aged students in New York City public schools. They found that chronic absenteeism, defined as missing 10% or more school days and the most used cutoff worldwide, was significantly more common among students with disabilities (29.2%) than those without (17.6%). Using U.S. disability classifications, differences were highest for students with 'Emotional Disturbance,' followed by those with 'Learning Disability and Speech Impairment.' Students with disabilities educated in classes where they are in the minority experienced less absenteeism compared to those in classes where the proportion of students with disabilities was higher. In the UK, absenteeism statistics from spring 2025 revealed a similar phenomenon. Prevalence rates for students with profound and multiple learning difficulty (49.4%), social emotional and mental health disabilities (38.5%), and physical disabilities (37%), were the highest reported, in comparison to an average of 20.1% for those not identified as having a disability (Centre for Social Justice, 2025).

Other studies have confirmed the significantly higher rates of absenteeism among students with disabilities (Cortiella and Boundy, 2018; Gee, 2018; Melvin et al., 2023; Nordin et al., 2024; Yoder and Cantrell, 2019). Students with a wide range of disabilities have been implicated (i.e., physical disabilities, intellectual disabilities, Autism, ADHD; Emerson et al., 2015; Black and Zablotsky, 2018; Stromberg et al., 2022) and as with general populations, older students (secondary or high school) experience higher absenteeism than younger students (Redmond and Hosp, 2008; Sasso and Sansour, 2024; Stromberg et al., 2022). In most of the research literature, absenteeism is measured dichotomously as either chronic (10% or more absences) or not chronic, or on a continuous scale of days or classes missed in a given period of time, normally a school year (e.g., Gee, 2018; Sasso and Sansour, 2024). Absenteeism data is drawn from a range of sources, including national databases, school records, and parent and student reports (Whitley et al., 2025).

Beyond studies exploring disproportionality, there have been some efforts to focus in on the types of or reasons for the absenteeism among students with disabilities. Disciplinary absences, as one example, are far more common for students with disabilities than for those without (Cortiella and Boundy, 2018; Leung-Gagné et al., 2022; U.S. Department of Education, 2019). Physical symptoms and a need for medical appointments and therapies can explain some proportion of absences (Emerson et al., 2015; Mattson et al., 2022). Children with disabilities are also more likely to experience bullying at school, have fewer socioeconomic resources, display school-related anxiety and aversion, have poor relationships with teachers, have a parent in poor health, have academic difficulties, and require supports to physically attend and/or participate fully at school—all of which significantly impact the likelihood of school attendance (Bonnetty, 2025; Doren et al., 2014; Gee et al., 2024; Niemi et al., 2022; Stucki, 2025). The same student, family and school factors that influence school attendance for all students (e.g., age/grade, socioeconomic status, school belonging) likely affect those with disabilities in similar ways, although limited research has yet been conducted to support this.

One type of absenteeism which has not received much attention in published literature is often referred to as 'partial,' 'shortened' or 'modified' days, basically the pre-planned or reactive part-time attendance of students with disabilities at school. Students may be asked or directed to attend for a shorter period each day or week or may be told to stay home for a period of time but not subject to suspension or expulsion. News outlets and advocacy groups, primarily those seeking inclusive education for students, have led the way in

shining a spotlight on this practice, particularly in Canada and the UK (BC Ombudsperson, 2025; Chang, 2025; Inclusion Canada and Inclusive Education Canada, 2025; New Brunswick Child and Youth Advocate, 2024). While largely unexamined in research literature, a few studies and government reports have explored partial day attendance within the umbrella of school exclusions (Martin-Denham, 2022; Demie, 2022; Timpson, 2019). These exclusions may be permanent or temporary, full-time or part-time, and may be official or unofficial (ARCH Disability Law, 2019). For example, a section of the Ontario Education Act describes a special provision (Government of Ontario, 2025; s. 265):[2]

> It is the duty of a principal of a school, in addition to the principal's duties as a teacher, subject to an appeal to the board, to refuse to admit to the school or classroom a person whose presence in the school or classroom would in the principal's judgment be detrimental to the physical or mental wellbeing of the pupils.

While exclusions are not intended for students with disabilities specifically, these students are far overrepresented among those who are excluded (Timpson, 2019). Guidelines and regulations for exclusions describe safety as a primary consideration or rationale and the most common reasons that have been officially reported include persistent disruptive behavior or physical or verbal assault against other students or adults (Timpson, 2019). Exclusions in some jurisdictions such as Canada are distinct from suspensions or expulsions and are not considered disciplinary practices. In the United States and the UK, the term 'exclusion' is used most often to describe disciplinary sanctions (Valdebenito et al., 2018). While the UK reports at least their permanent exclusions publicly, Canadian provinces where exclusions are regulated do not have similar practices and so rates and reasons are unknown.

Alongside formal exclusion processes, whether disciplinary or not, are policies and practices that describe alternatives to full day attendance specifically for students with disabilities. These are framed not as exclusions or as absenteeism, but as flexible approaches to meeting student needs, as is described in by Michigan Department of Education Office of Special Education (2022), "The only time it is appropriate to shorten the school day for a student with a disability is when the student's IEP Team determines a shortened day is required to address the student's unique disability-related needs" (p. 2). Similar legislation exists in Canada (Government of Ontario, 2025) where "…a board may reduce the length of the instructional program on each school day to less than five hours a day for an exceptional pupil in a special education program" (Regulation 298(3.3)). These shortened days are intended to be temporary and decided on in consultation with parents. An explanation as to what benefit the reduced schedule provides to the child and their progress, as well as a plan for a return to full-time schooling is typically required. Data on the use of non-disciplinary exclusions and modified, partial or shortened days are not publicly shared and so rates of their use are so far unknown and their role in understanding and intervening in school absenteeism among this vulnerable group is largely unexplored.

One recent qualitative survey conducted by Inclusion Canada and Inclusive Education Canada (2025) heard from 164 parents of elementary and secondary students with a broad range of disabilities (Autism, ADHD, learning disabilities, mental health-related disability, etc.). They reported the most common reasons for partial day attendance as student externalizing behaviors and the lack of understanding by the school regarding the unmet need associated with the behaviors and/or the insufficient staff and resources available at schools to support the student. Families described the negative impact that being excluded from school via partial day attendance had on their child's social wellbeing and on their family's financial and emotional wellbeing. Autism Advocacy Ontario similarly surveyed 568 parents/caregivers of students with Autism in 2019 regarding their needs in relation to the public school system. Exclusions were one of the five main areas of need that emerged, with 24% of students attending on a partial day schedule and 29% reporting a range of exclusions which were primarily informal and undocumented. As with the Inclusion Canada study, impacts on student and family wellbeing were reported, with 9% of families reporting removing their child to home school or attend private schools.

While literature has consistently documented the disproportionate absenteeism experiences of students with disabilities, further research to uncover the underlying explanations for the absences, as well as contributing factors is necessary to better inform interventions and improve access to inclusive education. It is also important to adopt a comprehensive view of absenteeism, including various forms of exclusion, given that literature tends to focus primarily on school refusal and truancy. Accordingly, the current survey-based study explores the following questions, drawing on parent reports: (a) How often are students absent from school? (b) What are the most common reasons for students being absent? (c) What proportion of students are attending school on a part-time or modified basis?, and (d) Is the overall frequency of school absence predicted by school belonging, the existence of a part-time or modified schedule, type of placement, gender or socioeconomic status? Students' overall absenteeism is considered separately from a part-time or modified schedule so that students who follow their modified schedule are considered to have attended. In this way we can disentangle part-time attendance from the broad range of reasons why students are not attending school and shed light on both pathways of absenteeism. Findings from this study will provide insight into the intersection of school attendance and inclusive education for students with disabilities and will inform research and practice in the area.

2 Methods

2.1 Recruitment

We recruited parents/guardians/caregivers of school-aged students with disabilities or special educational needs across the province of Ontario to take part in the survey. Ontario is the most populous province in Canada, with a population of around 16.2 million. Participants were recruited through a combination of advertisement on social media and information shared through a range of organizations who support those with disabilities (e.g., Community Living Ontario). Those who were interested in learning more about the study could click on a link that led to them to a webpage where full information was provided as well as a link to the survey itself.

2 https://www.ontario.ca/laws/statute/90e02#BK451(1)(m)

Ethical approval was obtained through the university research ethics board and participants who chose to begin the survey were first presented with a consent form where they were informed about confidentiality and anonymity, data security and the voluntary nature of participation. Those who indicated that they agreed to take part were provided with the full survey to complete. Participants who began the survey could enter a draw for Amazon gift cards via a process that was separate from the survey in order to ensure anonymity.

2.2 Participants

We received over 800 responses to the survey. However, once we removed those that who did not provide consent or which were clearly false (e.g., survey completed in 2 min, inconsistent age/grade/school level) or mostly incomplete, we were left with 540 responses.

Most parents had English as a first language (92%). About 3% had French as a first language and the remainder listed a range of other languages. Most parents identified as White (86%), First Nations, Métis or Inuit (4%), Black (2%), and less than 1% East Asian, South Asian, Middle Eastern, Latin American, and Southeast Asian. Approximately 6% of parent/caregivers identified as having mixed ethnicity.

About 40% of the parents had a university degree, about 40% had a college diploma or apprenticeship certificate and the remainder had most or all of a high school diploma. About 37% of parents had an income of $60,000 or less, 20% had an income of between $60,000 and $90,000 and about 34% had a family income of over $90,000 Canadian dollars.

2.3 Measure

The survey had four sections: Demographics, Exclusion, Seclusion and Restraint. The community partner collaborated on survey development in several ways. Firstly, they shared a list of similar surveys and studies that had been conducted by organizations across Canada (e.g., Autism Advocacy Ontario, 2019; Bartlett and Ellis, 2019; Coalition des parents d'enfants à besoins particuliers, the Fédération québécoise de l'autisme, and the Société québécoise de la déficience intellectuelle, 2023). We drew from these heavily in creating the draft of those portions of the survey. We also received detailed feedback on the draft from members of the organization and their advisory board, some of whom were deeply involved in the school system and all who had extensive experience supporting children and families with disabilities. This feedback was provided via a virtual meeting as well as through several written submissions. Specific suggestions included sending the survey at the end of the school year to try to capture the full year, adjusting demographic questions to include fewer categories for ease of completion, including two questions for disability identification, one aligning with Ontario categories of exceptionality and one open-ended focusing in diagnosis, providing placement options that align with Ontario-required options, and adding questions about the schedule and length of time of exclusions. Many suggestions were made to adjust specific wording of multiple items to ensure clarity and relevance. We integrated the vast majority of the suggestions and omitted only those related to knowledge of school board policy which we felt were not appropriate for a general parent audience. Given our current focus on exclusion and absenteeism, the seclusion and restraint sections of the survey will not be detailed in this article.

In the first section, demographic items asked about the respondent (e.g., relationship with the child, level of education, first language, ethnicity, family income) and about the child (e.g., age, grade, gender, ethnicity, identifications/diagnoses, school placement).

Items related to exclusion and inclusion (e.g., modified days, frequency of and reasons for absenteeism) were created for the purposes of the study, guided by existing surveys (e.g., Autism Advocacy Ontario, 2019; Heyne et al., 2019). Questions related to modified or partial day attendance asked if the child attended school on a part-time or modified basis (dichotomous) and if so, for how many hours (scale from 1–2 h/day to 5–6 h/day) and why (open-ended response). Finally, parents provided estimates of how often their child had missed school that year (regardless of whether or not they were on a modified/part-time schedule) and selected the most common reasons for these absences. In determining the options that would be provided for absences, we drew on several sources, including 3 of Heyne's categories of absenteeism (exclusion, withdrawal, refusal) as well as existing literature and input from our partners to determine common reasons for students with disabilities to miss school that aligned with our interest in exclusion. Most existing measures have very lengthy lists of potential options which were not feasible for our multi-purpose survey and so we relied on the 'other' option for respondents to provide the breadth of possible reasons. The survey concluded with two open-ended questions that asked parents to provide any additional insight into exclusion, restraints or seclusion in 2022/2023 or in any other year.

We also created a 5-item scale that measured School Belonging (e.g., How often does your child enjoy attending their school?). Each item was completed using a 5-point scale from 0 (never) to 5 (always). We considered several measures of school belonging before constructing our survey. We were constrained in several ways in terms of this choice. First, the goal of the community partner was to document the experiences of children related to seclusion and restraint. Our mutual interest in exclusion and absenteeism emerged early in the partnership but it was important that we not reduce the items related to seclusion and restraint while adding on the 'exclusion' section. As well, respondent attrition and the load on caregiver respondents was a top concern for the community partner and the need to keep the survey to the minimum number of questions was paramount. Validated scales of school belonging that we reviewed, which included important aspects of inclusion and exclusion that were essential to our project, typically included 10 questions and/or very few of them had been created to capture a parent/caregiver perspective. They also varied in the dimensions of school belonging being assessed, including acceptance, connectedness, rejection, exclusion, joy, satisfaction, adjustment, and wellbeing (e.g., Abubakar et al., 2015; Akar-Vural et al., 2013; Arslan and Duru, 2017; Goodenow, 1993; Whiting et al., 2018). In reviewing existing surveys and items, we created items that contained similar wording to existing measures, and that captured three aspects of importance to the study team and participant group, namely acceptance, exclusion and enjoyment at school. We had in mind as well indicators of school belonging that might be more evident to parents, in their conversations with their child(ren) but also in their interactions with the school. Our scale, then, captures the parent/caregiver view of their child's school belonging, via a sense they have developed via various information and experiences. We conducted exploratory factor analysis with principal component analysis for extraction using the 5 items we created. The analysis identified a single factor, explaining 52.2% of the variance, with factor loadings ranging

from 0.64 to 0.77. The internal reliability of the scale showed good reliability (Cronbach's = 0.79). While these analyses demonstrate that the scale is acceptable for our analysis, we acknowledge the limitations of failing to use a scale that has established psychometric properties and of combining multiple facets of school belonging in a single measure.

The original draft of the full survey was reviewed by members of the partner organization, including parents of children with disabilities, and recommendations were made about reducing the overall length of the survey, while increasing clarity of items and response options. The survey was also translated into French by the research team and reviewed by the partner organization. Participants were told that they could reach out to the team if they needed help of any kind to complete the survey. The final survey contained 56 questions in total and took on average of 15 min to complete.

2.4 Analyses

Student demographics, frequency and duration of modified days and frequency and reasons for absenteeism were first analyzed descriptively. Next, a linear regression was conducted with frequency of school absence as the dependent variable and school belonging (mean score), modified/part-time schedule (yes/no), type of placement (mostly inclusive vs. mostly segregated) child gender, age and family socioeconomic status (scaled level of education and income). Finally, content analysis was conducted for one open-ended question, describing explanations or reasons for their child attending school on a part-time/modified basis.

3 Results

3.1 Student demographics

The students ranged in age from 4 to 21 years with an average age of 11 (SD = 3.85). They ranged in grade from kindergarten to Grade 12 and a slight majority were in elementary (K-6) grades (60%). About 34% of the students were identified as female, 62% were male, 2% were gender non-conforming, and 1% were transgendered. As with the parents, about 96% of the students spoke English as a first language with 2.2% speaking French and the rest speaking a range of first languages, including American Sign Language/Langue des Signes Québécoise (0.4%). About 97% of students were born in Canada with 77% identifying as White, 6% as First Nations, Métis or Inuit (Indigenous), 2% as Black and less than 1% East Asian, South Asian, Middle Eastern, Latin American and Southeast Asian. Approximately 15% of the sample identified as having mixed ethnicity.

In terms of exceptionality or disability, Autism or a Learning Disability were the most common (see Figure 2). Our options for this question were drawn from the Ontario Ministry of Education categories of exceptionality (Ontario Ministry of Education, 2017), which is the term used in Ontario for students with disabilities or special education needs. Many parents chose multiple identifications for their child(ren), so the numbers indicated on the chart reflect approximately 1,100 identifications for 540 students. Of the total sample, about 13% of students ($n = 69$) had only an Autism identification/diagnosis with an additional 30% ($n = 164$) having Autism plus one or several other identifications (e.g., Developmental or Mild Intellectual Disability, Behavior Difficulty). Similarly, about 5% of students ($n = 31$) had an identification of only a Learning Disability, while 25% of the sample had an LD along with one or several other identifications (e.g., Behavior, Giftedness). In the 2022/2023 school year, the majority of students (60%) in the study spent all their school day in a regular class, with varying types and degrees of support. Over 87% attended a publicly funded school (8.8% attended a private school and 3.5% attended an on reserve/First Nations school). One student was being homeschooled, and one was reported as at home full time due to exclusion.

3.2 School belonging

Parents responded to 5 questions related to school belonging (see Table 1). The mean score for the scale was 3.29 out of 5.00 (SD = 0.84)

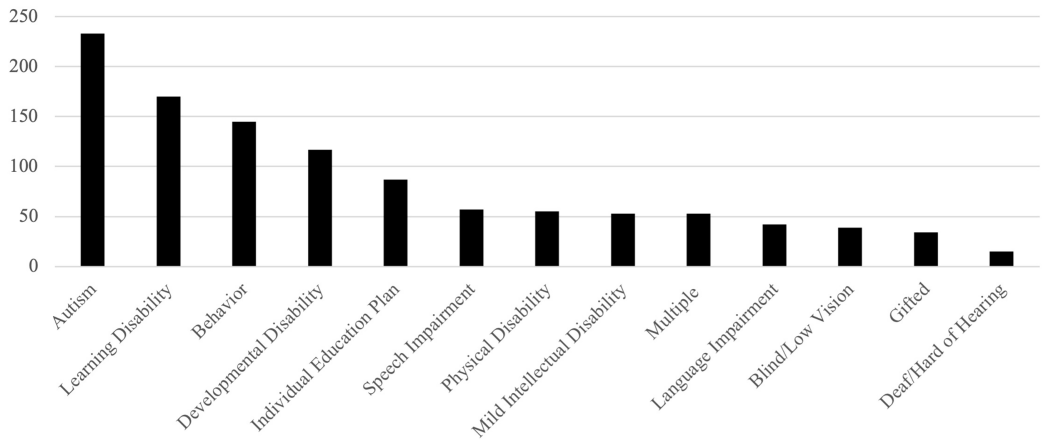

FIGURE 2
Frequency of exceptionality identification or diagnosis.

TABLE 1 School belonging items.

Item	Mean score (standard deviation)
How often does your child enjoy attending their school?	3.26 (1.19)
How often does your child feel like they are valued by school staff at school?	3.24 (1.10)
How often does your child feel like they are accepted by their peers at school?	3.01 (1.00)
How often has your child been excluded from academic events or opportunities at school this year?[a]	2.53 (1.22)
How often has your child been excluded from extracurricular or social events at school this year?[a]	2.52 (1.25)

[a]These items have been reverse coded so that a high score reflects a positive assessment with less exclusion.

reflecting a neutral to slightly positive overall report. Parents were least positive about peer acceptance at school and most positive about general enjoyment at school. According to parents, approximately 25% of students 'rarely' or 'never' enjoy school or feel valued or accepted; a similar percentage feel excluded from academics or extracurricular often or always.

3.3 Partial and modified school days

According to parents, 21% of students attended school on a part-time or modified basis in 2022/2023 with the most common schedule (25% of respondents) being 2–3 h per day. Ninety-two parents also provided a response to the open-ended question asking why their child was attending on a part-time or modified basis. Based on the results of our analysis, reasons clustered into five main areas: Student mental health and wellbeing ($n = 31$; anxiety, school refusal, bullying), a lack of resources at school ($n = 25$; no available Educational Assistant), student externalizing behaviors ($n = 20$; aggression, meltdowns), therapeutic services or alternative programs that took place during school hours ($n = 13$; applied behavior analysis), and physical health limitations ($n = 8$; fatigue, pain). Four responses could not be categorized as it was not possible to determine the explanation (e.g., "The school determined near the end of the school year that our son should be placed on modified schedule") and five described that a full day of school was "too long" or "too much." While categorized, many participants identified a combination of these explanations for a part-time schedule and many, as can be seen in Table 2, are interconnected with, for example, a lack of resources serving to increase anxiety. Some indicated whether the day was modified at the request of the family or school or was a requirement imposed by the school, but most did not provide this level of detail. Example verbatim quotes for each of the categories are provided in Table 2.

3.4 School absenteeism

Parents were asked to estimate how often their child was absent from school, regardless of whether they were attending on a full-time or part-time/modified schedule. As can be seen in Figure 3, approximately 32% of students missed 1 or fewer days/month, 30% of students missed 2 days per month and the remaining 38% missed 3 or more days per month (30+ days over the school year). Parent responses indicate that approximately 40% of our sample meet the well-established criteria for chronic absenteeism (10% missed days).

In terms of reasons for school absences (Table 3), parents were provided with six options as well as an 'other' option where they could write in a response. 119 participants chose to write a response. Our research team coded these, first determining whether they fit with existing options, and then identifying one new category "I kept my child home for medical or health reasons." Three families listed suspension as the reason for their child's absences, seven entries were deemed un-codable (e.g., "would rather not explain—it was traumatic for him") and 5 wrote in 'N/A'. Other single-entry items included transportation, sports, arts events, being demitted, and attending an alternative program. The final set of reasons provided in Table 3 reflect a combination of our original 6 items with the 119 open-ended responses.

3.5 Regression analyses

Before conducting the regression analysis, bivariate correlations were calculated between key variables to explore relationships and establish suitability for the linear regression analyses (see Table 4). For the gender variable, 96.3% of the sample chose either female or male and the remaining participants chose gender non-conforming, transgender, or prefer not to say. Given the small number of participants who selected options other than female or male, our analysis is unfortunately and necessarily restricted to those two categories. While many significant associations emerged, correlations were not at a level that risked multicollinearity. The strongest relationships were between absences and school belonging, the presence of a modified/part-time schedule, and family income.

Linear regression was next conducted with frequency of school absence as the dependent variable and school belonging, type of placement, child gender, child age, and family socioeconomic status. Missing data was treated with pairwise deletion. The regression analysis revealed a statistically significant model ($F(7,463) = 26.41$, $p < 0.001$) with an adjusted R^2 of 0.28. Variables that added significantly to the prediction included school belonging ($p < 0.001$), modified/part-time schedule ($p < 0.001$), and family income ($p = 0.004$). The type of class placement approached but did not meet significance ($p = 0.065$). Child age and gender as well as parent education were not related to the frequency of absences. Students who felt a greater sense of belonging at school, who did not attend school on a modified/part-time schedule, and whose family had higher income were more likely to attend school regularly.

4 Discussion

Our survey of over 500 parents/caregivers of Ontario students with disabilities revealed several novel findings. Approximately 20% of the sample attended school on a part-time or modified basis, most

TABLE 2 Example responses for reasons for part-time/modified schedule.

Category	Examples (direct quotes)
Student mental health and wellbeing	• Because the principal and teachers felt like it was too much for him to stay the full day. • Due to increased anxiety and bullying schedule was modified for mental health and her ADHD. • Severe anxiety attending school. PTSD-like symptoms. • In order to get him to go to the school in the morning, I agree to pick him up early (after lunch).
A lack of resources at school	• No EA support leading to school anxiety and refusal. • Leaves school and comes home during second nutrition break because there is no supervision for him. • They said the school has no funding to keep him full day.
Student externalizing behaviors	• Behavioral outbursts—hitting kicking swearing spitting. The school will not allow my son to attend full days unless he can behave what they consider properly for an entire 2-week period.
Therapeutic services or alternative programs	• Needed to attend therapy—applied behavior analysis, speech language pathology, occupational therapy. • Attends a forest school program 1/5 of the week because public school is too stressful and he needs the break (also more opportunities to have his sensory needs and social relationship needs met in this alternative program). • We enrolled him in education therapy (National Institute for Learning Development) 2× afternoons per week.
Physical health limitations	• Went part time and progressed to full time at beginning of year at our request and Occupational Therapist's recommendation, some push back from Learning Support Teacher, but we advocated for this. • We have to bring him home for eating as he will not eat at school and to change his pull ups as he is not toilet trained due to his fragile sensory system. • Due to having Juvenile Rheumatoid Arthritis and struggles with pain.

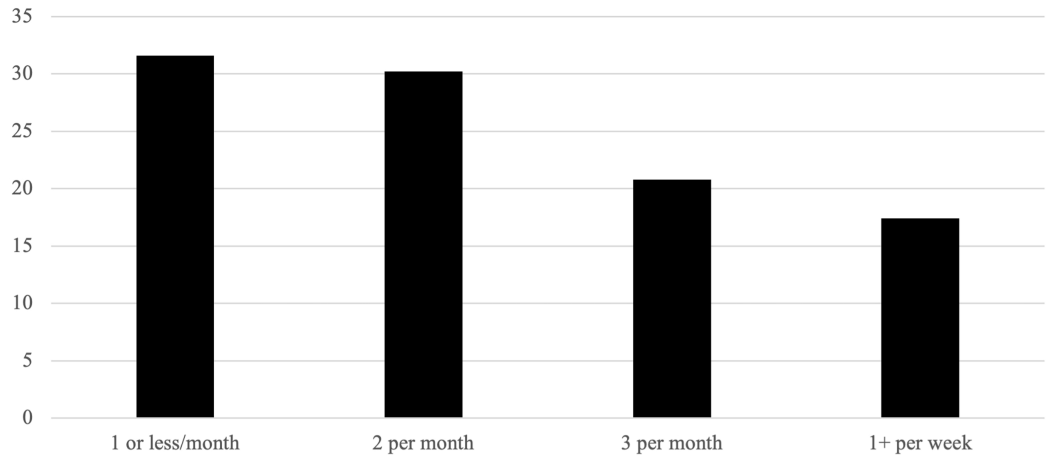

FIGURE 3
Average number of full days absent from school.

often 2–3 or 3–4 h/day. While previous studies are sparse, one survey conducted previously in Ontario (Autism Advocacy Ontario, 2019) reported a similar percentage of students attending part-time (24%).

Reasons for part-time schedules included student mental and physical health and wellbeing, a lack of resources at school, student externalizing behaviors, attending therapy or alternative programming. In terms of absenteeism generally, 40% of the sample met the criteria for chronic absenteeism (10% missed days), regardless of their schedule. Students missed schools for a variety of reasons, the most common being reluctance or school avoidance (24%), parents choosing to keep them home to give them a break or because the school wasn't meeting their needs (36%) and in almost 30% of cases, students were told to stay home from school or were sent home. While these reflected the one most common reason chosen by the parent, respondents typically listed several reasons which reflected an interactive combination of children feeling worried about or struggling with the transition to school, parents keeping them home to protect their mental health, concerns about the supports that was being provided by school and schools asking or telling parents to keep their children home because of their unmet needs.

Overall, our results showed that many students with disabilities are missing school, with a combination of partial and modified days, typically 2–3 h/day, and chronic, full-day absences. These students are statistically among those most likely to experience academic and social difficulties in and out of school, and to experience financial and health challenges into adulthood (Arnold et al., 2020; Foreman-Murray et al., 2022; Statistics Canada, 2025; Yoder and Cantrell, 2019). That they are missing such a significant amount of school is of major concern in relation to their short- and long-term wellbeing in

TABLE 3 Most common reason for school absence (N = 494).

Reason	Frequency (percentage)
My child was reluctant or avoided school.	117 (23.8%)
I gave my child a day off/I decided to keep my child home because of their emotional needs.	111 (22.6%)
I decided to keep my child home because I feel as though the school is not meeting my child's needs.	66 (13.4%)
The school sent my child home due to their behavior.	62 (12.6%)
I kept my child home for medical or health reasons.	56 (11.4%)
The school asked my child to stay away from school.	32 (6.5%)
The school sent my child home because of a lack of sufficient staff or resources.	47 (9.6%)

TABLE 4 Descriptive statistics and correlations for regression analysis variables.

Variable	n	M (SD)	1	2	3	4	5	6	7
1. Frequency of school absence	540	2.24 (1.08)	–						
2. School belonging	539	3.29 (0.83)	−0.41**	–					
3. Type of placement	540	4.31 (1.60)	0.01	0.15**	–				
4. Modified/part-time schedule[a]	540	1.79 (0.41)	−0.42**	0.29**	0.03	–			
5. Child gender[b]	517	1.65 (0.48)	0.04	−0.22**	0.02	−0.06	–		
6. Child age	536	10.98 (3.85)	0.02	−0.12**	−0.05	0.02	0.02	–	
7. Parent level of education	538	2.65 (0.95)	0.11*	0.12**	−0.09	−0.02	0.04	0.01*	–
8. Family income	491	2.81 (1.09)	−0.21**	0.15**	0.09	0.01	0.10*	0.14**	0.34**

[a]1 = yes and 2 = no.
[b]1 = female and 2 = male.
*$p < 0.05$. **$p < 0.01$.

multiple domains. As well, although our study did not focus on family experiences, previous studies have shown that absences of all types, including part-time and modified days, can impact families in a multitude of negative and reciprocal ways (Demie, 2022; Filce and LaVergne, 2015).

The reasons provided by caregivers, for students missing school reflect a range of student-, parent-, and school-influences. The high proportion of parents reporting student reluctance or avoidance is reflected in the extant literature where school refusal, anxiety, phobia and emotionally based school avoidance features predominantly (Klan et al., 2024; Leduc et al., 2024; Munkhaugen et al., 2017; Sasso and Sansour, 2024). The push-pull interactions between schools restricting access and parents withdrawing students likely operate in a dynamic fashion with student school avoidance. If a student displays anxiety and expresses refusal to attend, parents may then choose to keep them home—some may not see this as a 'choice' but more of a necessity based on not being able to get their child to school. Several studies have documented the negative schooling experiences that many students with disability have at school with peers and bullying in particular, which affects their willingness to attend school and ultimately their school absenteeism (Klan et al., 2024; Ochi et al., 2020; Sasso and Sansour, 2024).

Parents also reported concerns about a lack of supports available at school as a motivating factor to keeping their child home as well as a reason why schools directed parents to keep their child home. The challenges faced by school systems in meeting the needs of students with disabilities has also been well-documented, particularly via parent perspectives (e.g., Anderson, 2020). Parents often report insufficient understanding on the part of the school with respect to specific disability needs, a lack of qualified staff who can provide necessary supports, and difficulties accessing appropriate accommodations and inclusive pedagogical approaches (Kurth et al., 2020; Murphy and Risser, 2022). These challenges within the school system can result in insufficient or inappropriate responses to student needs and lagging skills, resulting in escalating student behaviors and exclusions, possibly contributing to emotionally based school avoidance going forward (Andersen et al., 2025; Brede et al., 2017).

As is demonstrated in Anderson et al. (2014) framework, the elements of the micro- and meso-system, which includes the classroom culture, the school culture, the staff, resources, interact with one another and with the determinants of inclusion experienced by the learner—in this case, to affect the willingness of a child to attend school, the likelihood that a parent/caregiver will facilitate or require their attendance, and direction from the school as to whether students are welcome. A deeper focus on understanding the role of parents in keeping students home is one important direction for future research. This insight is necessary to guide the development of approaches or interventions that address the underlying needs that motivates parents' choices and decision-making in regard to school attendance.

Finally, a model of school and family variables predicted approximately 30% of the variance in school attendance—students whose parents reported them having a high sense of school belonging, being on a full-time vs. a partial attendance schedule and having greater financial resources in the family were all significantly more likely to attend school more often. School belonging, a key determinant of inclusive education, has long been shown to be related to student engagement and academic achievement and

absenteeism for students with and without disabilities (Anderson, 2020; Korpershoek et al., 2020; Pampati et al., 2018; Williams et al., 2020). That it is the strongest predictor of rates of attendance is not surprising. Students who feel valued by staff and their peers, who are included in academic and extracurricular events at school, are likely more positive about being at school and are less reluctant to attend. The theoretical connection between inclusive education and absenteeism is confirmed by this finding. The connection with socioeconomic status is also well-confirmed by many decades of research in relation to absenteeism (Gee, 2018; Sosu et al., 2021). While mediating studies are scarce, it is likely families who have greater financial resources may be able to promote attendance for their children by providing basics such as food, stable housing and appropriate clothing, harnessing more social supports, navigating the school system to elicit more services, providing alternative modes of transportation if busses are missed due to child reluctance, and securing physical and mental health care for themselves and their children (Coughenour et al., 2021; Klein et al., 2020; Shaw and Shelleby, 2014). Interestingly, the age of the students did not significantly impact their overall attendance, in contrast to existing studies which have found that older students are far more likely to miss classes or days of school than younger students (Redmond and Hosp, 2008; Sasso and Sansour, 2024; Stromberg et al., 2022). The fact that data was reported by parents may have had an impact on this result, given that more adolescent absenteeism stems from skipping or what is called truancy, which parents may not be aware of. This sample of students with disabilities may also be more closely monitored in comparison to a group of students without disabilities—families who completed the survey shared many examples of being very involved in the lives and schooling of their students and students missing school in older grades may be less common.

4.1 Limitations and future research

Several limitations of the study are important to consider. First, the demographics reported by the participants do not reflect the cultural or ethnic diversity of Ontario, the province in which the study took place. Future research should prioritize recruitment of underrepresented communities, considering partnerships with organizations and offering languages beyond English and French. One group of students who we were not able to capture in analyses due to few responses are those who identify as gender diverse. Smaller qualitative studies exploring the experiences of these students in detail or larger, population-level surveys are recommended.

Our survey focused on parent perspectives, which is valuable and key to understanding the experiences of students. They typically know their children best and are the ones receiving calls from school to report issues or to pick up their child. However, their reports of exclusion and absenteeism are based on their own recollections and may not be entirely accurate. Future research could include in-the-moment data collection, perhaps via an app or similar technology that could capture the frequency and reasons for non-attendance, including exclusionary practices. Many Ontario school boards do use similar approaches for parents to report absences but the provided reasons for these absences are extremely limited (e.g., sickness, appointment) and instances where parents are called to pick up their child early or a parent choosing to keep their child home because of worry about exclusions are not captured. Comparing parent reports with school-collected data would be of value to the field as we do not yet know how 'accurate' each is in relation to the other. For young students in particular, parents have a significant role to play in whether or not their child attends school and future qualitative research, which could explore decision-making on the part of the parent (e.g., What factors are they considering and weighing? What previous experiences or anticipated outcomes are influencing their decision?) would be of significant value to the field.

Parent views of school belonging also capture what they have heard from their child and observed at school but may not reflect fully the child's experience or feelings about school. The voices of students themselves will be key to better understanding relationships between school belonging and absenteeism in future research. Additionally, school staff, who are also experiencing student absenteeism and exclusions in multiple ways, should be included to provide a fuller picture of the processes involved as well as potential impacts.

One final limitation was with respect to disability identity and identifications. We had originally intended to explore analyses focused on specific disabilities in relation to absenteeism and exclusion but were faced with the majority of respondents indicating that their child had multiple disabilities making straightforward and ethical groupings by disability impossible. Multiple diagnoses are the reality for many families and students, and this issue needs to be further explored in future studies in order to allow for possible disaggregation and identification of disability-specific experiences.

5 Conclusion

This study highlights absenteeism—including chronic absence and part-time or modified schedules—as a significant and often hidden barrier to inclusive education for students with disabilities. Parent reports reveal that many absences are linked to unmet needs, emotionally based school avoidance, behavioral challenges, and school-initiated exclusions, underscoring systemic gaps in supports required to ensure students can attend and participate meaningfully. School belonging emerged as a key predictor of attendance, reinforcing the importance of fostering environments where students, and their families, feel valued, included, and supported. Additionally, socioeconomic disparities contributed to unequal access to education, pointing to broader policy and resource implications. Sufficient and appropriate resources, including skilled, well-supported staff who have opportunities to work collaboratively, strong school leadership, and a positive and inclusive climate, are necessary to address student needs and to prevent escalations of behavior that often result in school-initiated exclusions.

Luckily, strategies to build inclusive schools where students feel a strong sense of belonging are also key to improving attendance. Tiered models for addressing chronic absenteeism typically include the development of a school-based team and analysis of *why* students are missing school, with the first tier focusing deeply on engaging with families, building relationships between students and teachers, making sure that all basic needs are met (e.g., nutrition), and

employing restorative disciplinary approaches (Attendance Works, 2025). Including attendance as an IEP goal is one suggested strategy, as well as home visits and providing medical and mental health services within a community school model (Jordan, 2023). Our findings demonstrate that improving inclusive education must include consideration of the barrier of absenteeism in all of its forms and complexities to advance consistent access, belonging, and meaningful participation for all students with disabilities.

Data availability statement

The raw data supporting the conclusions of this article will be made available by the authors without undue reservation.

Ethics statement

The studies involving humans were approved by University of Ottawa Research Ethics Board. The studies were conducted in accordance with the local legislation and institutional requirements. The participants provided their written informed consent to participate in this study.

Author contributions

JW: Writing – original draft, Writing – review & editing. SP: Formal analysis, Investigation, Conceptualization, Writing – review & editing. MO: Project administration, Writing – review & editing, Formal analysis.

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