



Office of the Regional Chair

May 8, 2019

Resolution Number 2019-299

The Honourable Christine Elliott
Ministry of Health and Long-Term Care
Hepburn Block, 10th Floor
80 Grosvenor St.
Toronto ON M7A 1E9

Dear Minister:

Subject: Public Health Vision Screening in Peel Schools

I am writing to advise that Regional Council approved the following resolution at its meeting held on Thursday, April 11, 2019:

Resolution 2019-299:

That the Ontario Public Health Standards Child Visual Health and Vision Screening Protocol be partially implemented by promoting the availability of a free annual comprehensive eye examination by an optometrist to parents and caregivers of young children;

And further, that the Regional Chair write a letter on behalf of Regional Council, to the Minister of Health and Long-Term Care, requesting changes to the Child Visual Health and Vision Screening protocol that reflect the scientific evidence and build on OHIP-funded comprehensive eye exams;

And further, that a copy of the Regional Chair's letter be sent to the Chairs of Ontario's Boards of Health.

Please find enclosed a copy of the report from the Commissioner of Health Services, titled "Public Health Vision Screening in Peel Schools" for your reference.

Yours Truly,

Nando Iannicca
Regional Chair and Chief Executive Officer

NI:sm

The Regional Municipality of Peel

Enclosed

Copied:

Nancy Polsinelli, Commissioner of Health Services
Chairs, Ontario Boards of Health

DATE: April 3, 2019

REPORT TITLE: **PUBLIC HEALTH VISION SCREENING IN PEEL SCHOOLS**

FROM: Nancy Polsinelli, Commissioner of Health Services
 Jessica Hopkins, MD MHSc CCFP FRCPC, Medical Officer of Health

RECOMMENDATION

That the Ontario Public Health Standards Child Visual Health and Vision Screening Protocol be partially implemented by promoting the availability of a free annual comprehensive eye examination by an optometrist to parents and caregivers of young children;

And further, that the Regional Chair write a letter on behalf of Regional Council, to the Minister of Health and Long-Term Care, requesting changes to the Child Visual Health and Vision Screening protocol that reflect the scientific evidence and build on OHIP-funded comprehensive eye exams;

And further, that a copy of the Regional Chair's letter be sent to the Chairs of Ontario's Boards of Health.

REPORT HIGHLIGHTS

- Vision is essential to child development and learning.
- Effective January 1, 2018, the modernized Ontario Public Health Standards: Requirements for Programs, Services, and Accountability required school vision screening services be offered to all senior kindergarten children.
- No ongoing additional funding from the Ministry of Health and Long-Term Care is available to implement this screening program.
- Research does not demonstrate evidence for the effectiveness of universal vision screening programs for children up to the age of six years.
- From birth, Ontario children are already eligible through OHIP for routine vision screening during well-baby and child visits by primary care providers, as well as annual comprehensive eye exams from optometrists.

DISCUSSION

1. Background

Vision is important for child development. Early identification and treatment of vision problems in the younger years is critical for learning potential and quality of life. Vision problems may go unnoticed in early childhood due to a child's inability to recognize or

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complain about visual deficits. Therefore, children are routinely screened for vision problems from birth by primary care providers (e.g., family doctors, pediatricians) at well-baby and child visits. Any concerns detected in a child at these visits would prompt a referral to an optometrist or ophthalmologist for further investigation.

OHIP covers an annual comprehensive eye exam by an optometrist for children from birth up to and including 19 years of age. The College of Optometrists of Ontario lists 402 optometrists practicing in Peel on its website.¹ Corrective eyeglasses or lenses are not covered by OHIP but may be funded by Ontario Works, the Ontario Disability Support Program, non-profit organizations (e.g. Eye See Eye Learn), third party insurance companies, or out-of-pocket payments.

Vision Issue

Five to 10 per cent of preschoolers will have vision difficulties which, if left untreated, may interfere with the proper development of visual acuity (i.e. sharpness of vision).² In severe cases, permanent loss of vision in one or both eyes may result. The most common vision problems in children include:

- **Refractive vision disorder:** the shape of the eye prevents a person from focusing well. The length of an eyeball or changes in the curvature of the cornea or lens may cause this disorder. Examples of refractive errors include: myopia (nearsightedness); hyperopia (farsightedness); and astigmatism (abnormal curvature of the cornea or lens).
- **Strabismus:** when both eyes do not line up in the same direction, resulting in the inability to look at the same object at the same time. One or both eyes may turn inward, outward or upward. Depth perception may be affected.
- **Amblyopia:** also known as “lazy eye”, when vision is reduced and not correctible to a normal level with optical devices. It exists in an eye that did not develop normal eyesight and usually presents in the first six years of life. It commonly progresses due to lack of treatment of refractive error and strabismus.

In Peel, 41 per cent of children born in 2008 had at least one comprehensive eye exam between two and five years of age.^{3,4} Across Ontario, the proportion is similar where 47 per cent of children had a comprehensive eye exam between the ages of two and five.^{3,4}

¹ College of Optometrists of Ontario. (2019). *Find an Optometrist*. [online] Available at: https://members.collegeoptom.on.ca/coo_prod/COO/PublicDirectory/Public_Directory_Member/Public_Register/PublicRegisterMember.aspx [Accessed 4 Jan. 2019].

² Canadian Pediatric Society, <https://www.cps.ca/en/documents/position/children-vision-screening>. Posted April 1, 2009 and reaffirmed February 28, 2018

³ Medical Services (OHIP Billing) Database, 2010-2014. Ontario Ministry of Health and Long-Term Care, IntelliHEALTH Ontario, Extracted: June 11, 2018.

⁴ Ontario Registered Persons Database, 2016. Ontario Ministry of Health and Long-Term Care, IntelliHEALTH Ontario, Extracted: June 11, 2018.

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2. Childhood Universal Vision Screening Programs

Vision screening is a short sequence of tests that are administered by trained individuals to identify children in need of a comprehensive eye exam for the diagnosis and/or treatment of vision problems.

Vision screening cannot diagnose vision disorders, nor is it a replacement for a comprehensive eye exam which is a more fulsome assessment of eye health. Comprehensive eye exams are typically completed by an optometrist (see Appendix I: Vision Health Services in Ontario).

Globally, childhood universal screening programs vary widely by route of delivery (e.g., school vs. clinic-based), method, and age at screening. In 2016, Public Health Ontario conducted a systematic review regarding the effectiveness of universal vision screening programs for children one to six years of age; however, Public Health Ontario was unable to draw a definitive conclusion due to the lack of high quality evidence available.⁵

3. Role of Public Health Units in School-Based Vision Screening

Effective January 1, 2018, the Ontario Public Health Standards: Requirements for Programs, Services, and Accountability requires all Boards of Health to provide, in collaboration with community partners, visual health supports and vision screening services, in accordance with the Child Visual Health and Vision Screening Protocol, 2018.⁶ The protocol defines the roles, responsibilities and steps necessary for public health units to:

- Annually implement vision screening with senior kindergarten students in all schools; and
- Increase awareness of visual health and the availability of OHIP-covered comprehensive eye exams.

This includes pre-screen and post-screen notifications to parents (i.e., by letter or telephone), health promotion and targeted outreach to priority populations.

Public health units would use three vision screening tests to identify high-risk children in need of a comprehensive eye exam by an optometrist. Screening would take on average up to 20 minutes per child. Additional staff time will be required to follow up with parents post screening. Public health units must also collect and record screening data for analysis and interpretation, as specified by the Ministry of Health and Long-Term Care ('Ministry').

Funding is not provided by the Ministry to public health units to support ongoing implementation of the protocol. Peel Public Health would need to cut back on other services to free up funding for this program. Based on 2018 data, approximately 15,200 senior kindergarten students in Peel would require vision screening annually.

⁵ Ontario Agency for Health Protection and Promotion (Public Health Ontario). (2016). Effectiveness of vision screening programs for children aged one to six years. Toronto, ON: Queen's Printer for Ontario.

⁶ Ministry of Health and Long-Term Care. (Aug., 2018). Child Visual Health and Vision Screening Protocol, 2018. Toronto, ON: Queen's Printer of Ontario. [Online]
http://health.gov.on.ca/en/pro/programs/publichealth/oph_standards/docs/protocols_guidelines/Child_Visual_Health_and_Vision_Screening_Protocol_2018_en.pdf

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4. Recommended Approach for Region of Peel

Routine vision screening by primary care providers and comprehensive eye exams by optometrists are available in the community yet a gap exists in their utilization. In the context of a lack of ongoing Ministry funding, and the uncertain evidence to support universal vision screening programs, staff recommend:

- That the Ontario Public Health Standards Child Visual Health and Vision Screening Protocol be partially implemented by promoting the availability of a free annual comprehensive eye examination by an optometrist to parents and caregivers of young children; and
- That the Regional Chair on behalf of Regional Council, send a letter to the Minister of Health and Long-Term Care, requesting changes to (the removal of the vision screening requirement component of) the Child Visual Health and Vision Screening Protocol within the Ontario Public Health Standards.

This approach will avoid the significant costs associated with screening thousands of senior kindergarten students in different schools in Peel and the time required for parent follow-up. If vision screening was implemented in Peel schools, resources would need to be found through increased Regional funding or by diverting funds from other programs that have a greater potential impact on health.

This approach also includes Peel Public Health working to better understand the barriers experienced by parents/caregivers to access vision services.

RISK CONSIDERATIONS

Peel Public Health would not be in compliance with the vision screening requirement under the Ontario Public Health Standards and would risk non-compliance with the *Ontario Health Protection and Promotion Act*. Partial implementation will not put children at risk since emphasis will be placed on promoting the free, OHIP-covered comprehensive eye exams, while exploring and reducing barriers for priority populations. This includes working with community partners, including school boards, to maximize health promotion reach and impact.

FINANCIAL IMPLICATIONS

Regional funding for staff resources and equipment would be required for full implementation of the Vision Screening Protocol, in the absence of Ministry funding. This includes a projected \$1,311,000 for staffing requirements and \$55,000 for initial capital expenses for screening equipment.

Costs for travel and production of health promotion resources are not included in this estimate.

Partial implementation through health promotion resources is estimated at \$10,000 for printing and translation costs. The promotion of OHIP-covered eye exams by optometrists could be delivered by oral health staff during school dental screenings.

In 2018, the Ministry provided one-time funding whereby \$5,100 was used for determining the feasibility and design of a vision screening program. A funding request to support the full implementation was submitted in 2019, however there is significant risk of not receiving the full

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amount given the current provincial policy of cost containment and historic underfunding of Public Health in Peel.

CONCLUSION

Vision health is important for child development and learning. OHIP-covered eye exams by optometrists are available to diagnose vision problems. Public Health can work with schools and parents to build awareness about visual health and the free vision services available in the community.



Nancy Polsinelli, Commissioner of Health Services



Jessica Hopkins, MD MSc CCFP FRCPC, Medical Officer of Health

Approved for Submission:



J. Smith, Acting Chief Administrative Officer

APPENDICES

Appendix I – Vision Health Services in Ontario

For further information regarding this report, please contact Paul Sharma, Director, Chronic Disease and Injury Prevention, ext. 2013.

Authored By: Kirsten Barnes, Sandra Almeida, Chronic Disease and Injury Prevention

Reviewed in workflow by: Financial Support Unit

**APPENDIX I
PUBLIC HEALTH VISION SCREENING IN PEEL SCHOOLS**

Vision Health Services in Ontario

The following table compares the vision screening and eye exams conducted by primary care providers, public health and optometrists.

Provider	Age Group and Frequency	Service Type	Service Components
Primary care providers (i.e. family physicians, pediatricians, nurse practitioners)	0-5 years at every well-baby/child visit	Routine vision screening	<ul style="list-style-type: none"> • Child's health history • Risk factor assessment (e.g. family history of eye disorders) • Retinal exam (red reflex) • Eye alignment • Visual acuity (age 3+)
Public Health Units	4-5 years olds in senior kindergarten	Universal vision screening	<ul style="list-style-type: none"> • Visual acuity • Depth perception • Refractive error (e.g. myopia/hyperopia, astigmatism)
Optometrists	0-19 years, annually	Comprehensive eye exam	<ul style="list-style-type: none"> • Child's health history • Risk factor assessment (e.g. family history of eye disorders) • Visual acuity • Depth perception • Eye alignment and focus • Eye muscle movement • Retinal exam after pupil dilation • Slit lamp exam of the front of the eye (e.g. cornea, lens) • Refractive error (e.g. myopia/hyperopia, astigmatism) • Prescription for eye glasses or other treatment • Eye pressure (as needed) • Colour vision (as needed)

Vision screening cannot diagnose vision disorders, nor is it a replacement for a comprehensive eye exam conducted by an optometrist.