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# **For Your Information**

News for Healthcare Providers Peterborough County and City

## **Ontario Rotavirus Hospitalizations Drop 71 Percent After Launch of Infant Vaccine Program**



Immunizing babies against rotavirus in Ontario led to a 71% drop in hospitalizations for the infection, new research from Public Health Ontario (PHO) and the Institute for Clinical Evaluative Sciences (ICES) has shown.

Rotavirus infection can cause acute gastroenteritis – vomiting, diarrhea, fever and abdominal pain (otherwise known as "stomach 'flu") and lead to severe dehydration. Previous research found that for Canadian kids infected with rotavirus, 33% see a doctor, 15% visit the emergency department, and 7% need hospitalization. Because it is highly infectious, the virus is also easily spread to other family members and caregivers when a child gets sick. However, a new paper from PHO and ICES

researchers shows that the number of children and adults showing up at Ontario hospitals with acute gastroenteritis dropped considerably after the introduction of the rotavirus vaccine program for infants in 2011.

"We were very excited to see the significant impact of the rotavirus vaccine program. Hospitalizations in Ontario due to rotavirus infection were reduced by 71%, and emergency department visits dropped by 68%," says Dr. Sarah Wilson, lead author of the study who is a medical epidemiologist at PHO and an adjunct scientist at ICES. "We expected to see a drop for babies and toddlers who were vaccinated under this program. What's particularly interesting is we saw the drop even in older kids who were too old to receive the publicly-funded rotavirus vaccine, which means that protecting babies against illness also benefitted older children."

With data spanning eight years (2005-2013) from ICES, Wilson and fellow researchers looked at 864,262 anonymized hospitalization and emergency department records for rotavirus infection and acute gastroenteritis. The study was divided into two time periods – before and after the introduction of Ontario's rotavirus vaccine program. "This research clearly shows how effective a public vaccination program can be at protecting babies and kids from getting sick and alleviating burden on the health care system," says Dr. Shelley Deeks, medical director of immunization and vaccine-preventable diseases at PHO and a co-author on the study. "This paper adds to the body of scientific evidence demonstrating the impressive impact of rotavirus vaccine programs."

In Ontario, the rotavirus vaccine is given to babies at two and four months of age. The paper, *Population-level impact of Ontario's infant rotavirus immunization program: evidence of direct and indirect effects*, is available online in the May 11 issue of PLOS ONE (*http://journals.plos.org/plosone/*)

#### Key facts:

- Prior to the start of rotavirus vaccination programs in Canada, about two-thirds of hospitalizations for acute gastroenteritis were in children under two years old.
- 864,262 Ontario hospital records covering an eight-year span were examined for rotavirus infection and acute gastroenteritis needing hospitalization or an emergency department visit.
- Hospitalizations for babies less than one year of age dropped 79% after rotavirus program was introduced; hospitalizations of toddlers 12-23 months saw a 73% decrease.
- Evidence of herd immunity in both older children and adults was found:
  - Hospitalizations for rotavirus infection among children 5-19 years of age dropped by 75%.
- Hospitalizations for acute gastroenteritis in adults declined by up to 38%.

#### For more information, please contact:

Kathleen Sandusky, Media Advisor, ICES kathleen.sandusky@ices.on.ca (o) 416-480-4780 or (c) 416-434-7763

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# ANTIMICROBIAL RESISTANCE

A PUDLIG HEALIN INKEAT

Antimicrobial resistance is an increasingly serious health issue in Ontario and worldwide. As more antimicrobial drugs become ineffective and fail to treat a growing number of infections, those infections persist and increase the risk of disease, poor health and death. Action is required to ensure the use of antimicrobials only when necessary to safeguard the availability of future treatments for both common and serious infections.



#### Highlights

In Canada, total medical care costs associated with antimicrobial-resistant organisms (AROs) are estimated at \$1 billion annually.

Antimicrobial resistance puts many achievements of modern medicine at risk, and there is considerable urgency to ensure effective antimicrobials are available.

Between 2010 and 2014 nearly half of Escherichia coli and Klebsiella pneumoniae tested from urinary tract infections were resistant to the antibiotics commonly used for treatment.

Resistance to cephalosporins, the last class of drugs available to treat gonorrhea, has remained relatively high at 10.1% of isolates tested in 2014.

From 2011 to 2014, the percentage of carbapenemase-positive isolates increased from 11% to 17% of all suspected carbapenemase-producing Enterobacteriaceae (CPE) isolates, indicating that this organism has the potential to become a more widespread problem.

Due to the complexity of the problem, addressing the growing threat of antimicrobial resistance is a shared responsibility and coordinated action is required to minimize emergence and spread of disease.

For a great infographic on this topic, click here or please visit www.publichealthontario.ca and search "antimicrobial resistance".

## Reporting Carbapenem-producing enterobacteriaceae (CPE) infections

Formerly referred to as carbapenem-resistant Enterobacteriaceae (CRE), the terminology has been changed to CPE to more accurately reflect the mode of resistance.

Public Health Ontario (PHO) has released the following set of new online CPE resources:

- A new online surveillance form for practitioners to report cases of CPE to PHO. This new format will be more user-friendly and efficient while providing a secure way to transmit patient information. Your continued reporting is crucial to informing PHO's CPE surveillance activities.
- The latest CPE Ontario Surveillance Report summarizes the data in a 12-month period from January to December 2015. This report consists of two parts: epidemiological data from hospital patients who were diagnosed with CPE and laboratory surveillance data.
- A central CPE resource page for all PHO resources including laboratory information, research, data reports and more.

For more information or questions, please contact: *ipac.surveillance@oahpp.ca* 



Peterborough County-City HEALTH UNIT

because health matters!

## Help Prevent Children from Choking in our Community

Remind parents and caregivers of children under 4 that it is very important to always supervise when feeding.

#### Parents/caregivers should:

- be aware of children's chewing and swallowing abilities;
- ensure children are sitting upright (not lying down, moving or distracted from eating);
- avoid allowing children to eat in a moving vehicle;
- avoid serving foods that may cause choking; and
- know what to do if choking occurs.

Family meals help ensure proper supervision and model healthy habits for children.

#### Foods that may cause choking:

Parents/caregivers should avoid offering hard, small, round foods, smooth and sticky, solid foods that can block a young child's airway. Higher risk foods include hard candies or cough drops, gum, popcorn, marshmallows, peanuts or other nuts, seeds, fish with bones, and snacks served using toothpicks or skewers.

#### Parents/caregivers can make foods safer by:

- grating raw carrots; and hard fruits such as apples, and pears;
- avoiding carrot sticks/baby carrots or chunks of raw pear, apple and celery as young children do not have the teeth required to grind food down to a small, safe size;
- removing the pits/seeds from fruits such as apple cores, peaches, and cherries;
- thinly spreading peanut/nut butters on crackers or toast;
- finely chopping fibrous or stringy foods, such as celery or pineapple; and
- dicing or cutting foods lengthwise, such as hot dogs, sausages, grapes, or cherry tomatoes.

Remind parents/caregivers to keep small objects away from young children. If an object fits through a cardboard toilet paper roll, it can cause a young child to choke. Also, keep young children away from latex balloons.

It is not possible to prevent all choking incidents. Parents and caregivers can become trained in choking first aid and cardiopulmonary resuscitation. To find out about local training opportunities, call the Family HEALTH*line* at 705-743-1000.

#### For more information, visit:

- Health Canada @ www.hc-sc.gc.ca and search Nutrition for Healthy Term Infants: Recommendations from Six to 24 Months
- Parachute Canada @ www.parachutecanada.org and search Choking

### **Registered Dietitians the Best Choice for Credible Nutrition Information**

Refer your patients and clients to Registered Dietitians to receive credible nutrition information and support based on evidence.

Registered Dietitians use their knowledge and skills in food and nutrition to promote good health via ethical practice. Registered Dietitians are health care professionals who have graduated with a Bachelor's degree and/or Master's degree specializing in food and nutrition and have completed supervised practical training through a university program or an approved hospital or community setting internship.

Dietitians are accountable to their provincial regulatory bodies for their professional conduct and the care they provide. The title 'dietitian' is protected by law, just like physician, nurse or pharmacist. 'Nutritionist' is not a protected title – that means anyone can use it.

Locally Registered Dietitians practice in a wide variety of settings including clinical dietetics providing nutritional care to patients in various disease states and conditions via Family Health Team, Pediatric Outpatient Program, Partners in Pregnancy, and the Peterborough Regional Health Centre.

Private Practice Dietitians work with industry, workplaces, with individual clients and provide group counseling.

Public Health Nutritionists/Registered Dietitians work on comprehensive public policy, population health initiatives including education/ awareness, food security, food skill building and promoting and maintaining supportive nutrition environments.

Local Registered Dietitian services directory can be found at pcchu.ca | For Professionals | Health Professionals | Nutrition under Resources on the right sidebar.

For more information on the difference between registered dietitians and nutrition consultants please visit *www.dietitians.ca*.





# Website for Healthcare Professionals Supporting



## **Immigrant and Refugee Children**

Caring for Kids New to Canada helps health professionals provide quality care to immigrant and refugee children, youth and families. It was developed by the Canadian Paediatric Society with experts in newcomer health. If your practice includes this population, be sure to visit their website at *www.kidsnewtocanada.ca*.

# **Health Training For HCPs**

#### TEACH Core Course: An Interprofessional Comprehensive Course on Treating Tobacco Use Disorder

May 9 - 11, 2016 Toronto, ON

This classroom based introductory course will help learners to screen, assess and treat people with tobacco dependence using evidence-base approaches.

Cost: \$150 within Ontario Contact: 416-535-8501, ext. 31600 Website: www.teachproject.ca Email: teach@camh.ca

# **Health Events For Patients**

Help Improve Your Child's Listening and Talking Skills Thursday, May 12, 2016 7:00 p.m. - 9:00 p.m. McDonnel Activity Centre 577 McDonnel Street, Peterborough

Peterborough Healthy Families is inviting parents and caregivers to a free presentation. Come out and hear Dave Sindrey, Speech-Language Pathologist and Auditory Verbal Therapist, talk about his favourite apps, songs and stories that can be used to promote active listening and talking. There will be opportunity for questions and discussions with Dave following the presentation.

For more information, please call Leisa Baker, Public Health Nurse at 705-743-1000, ext. 312 or visit *www.peterboroughhealthyfamilies.ca*.

# **Health Events For Patients**

#### **Prenatal Classes for Patients**

Our series of five, twohour classes will prepare you for the challenges of birth, caring for your baby, and becoming a parent. You'll gain confidence as you explore up-to-date information, practice new



skills, share ideas, and connect with other expectant parents in a friendly and supportive environment.

#### You'll learn about:

- Caring for your newborn
- Breastfeeding your baby
- Your baby's birth
- Comfort measures for labour ( Lamaze )
- · Medical management of pain and other interventions
- Changes and challenges of becoming parents
- Classes are led by experienced and enthusiastic Registered Nurses who are committed to supporting you with information you can trust to make informed choices for you and your family.

**Date:** Classes are ongoing on week nights from 7:00 p.m. -9:00 p.m. They start at the beginning of your third trimester (28-30 weeks). Because classes fill up quickly, register as soon as you know you are going to have a baby, to ensure a spot.

**Place:** Peterborough Public Health Jackson Square, 185 King Street, Peterborough

**Fee:** \$50.00. This includes refreshments, the book *Baby's Best Chance* and other resources, as well as free parking for classes and your hospital tour.

Please let us know if the fee would prevent you from attending, as subsidies are available.

**To register or for more information**, call or email the Peterborough County-City Health Unit 705-743-1000, ext. 254 or 282 or *info@pcchu.ca* 

**Hospital Tour:** To book a tour of the Peterborough Regional Health Centre's Labour and Delivery area, please call 705-876-5017.

