

## Group A Streptococcal Sore Throat Management Guideline

The National Heart Foundation of NZ and the Cardiac Society of ANZ have updated their sore throat management advice: Group A Streptococcal Sore Throat Management Guideline: 2014 Update. The aim of the guideline is to maximise diagnosis and management of pharyngitis in those who are at greatest risk of developing rheumatic fever, while minimising investigations and antibiotic use in those who are at the lowest risk. Key points are summarised below. The full guideline can be found at: <http://www.heartfoundation.org.nz/uploads/GAS%20Sore%20Throat%20Management%20Guideline%20Update%202014.pdf>.

Pages 13-15 of the guideline are enclosed with this edition of Public Health Advice.

### Summary and Key Recommendations

#### *Risk groups*

The population at **High Risk for Rheumatic Fever** (ARF) is defined as those individuals who have a personal, family or household history of rheumatic fever, or who have **two or more** of the following criteria: Māori or Pacific ethnicity, age 3-35 years or living in crowded circumstances or in lower socioeconomic areas of the North Island.

The population at **Low Risk for Rheumatic Fever** is defined as those who are non-Māori and non-Pacific people, children under 3 years old and adults older than 35 years old, those not living in crowded circumstances or lower socioeconomic areas of North Island and with no personal, family or household history of ARF.

In the population at high risk of ARF, the correct treatment of group A streptococcal (GAS) pharyngitis will substantially reduce the occurrence of ARF.

In the population at low risk of ARF, minimisation of throat swabbing and antibiotic treatment should be the aim.

#### *Throat swabbing and treatment of GAS*

Throat swabbing remains the gold standard. Rapid Antigen Diagnostic Tests are not currently recommended in high risk rheumatic fever settings.

Confirmed or suspected GAS pharyngitis in **high risk populations**, should be treated as soon as possible after diagnosis. To ensure ARF prevention, it is not safe to wait up to nine days as previously recommended.

Courses of oral antibiotics for GAS pharyngitis should be of 10 days duration.

Alternatively benzathine penicillin can be given (with lignocaine to reduce injection site pain). Both can be used in pregnant and breast feeding women. The smaller dose (450mg/0.6 mega units) of benzathine penicillin for smaller children is now recommended for all less 30kg.

Non-steroidal anti-inflammatory drugs (NSAIDs) are useful for the symptomatic treatment of pharyngitis. If a diagnosis of rheumatic fever is being considered, NSAIDs should be avoided until a diagnosis is secure as NSAIDs can mask symptoms and test results.

Patients on warfarin should have their international normalised ratio (INR) monitored at the time of antibiotic commencement, at day three or four and upon completion.

Consideration should be given to isolating a symptomatic GAS positive patient for 24 hours after starting antibiotics if he/she is:

- A worker at risk of spreading GAS in their workplace (healthcare and residential care workers, food handlers, teachers and childcare workers)
- Attending school or day care.

End of antibiotic treatment throat swabbing is not recommended except in the following situations:

- Those with a history of rheumatic fever
- Where there is recurrent GAS pharyngitis within families (3 or more confirmed GAS infections in individual or family within the previous 3 months)
- Those who develop GAS pharyngitis during outbreaks in a closed or partially closed community e.g. boarding schools, hostels, barracks, prisons
- Those who develop GAS pharyngitis during outbreaks of ARF or post-streptococcal glomerulonephritis, as advised by the Medical Officer of Health.

### Management of contacts

Throat swabbing is recommended for symptomatic contacts of a patient with GAS pharyngitis. This is particularly so for school-aged contacts.

Antibiotic prophylaxis is not routinely recommended for GAS negative (uninfected) household contacts of patient with GAS pharyngitis.

In high risk settings for rheumatic fever, the following current recommendations remain unchanged:

- **Symptomatic** household members of a person with GAS pharyngitis should be throat swabbed and treated if GAS positive.
- Where there is a personal, family or household history of rheumatic fever, **all** household members of a person with GAS positive pharyngitis should be swabbed.
- Where **an individual** has had three or more episodes of GAS pharyngitis in the last three months, all household members should be swabbed.
- Where there have been three or more cases in **a household** in the last three months **all** household members should be swabbed to identify and treat any GAS carriers.

- **In an outbreak of GAS Pharyngitis in a closed or semi-closed community** e.g. a classroom or boarding school, all members should be swabbed to identify and treat any pharyngeal GAS.
- In some circumstances, when a person presents with symptoms of pharyngitis, assessment of the risk of spreading GAS in the **workplace** is recommended. Throat swabbing is recommended for the following people:
  - Health and residential care workers
  - Food handlers
  - Teachers
  - Childcare workers.

If an individual is GAS positive, throat swabbing and treating all GAS positive workplace contacts (symptomatic or not) may be necessary.

### **“Say Ahh”**

Since 2011 the Hawke’s Bay “Say Ahh” school sore throat swabbing programme has achieved increasing swab numbers and treatment of GAS positive children. It is currently operating in nine schools in and around Flaxmere, in response to high rheumatic fever notification rates in the area.

Between 2011 and 2013 there was a significant increase in the number of swabs taken, the positivity rate and the number of GAS infections diagnosed and treated.

In 2013: 1871 children were eligible; 94% consented to participate; 3209 swabs were taken; 519 (16%) were GAS positive; 1079 children were swabbed; 390 (36%) were GAS positive. 100 percent of cases of GAS infection were offered treatment by the programme or their own GP.

18% of household contacts were GAS positive.

A detailed evaluation of the programme has been commissioned and will be reported in 2015.

### ***The Ministry of Health rheumatic fever website***

This contains useful information: <http://www.health.govt.nz/your-health/conditions-and-treatments/diseases-and-illnesses/rheumatic-fever>

### ***Rheumatic fever CME session in 2015***

A rheumatic fever CME session is planned for March 2015. It is likely to cover the biology and epidemiology, sore throat management, nurse-led sore throat clinics, the HBDHB secondary prevention programme, an update on the Say Ahh programme, and healthy housing. For further information contact Hawke’s Bay PHO.

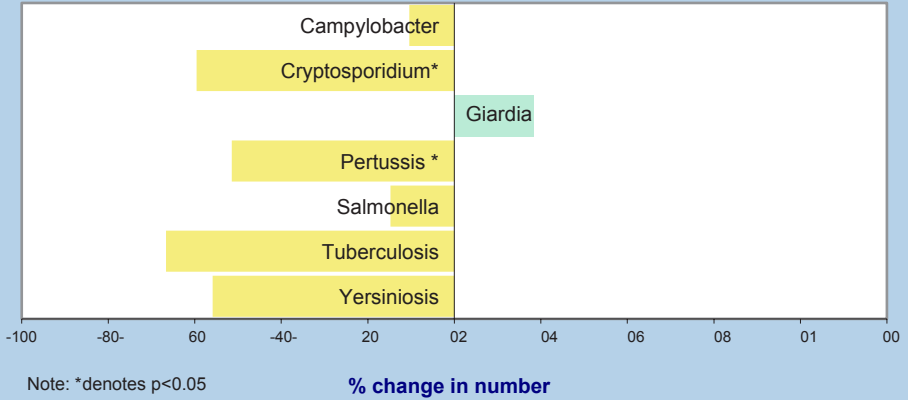
### ***Public Health Advice is available by email***

If you prefer to receive this bulletin by email in PDF format, instead of hard copy, please let us know by email to

[lester.calder@hbdhb.govt.nz](mailto:lester.calder@hbdhb.govt.nz).

# Disease Surveillance Summaries

**Selected Hawke's Bay disease notifications for March 2014 to August 2014 compared to the average for the same period during 2009-2013**



**Selected notifications September 2013 to August 2014**

Disease	Hawke's Bay		New Zealand	
	Cases	rate*	Cases	rate*
Campylobacteriosis	315	202.6	6,836	152.9
Chlamydia	1,378	887.3	153	631.8
Cryptosporidiosis	29	18.7	694	15.5
Giardiasis	87	56.0	1,772	39.6
Gonorrhoea	226	145.5	3,242	72.5
Hepatitis A	7	4.5	76	1.7
Invasive pneumococcal disease	20	12.9	506	11.3
Latent tuberculosis infection	10	6.4	408	9.1
Lead absorption	4	2.6	216	4.8
Legionellosis	1	0.6	142	3.2
Leptospirosis	19	12.2	61	1.4
Meningococcal disease	4	2.6	52	1.2
Pertussis	33	21.2	1,666	37.3
Rheumatic fever	6	3.9	236	5.3
Salmonellosis	28	18.0	1,013	22.7
Tuberculosis disease	4	2.6	309	6.9
VTEC/STEC infection	3	1.9	170	3.8
Yersiniosis	9	5.8	466	10.4

\* Annualised crude rate per 100,000 population calculated from 2013 mid-year estimates.

Note: The figures for Chlamydia & Gonorrhoea are for the 12 months ending June 2014.

# Immunisation Issues

## Upcoming training:

Update for trained vaccinators: 15 October, venue Education Centre, Hawke's Bay Hospital, cost \$60.00

Vaccinator training course: 18 – 19 November, venue Cornwall Park Cricket Pavilion, cost \$120.00

## National Immunisation Schedule Changes

From 1 July changes have been made to the national schedule. Key changes include:

**Rotateq oral rotavirus vaccine** is funded for all infants receiving the **first dose** between 6 weeks and under 15 weeks of age. It is a course of 3 vaccines given at a minimum of 4 weeks apart and the last dose must be administered prior to the infant being **8 months 0 days old**.

**Prevenar 13 (PCV13)** will replace Synflorix (PCV10) for all infants and children (NB: Prevenar 13 will be distributed once current Synflorix stock has been used).

**Gardasil (HPV)** remains on the schedule for girls at 12 years of age but they will be able to start their course of funded vaccines from 9 years of age. The upper limit to start a funded vaccine course remains before 20 years of age. When the first dose is given prior to 20 years of age, doses two and three are funded even if they are given when 20 years or over.

**Changes to funded vaccines for specified high risk groups:** there are numerous changes for high risk groups. To find out if patients are eligible, refer to chapter 4, page 115 of the 2014 Immunisation Handbook. All special groups are covered in this chapter.

**Change to Rubella immunity antibody levels.** NZ has aligned with the WHO. Women with a rubella antibody level of  $\geq 10$  IU/mL, i.e. 10 IU/mL or greater, are considered to be immune to rubella. Some commercial laboratories assays have a cut-off higher than 10 IU/mL for rubella immunity. It is recommended that the testing laboratory's interpretative comment is followed e.g. if the patient's rubella antibody level is 15 IU/mL, and the laboratory comments that the result does not indicate immunity – follow the laboratory's advice and offer funded MMR immunisation if there is no documentation of two previous doses.

**Changes to serology for infants born to HBsAg-positive mothers:** Serological testing will be at nine months of age (instead of the current five months of age). At nine months of age: HBsAg negative and anti-HBs  $\geq 10$  IU/L indicates immunity.

Public Health Advice is also available on the  
Hawke's Bay District Health Board website:

<http://www.hawkesbay.health.nz/page/pageid/2145871321>