HANDS UP FOR HANDS-ON!

Infection Prevention & Control Newsletter

The purpose of bringing this newsletter to you is to provide you with information and updates on contemporary infection prevention and control issues that may be relevant to your workplace. We hope you find the information informative and useful.

Hands Up for Hands-On
Autumn/Winter 2012

Inside this issue:

Special Points of Interest

Updated Recommendations for Pneumococcal Vaccination of Adults

In December 2011 ATAGI released an update to the recommendations for vaccination of adults with 23vPPV (Pneumovax 23). The revised recommendations are:

- A dose of 23vPPV should be given to adults at 65 years of age. Every effort should be made to provide a dose to anyone >65 years who has not previously received a dose of 23vPPV.
- For non-indigenous adults ≥65 years a second dose (a single revaccination) of 23vPPV, to be given ≥5 years after the first dose, is recommended for those who have a condition that predisposes them to an increased risk of invasive pneumococcal disease (IPD).
- **A second dose is no longer recommended for those without any of the below predisposing conditions**.
- Recommendations for the use of 23vPPV in those <65 years, including for Aboriginal and Torres Strait Islander (Indigenous) adolescents and adults, are unchanged from the 9th edition of the Australia Immunisation Handbook.

Risk factors predisposing adolescents and adults to IPD:

- Underlying chronic medical conditions: Asplenia, either functional or anatomical.
- Conditions causing impaired immunity (e.g. HIV infection, acute nephrotic syndrome, multiple myeloma, lymphoma, Hodgkin's disease and organ transplantation.
- Chronic illness including chronic cardiac, renal, or pulmonary disease, diabetes, alcohol-related problems, CSF leak.
- Tobacco smokers

Reference: 2011 ATAGI Updated recommendations for revaccination of adults with 23-valent pneumococcal polysaccharide vaccine (23vPPV), Pneumovax 23.

Vaccination Update Polio

Polio vaccination is usually given as a combination vaccine:

For children <8 years of age :
Infantix hexa is combined with Diphtheria, Tetanus, Pertussis and Hepatitis B.
Infanrix-IPV is combined with Diphtheria, Tetanus and Pertussis
Infanrix Penta is combined with Diphtheria, Tetanus, Pertussis and Hepatitis B

For people >8 years of age
Adacel Polio is combined with Diphtheria, Tetanus and Pertussis
Boostrix IPV is combined with Diphtheria, Tetanus and Pertussis
IPV (IPOL) – inactivated Polio virus only

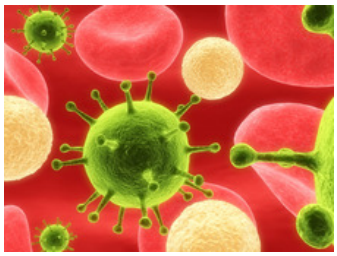
The current WA vaccination schedule is:
Primary vaccination for children
2, 4 and 6 months of age
4 years of age (booster dose)

Primary vaccination of adults is a course of 3 doses of IPV at intervals of 1—2 months

Booster dose for adults are not necessary unless they are at special risk (includes HCWs in possible contact with Polio cases)

For further information see:
www.immunise.health.gov.au

What am I ?



I am a virus transmitted almost exclusively via the faecal-oral route.

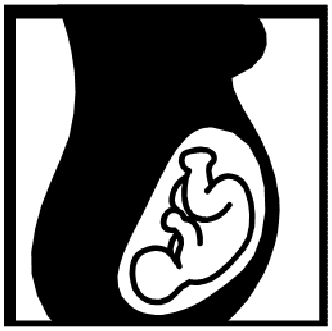
I am clinically indistinguishable from several similar infections and therefore require serologic diagnosis. I cause an acute, self-limiting infection whose clinical manifestations vary with age. Any symptoms typically occur 2-5 weeks after exposure. Fulminant disease and death are rare.

I am preventable by vaccination.

Influenza Vaccination for Pregnant Women

Safety of Influenza vaccination of pregnant women is well established and benefits both mother and infant.

The most effective strategy for preventing influenza in pregnant women is annual vaccination.



Influenza vaccination is recommended for all pregnant women regardless of gestation.

Active placental transfer of maternal antibodies makes influenza vaccination during pregnancy a highly effective measure to protect infants from influenza during the first 6 months of life.

For further information see:
www.immunise.health.gov.au

Pertussis Epidemic in WA

Pertussis (whooping cough) is a disease caused by infection of the throat with the bacteria *Bordetella pertussis*. It is generally believed to be significantly under-diagnosed, especially in adults.

WA is in the midst of a significant Pertussis epidemic which started mid 2011. This is thought to be attributable to: waning vaccine induced immunity; increased awareness of the disease; increasing and more sensitive testing; improved reporting and surveillance; and changes in the organism itself.

Symptoms: begins with a runny nose, tiredness and sometimes a mild fever, followed by a cough. The paroxysmal cough with inspiratory whoop seen in unvaccinated children is less common in older children and adults who have varying degrees of immunity from vaccination or infection. But even in adults, the cough can persist for up to 3 months.

Pertussis can be very serious in small children, particularly those under <6 months of age due to their small airways.

Transmission: *B. pertussis* is highly infectious, spreading by respiratory droplets from coughing or sneezing. Untreated, an infected person can spread it to other people for up to 21 days after onset of cough. The time between exposure and getting sick is usually 7—10 days, but can be up to 3 weeks.

Prevention: Immunisation greatly reduces the risk but reinfection can occur if immunity wanes. Booster vaccination is recommended for parents, grandparents and carers of newborns, healthcare and childcare workers and those who express an interest in being vaccinated.

Treatment: early intervention with an antibiotic such as azithromycin for 5 days, or erythromycin or clarithromycin for 7 days. Coughing may continue but the person is no longer infectious after the course of antibiotics. Hospitalisation for Pertussis occurs in approximately 50% of children <1 year of age, declining to almost nil in children >2 years of age.

For further information see:

- www.immunise.health.gov.au
- http://www.health.wa.gov.au/diseasewatch/vol16_issue1/Ongoing_pertussis_epidemic

Education Matters

Study Days

Western Australia

Infection Prevention Study Day Series (No. 2) for Residential Care June 2012 (Perth)

Infection Prevention Study Day Update for Residential Care August 2012 (Perth)

Infection Prevention Study Day for Community Care September 2012 (Perth)

Infection Prevention Study Day Series (No. 3) for Residential Care October 2012 (Perth)

South Australia

Infection Prevention Study Day Series (No. 2) for Residential Care July 2012 (Adelaide)

Infection Prevention Study Day Update for Residential Care July 2012 (Adelaide)

Infection Prevention Study Day for Residential Cleaning & Laundry Services Staff August 2012 (Adelaide)

Infection Prevention Study Day Series (No.3) for Residential Care November 2012 (Adelaide)

Infection Prevention & Control On-Site Education & Training 2012

Hands-On Infection Control offers a broad range of education and training programs in infection prevention and control. Programs can be tailored to suit the specific needs of individual organisations, specialities, environments and staff/volunteer groups.

These programs can be incorporated into existing induction/orientation, inservice, professional development and targeted programs for all categories of clinical, support and ancillary staff.

Education and training can be provided on or off site for your organisation using the latest technology and delivered by accredited trainers and assessors.

Hands-On Infection Control educational activities have been endorsed by APEC number 070523701 as authorised by Royal College of Nursing, *Australia* (RCNA) Life Long Learning Program (3LP).

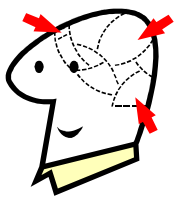
For details of any study days, to obtain registration forms, or discuss training needs contact us :

Hands-On Infection Control, PO Box 233, North Perth, WA 6906
Phone: 9227 1132 Facsimile: 08 9227 1134
Email: reception@handsoninfectioncontrol.com.au
Web: www.handsoninfectioncontrol.com.au

ROYAL COLLEGE of NURSING Australia

Brain Teaser—what am I? *Unscramble me using the clue:* *Answers Page 4*

1. YTIISTMOEOPLI - a vaccine preventable enteric virus eradicated from the Western Hemisphere
2. RAALMAI - disease caused by sporozoan parasites of the genus *Plasmodium*
3. MYVANNOCIC - a glycopeptide antibiotic that is active against Gram positive bacteria
4. SLBEELKILA - a lactose fermenting genus of enteric bacilli

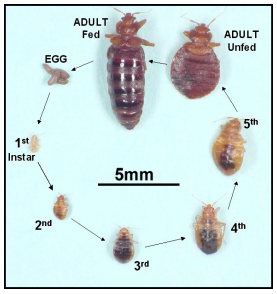


BED BUGS

Bed bugs were once a common public health pest worldwide, which declined in incidence through the mid 20th century. Recently however, bed bugs have undergone a dramatic resurgence and worldwide there are reports of increasing numbers of infestations. Australia has also been included in this trend and the Department of Medical Entomology, ICPMR, has been at the forefront of documenting this phenomena and providing information on the ecology and control of this important public health pest.

CHARCTERISTICS: Bed bugs are wingless insects, roughly oval in shape, 4-5mm long when fully grown, and are fast runners. They are rust brown in colour and change to a deeper red brown following a blood meal. Bed bugs are dorsoventrally flattened and being thin means that they can hide in narrow cracks and crevices, making detection often very difficult.

There are five juvenile stages known as nymphs, which are miniature versions of the adults in appearance. Each nymphal stage requires at least one blood meal to moult to the next stage and it takes 5-10 minutes for complete engorgement to occur. The entire nymphal development takes 6-8 weeks, while the adult bed bugs can live on average for 6-12 months. All nymphal stages and adults of both sexes require blood for nutrition and development.



After mating, each female lays 2-3 eggs a day throughout her lifespan.

DIAGNOSIS: A bed bug infestation can be diagnosed by the identification of specimens collected from the infected residence. Collection of live or dead bed bugs, cast skins, hatched or unhatched eggs will determine an infestation.

CLINICAL PRESENTATION: Skin reactions are commonly associated with bed bugs, which result from the saliva injected during feeding. The most commonly affected areas of the body are the arms and shoulders. Reactions to the bites may be delayed; up to 9 days before lesions appear. Common allergic reactions include the development of large wheals, often >1cm, which are accompanied by itching and inflammation. The wheals usually subside to red spots but can last for several days.

TREATMENT AND CONTROL: If bed bugs are suspected then a licensed pest controller should be consulted. The synthetic pyrethroids are often the main chemicals used for control in Australia, however these are not very effective and can even repel the bugs. The carbamates and the organophosphates are far more effective for control, but may not be recommended for use on mattresses (check the label). As bed bugs are cryptic in their habits, complete control is often difficult to achieve with the first treatment. This is especially so with heavy infestations and thus a post control treatment evaluation is always advisable.

More Information?
Please Contact: Department of Medical Entomology
Level 3, ICPMR, Westmead Hospital, WESTMEAD NSW 2145
www.medent.usyd.edu.au

AUSTRALASIAN COLLEGE FOR INFECTION PREVENTION AND CONTROL (ACIPC)

Current State and Territory (S&T) associations are transitioning into the new college (ACIPC). From 1 July 2012 S&T memberships will be renewed with ACIPC. The current AICA website will continue until the ACIPC website is ready to be launched. The new website will have a raft of new features including the option of on-line payments for membership and registrations, modifications and updates of personal and key information, members only sections. Contact details for the ACIPC:
Phone: 07 3211 4695 Facsimile: 07 3211 4900 Email: admin@acipc.org.au

Answers:

What am I? (page 2)

Hepatitis A Virus

Brain Teasers: (page 3)

1. *Poliomyelitis*
2. *Malaria*
3. *Vancomycin*

ACIPC ANNUAL CONFERENCE

Sydney 8-10 October 2012

http://www.acipcconference .com.au