



# Communicable Disease Update

January, 2006



## Pertussis Update

### TDAP RECOMMENDED FOR ADULTS

The Advisory Council on Immunization Practices (ACIP) voted to recommend Tdap to replace the next dose of Td for adults ages 19 – 64 years. In Madison and Dane County, 33% of pertussis cases reported in 2005 were in this age group. This recommendation includes vaccinating adults with a history of pertussis and using Tdap in place of Td for tetanus prophylaxis in wound management.

### VACCINATING ADULTS TO PREVENT PERTUSSIS IN INFANTS

ACIP also recommends that all adults who have close contact with infants younger than twelve months of age receive Tdap in order to prevent pertussis in infants. Five percent of pertussis cases reported in Madison and Dane County in 2005 were in children less than twelve months of age. Women who might become pregnant should receive Tdap before becoming pregnant if possible. If a pregnant woman has not received Tdap, she should be vaccinated in the immediate post-partum period. Tdap is not recommended during pregnancy. If a pregnant woman is overdue for a tetanus booster, she should be vaccinated with Td during pregnancy.

See [http://www.cdc.gov/nip/vaccine/tdap/tdap\\_adult\\_recs.pdf](http://www.cdc.gov/nip/vaccine/tdap/tdap_adult_recs.pdf) for complete details of ACIP's recommendations.

### NEW PERTUSSIS TREATMENT RECOMMENDATIONS FROM CDC

The Centers for Disease Control and Prevention (CDC) has expanded its treatment recommendations for pertussis to include azithromycin and clarithromycin in addition to erythromycin. Previous guidelines from the Wisconsin Division of Public Health have recommended these same antimicrobials, but CDC's doses are slightly different, including recommending azithromycin in a Z-Pak dosage. The same drugs and dosages recommended for treatment of pertussis should also be used for postexposure prophylaxis. See Table 1. Recommended antimicrobial treatment and postexposure prophylaxis for pertussis, by age group, which has been reproduced from Recommended Antimicrobial Agents for Treatment and Postexposure Prophylaxis of Pertussis: 2005 CDC Guidelines.

Centers for Disease Control and Prevention. Recommended antimicrobial agents for the treatment and postexposure prophylaxis of pertussis: 2005 CDC guidelines. MMWR 2005;54(No. RR-14).

## ACD Summary for October-December 2005 DANE COUNTY DIVISION OF PUBLIC HEALTH & MADISON DEPARTMENT OF PUBLIC HEALTH

Below is a preliminary listing of the acute and communicable diseases (ACD) reported to MDPH and DCDPH during October – December, 2005. Data are based on ACD reports received by both agencies. These numbers are not a complete picture of ACDs in Dane County; some reports are sent directly to Wisconsin DHFS and are not in our databases, some infections may not have been reported yet, and many are never reported.

### SEXUALLY TRANSMITTED INFECTIONS

	NUMBER OF CASES					
	Madison		Dane Co. (Excluding Madison)		Dane County Total	
	2005	2004	2005	2004	2005	2004
Chlamydia	293	247	129	124	422	371
Gonorrhea	70	80	34	27	104	107
Herpes	42	30	26	30	68	60
<b>Total</b>	<b>405</b>	<b>357</b>	<b>189</b>	<b>181</b>	<b>594</b>	<b>538</b>

### OTHER REPORTABLE COMMUNICABLE DISEASES

Arbovirus	1	0	0	0	1	0
Campylobacter	8	14	10	9	18	23
Cryptosporidium	6	5	8	6	14	11
<i>E. coli</i> , enterohemorrhagic	1	0	0	0	1	0
<i>E. coli</i> O157:H7	3	0	3	1	6	1
Ehrlichiosis	0	0	1	1	1	1
Encephalitis, viral	1	0	0	1	1	1
<i>Giardia</i>	12	15	18	9	30	24
<i>Haemophilus influenzae</i> invasive disease	1	2	1	0	2	2
Hepatitis A	2	0	3	0	5	0
Hepatitis B	9	12	4	1	13	13
Hepatitis C	21	31	13	13	34	44
Kawasaki Disease	0	0	1	0	1	0
<i>Legionella</i>	1	0	0	1	1	1
Lyme Disease	2	1	3	2	5	3
Malaria	0	0	1	0	1	0
Meningitis, bacterial	0	0	1	1	1	1
Meningitis, viral	6	6	5	5	11	11
Mumps	1	0	0	0	1	0
<i>Mycobacterium</i> , non-tuberculous	0	3	2	3	2	6
Pertussis (confirmed & probable)	12	280	43	187	55	467
<i>Salmonella</i>	5	11	13	4	18	15
<i>Shigella</i>	1	2	1	0	2	2
<i>Streptococcus</i> Group B invasive disease	2	0	3	1	5	1
<i>Streptococcus pneumoniae</i> invasive disease	5	2	0	2	5	4
Tuberculosis	3	1	1	0	4	1
Yersiniosis	1	0	0	0	1	0
<b>Total</b>	<b>104</b>	<b>386</b>	<b>135</b>	<b>249</b>	<b>239</b>	<b>635</b>

**TABLE 1. RECOMMENDED ANTIMICROBIAL TREATMENT AND POSTEXPOSURE PROPHYLAXIS FOR PERTUSSIS, BY AGE GROUP**

Age group	Primary agents			Alternate agent*
	Azithromycin	Erythromycin	Clarithromycin	TMP-SMZ
<1 month	Recommended agent. 10 mg/kg per day in a single dose for 5 days (only limited safety data available)	Not preferred. Erythromycin is associated with infantile hypertrophic pyloric stenosis. Use if azithromycin is unavailable; 40-50 mg/kg per day in 4 divided doses for 14 days	Not recommended (safety data unavailable)	Contraindicated for infants aged <2 months (risk for kernicterus)
1-5 months	10 mg/kg per day in a single dose for 5 days	40-50 mg/kg per day in 4 divided doses for 14 days	15 mg/kg per day in 2 divided doses for 7 days	Contraindicated at age <2 months. For infants aged ≥2 months, TMP 8 mg/kg per day, SMZ 40 mg/kg per day in 2 divided doses for 14 days
Infants (aged ≥ 6 months) and children	10 mg/kg in a single dose on day 1 then 5 mg/kg per day (maximum: 500mg) on days 2-5	40-50 mg/kg per day (maximum: 2 g per day) in 4 divided doses for 14 days	15 mg/kg per day in 2 divided doses (maximum: 1 g per day) for 7 days	TMP 8 mg/kg per day, SMZ 40 mg/kg per day in 2 divided doses for 14 days
Adults	500 mg in a single dose on day 1 then 250 mg per day on days 2-5	2 g per day in 4 divided doses for 14 days	1 g per day in 2 divided doses for 7 days	TMP 320 mg per day, SMZ 1,600 mg per day in 2 divided doses for 14 days

\*Trimethoprim sulfamethoxazole (TMP-SMZ) can be used as an alternative agent to macrolides in patients aged ≥2 months who are allergic to macrolides, who cannot tolerate macrolides, or who are infected with a rare macrolide-resistant strain of *Bordetella pertussis*.

