



Active Bacterial Core Surveillance (ABCs) Report

Emerging Infections Program Network

Neisseria meningitidis, 2006



ABCs Areas

California (3 county San Francisco Bay area); Colorado (5 county Denver area); Connecticut; Georgia; Maryland; Minnesota; New Mexico; New York (15 county Rochester and Albany areas); Oregon; Tennessee (11 urban counties)

ABCs Population

The surveillance areas represent 39,979,545 persons. Source: National Center for Health Statistics bridged-race vintage 2006 postcensal file

ABCs Case Definition

Invasive meningococcal disease: isolation of *Neisseria meningitidis* from normally sterile site in a resident of a surveillance area in 2006.

ABCs Methodology

ABCs personnel routinely contacted all microbiology laboratories serving acute care hospitals in their area to identify cases. Standardized case report forms that include information on demographic characteristics, clinical syndrome, and outcome of illness were completed for each identified case. Serogrouping of meningococcal isolates was done at CDC. Regular laboratory audits assessed completeness of active surveillance and detected additional cases.

All rates of invasive meningococcal disease were calculated using population estimates for 2006. For national estimates of cases, race- and age-specific rates of disease were applied from the aggregate surveillance area to the age and racial distribution of the 2006 U.S. population for 49 states (excluding Oregon due to an outbreak of serogroup B disease). The Oregon reported cases were then added to obtain the national estimates. Cases with unknown race were distributed by area based on reported race distribution for known cases within the eight age categories.

Reported ABCs Profiles

| Race | No. | (Rate [*]) |
|-------|-----|----------------------|
| White | 111 | (0.36) |
| Black | 28 | (0.41) |
| Other | 6 | (0.24) |
| Total | 145 | (0.36) |

Unknown race (n=19) distributed amongst known

* Cases per 100,000 population for ABCs areas

| Syndrome | Cases | | Deaths | |
|--------------------------|-------|-------------------|--------|----------------------|
| | No. | (% [*]) | No. | (Rate [†]) |
| Meningitis | 67 | (46.2) | 12 | (17.9) |
| Bacteremia without focus | 55 | (37.9) | 3 | (5.6) |

* Percent of cases

† Deaths per 100 cases with known outcomes

Serogroups

| Age (years) | B | C | Y | Other [‡] |
|--------------------|--------------------------|--------------------------|--------------------------|--------------------------|
| | No. (Rate [*]) | No. (Rate [*]) | No. (Rate [*]) | No. (Rate [*]) |
| < 1 | 13 (2.6) | 0 (0.0) | 3 (0.61) | 0 (0.0) |
| 1 | 0 (0.0) | 0 (0.0) | 0 (0.0) | 1 (0.2) |
| 2-4 | 2 (0.13) | 0 (0.0) | 0 (0.0) | 1 (0.07) |
| 5-17 | 1 (0.02) | 8 (0.12) | 7 (0.11) | 0 (0.0) |
| 18-34 | 8 (0.09) | 11 (0.13) | 7 (0.08) | 0 (0.0) |
| 35-49 | 3 (0.04) | 8 (0.10) | 2 (0.02) | 0 (0.0) |
| 50-64 | 1 (0.02) | 2 (0.03) | 10 (0.16) | 1 (0.02) |
| ≥ 65 | 2 (0.05) | 0 (0.00) | 13 (0.32) | 4 (0.09) |
| Total [†] | 30 (0.08) | 29 (0.08) | 42 (0.12) | 7 (0.02) |

Unknown serogroup (n=6) distributed amongst known

* Cases per 100,000 population for ABCs areas excluding Oregon

† All rates exclude Oregon; Rates including Oregon are serogroup B 0.11, serogroup C 0.09, serogroup Y 0.14, and serogroup Other 0.04 cases per 100,000 population for ABCs areas

‡ Other includes serogroup W-135 and non-groupables

Rates of Meningococcal Disease in Adolescents and Young Adults[†]

| Age (years) | Overall Serogroups | C/Y/W-135 Serogroups |
|-------------|--------------------------|--------------------------|
| | No. (Rate [*]) | No. (Rate [*]) |
| 11-17 | 14 (0.39) | 13 (0.37) |
| 18-22 | 13 (0.52) | 6 (0.24) |

* Cases per 100,000 population for ABCs areas excluding Oregon

† All rates exclude Oregon; Rates including Oregon are, for 11-17 year olds, overall serogroups 0.38 and serogroup C/Y/W-135 0.33, for 18-22 year olds, overall serogroups 0.73 and serogroup C/Y/W-135 0.40 cases per 100,000 population for ABCs areas

National Estimates for Invasive Disease

Cases: 900 (0.30/100,000)

Deaths: 125 (0.04/100,000)

Healthy People 2010 Update

Objective: Reduce the incidence of invasive meningococcal disease to 1.0 per 100,000 population.

| 2010 Objective | 2006 Rate [*] |
|----------------|------------------------|
| 1.0/100,000 | 0.30/100,000 |

* Cases per 100,000 U.S. population

For more information, visit our web site:

<http://www.cdc.gov/abcs>

Citation

Centers for Disease Control and Prevention. 2007. Active Bacterial Core Surveillance Report, Emerging Infections Program Network, *Neisseria meningitidis*, 2006.

Available via the Internet:

<http://www.cdc.gov/abcs/reports-findings/survreports/mening06.pdf>

