Meningococcal disease

Reported cases of invasive meningococcal infections, including sepsis and meningitis, have declined from the hyperendemic levels seen in 1993–1997 attributable to a clonal strain of serogroup B *Neisseria meningitidis*. Respiratory secretions and droplets continue to be shared among Oregonians and predispose us to secondary cases.

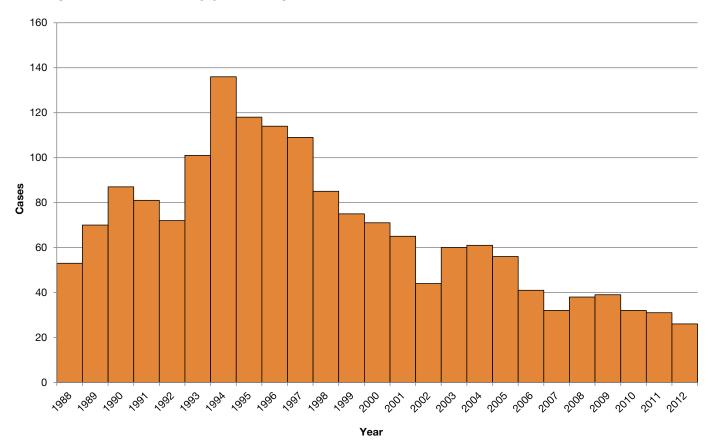
In 2012, there were 26 reported cases, and four deaths from meningococcal disease in Oregon. This continues the overall decline in cases throughout the state. A plurality (46%) of illness in Oregon was caused by serogroup B organisms, followed by serogroups Y (25%)

and C (21%). At least since the early 1990s, serogroup B has predominated in Oregon.

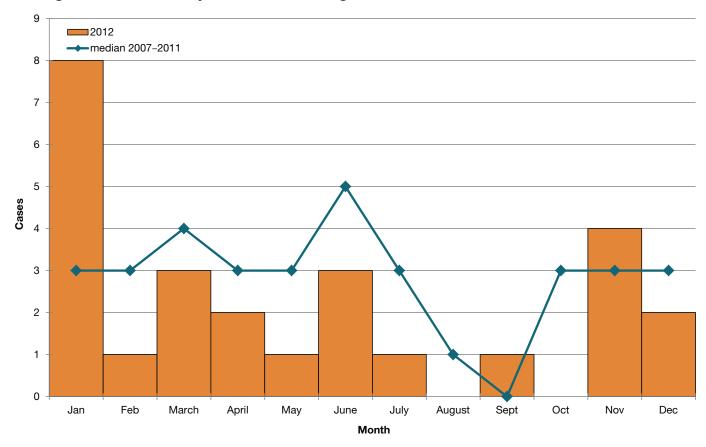
The burden of meningococcal disease was highest in those 10–19 years of age (1.0/100,000), with a second, lower peak in incidence in children <5 years of age (0.8/100,000). Meningococcal disease is treated with intravenous antibiotics.

The quadrivalent (serogroups A, C, Y and W-135) meningococcal conjugate vaccine is recommended routinely for adolescents 11–18 years of age and for other persons at high risk for meningococcal disease. The vaccine does not protect against serogroup B disease.

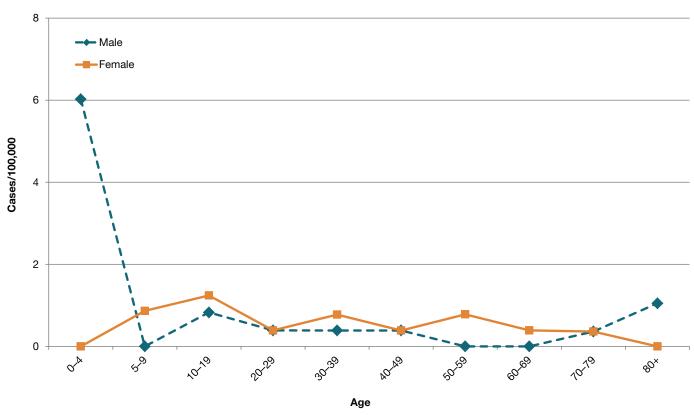
Meningococcal disease by year: Oregon, 1988-2012



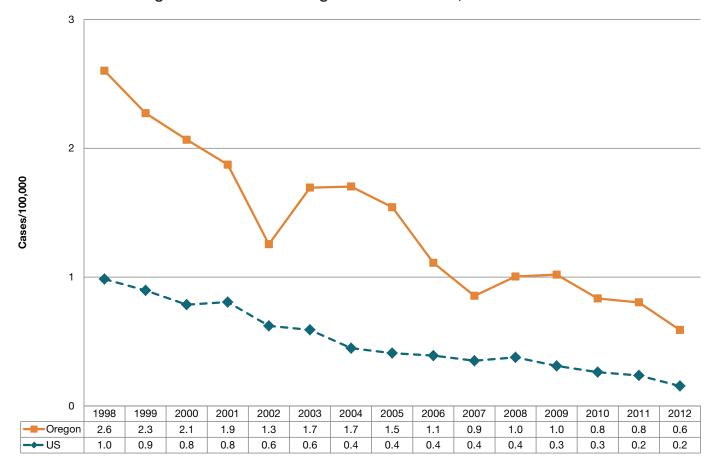
Meningococcal disease by onset month: Oregon, 2012



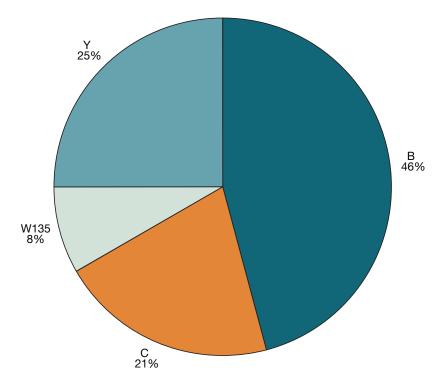
Incidence of meningococcal disease by age and sex: Oregon, 2012



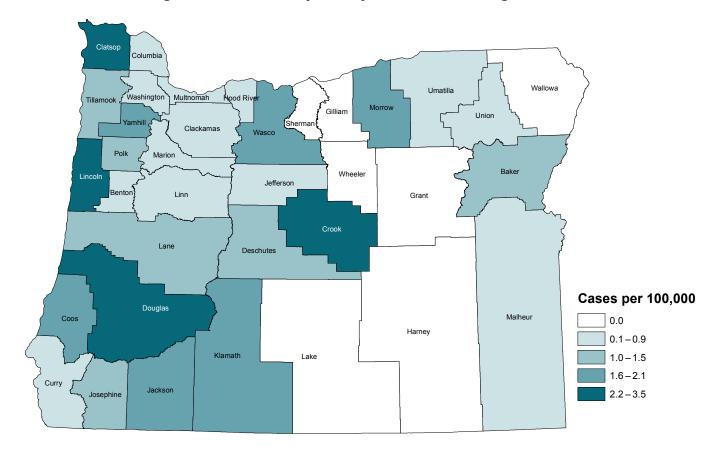
Incidence of meningococcal disease: Oregon vs. nationwide, 1998–2012



Meningococcal disease by serogroup: Oregon, 2012



Incidence of meningococcal disease by county of residence: Oregon, 2003-2012



Prevention

- Vaccinate to prevent illness from serogroups A, C, Y and W-135.
- Identify and recommend prophylaxis of close contacts of confirmed and presumptive cases.
- Avoid smoking and exposing children to tobacco smoke, which have been associated with an increased risk of invasive meningococcal disease.