Clark County Board of Health

Foundational Public Health

Pertussis (Whooping Cough)

October 26, 2016

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Agenda

- What is Pertussis?
- What does Public Health do?
  - Surveillance
  - Case investigation
  - Contact Management
  - Outreach
    - Clinics
    - Schools
  - Communication
  - Surge Capacity
What is Pertussis?

• Also called Whooping Cough
• A vaccine preventable, bacterial disease
• Produces a toxin that paralyses the cilia in the lungs
• Lungs cannot protect themselves

[VIDEO]
Characteristics of Pertussis?

- Cough is severe and prolonged - 100 day cough
- Results in post-tussive vomiting
- Characterized by whoop
- In infants can result in apnea → pneumonia → possibly death
- Treatable with antibiotics, does not eliminate toxin
What does Public Health do?

1. Surveillance

- **Surveillance** = Monitoring and Tracking
  - Identify:
    - Outbreaks
    - Who is affected (person)
    - What geographic areas are affected (place)
    - When illnesses are occurring (time)
  - Helps inform response
  - Required by law (WAC 246-101-501)
What does Public Health do?

1. Surveillance (Outbreaks)

Clark County Pertussis Cases Reported by Month and Year with Projected Baseline and Upper Limit Thresholds, 2012–2015 and 2016 (through October 20)

Epidemic periods (2012 and 2015) monthly values were not used to project the baseline and upper limit thresholds

*Includes Confirmed, Probable, and Suspect Classifications
What does Public Health do?

2. Case Investigation

- Collect lab information
- Phone interview with case
  - Where they may have gotten pertussis
  - How to prevent spread
  - Ensure receipt of antibiotics
  - Check for others who may be sick
  - At least 15 minutes on the phone
What does Public Health do?

3. Contact Management

- Identify contacts of the case, focus on:
  - Household
  - Childcare
  - Healthcare
- Provide antibiotics to contacts to prevent illness – post-exposure prophylaxis (PEP)
- Sometimes there can be many contacts (20+)
What does Public Health do?

4. Outreach - Clinics

- Meet with clinics and their providers to provide education and ask that they “Think Pertussis”
- Can have pertussis even if vaccinated
- Interpreting the tests correctly
- Treating the patient and close contacts
- Notifying the health department promptly
- Vaccinating infants and pregnant women
What does Public Health do?

4. Outreach - Schools

- Developed a toolkit for school nurses including a quick reference tool
- Early notification from the school nurse of cough illness

Toolkit on website
What does Public Health do?

5. Communication

• **Surveillance Reports**
• **Provider Advisories**
  – Emails to healthcare providers
  – Notification about increases in disease
  – Recommendations for testing
  – Recommendations for treatment
• **Notification Letters**
  – Schools and daycares where cases have been
Surge Capacity

• Starting to see outbreaks every 3-5 years
• Outbreaks are very labor intensive
  – Hundreds of cases
  – Hundreds of contacts
• Need to be able to escalate response
Highlights

- Pertussis is a reportable condition
- Pertussis can be a severe illness
- Outbreaks may be cyclical
- Case investigations and contact management are labor intensive services
- We need continued support to respond to pertussis in the community and during outbreaks
Questions?