Influenza Outbreak Recognition, Management, and Reporting in Long-Term Care Facilities

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OBJECTIVES

Describe current burden of flu in Washington State

Discuss outbreak detection in long-term care

Review isolation and cohorting for influenza in long-term care

Demonstrate how to report to local public health
Symptoms of Influenza (Flu)

- Headache
- Runny or stuffy nose
- Sore throat
- Aches
- Coughing
- Vomiting (in kids)
- (Extreme) tiredness
- Aches
- Fever (usually high)

Where have flu outbreaks* in Long-term care been reported?

108 Outbreaks for 2016/17

*Data reported to Department of Health as of 1/17/17
*This map indicates geographic spread and does not measure the severity of influenza activity.*
Washington State: Influenza Positive Tests Reported to CDC

Source: http://www.doh.wa.gov/Portals/1/Documents/5100/420-100-FluUpdate.pdf
Washington State:
% of Influenza-Like Illness (ILI) Visits Reported by Sentinel Providers
Case Study

88 year old alert oriented female
Semi-private room

Shortness of breath + Fever 100 F

Chest x-ray - diagnosis Community Acquired Pneumonia

Started on Antibiotics
Case Study

Next day, symptoms have NOT improved

Now...

• Complaining of headache
• Develops Cough
• MD orders Rapid Influenza Diagnostic Test (RIDT)
• Nurse collects specimen and calls lab
Case Study

6 hours later the results come in…

Other Considerations…

- 60 bed facility, 58 occupied
- Private rooms located on another floor
- No other cases of ILI
- High vaccine coverage

• Positive Influenza A
• Tamiflu initiated
What's next?
Case Study - Pros and Cons

Critical Thinking Skills are KEY

• Move the resident to a **private room** on the second floor?

• Should she remain in her **semi-private room**?
Case Study - *What Happened?*

- Asked resident permission to *share diagnosis* with roommate
- Discussed situation with roommate who *consented* to allowing the resident with influenza to remain in the room
- Resident *remained in her room* with her roommate (78 year-old female)
- Both were placed on *droplet precautions*
- Roommate treated with *chemoprophylaxis (Tamiflu)*
Case Study - What Else?

- Facility on alert for ILI for 7 days
- Dining room closed
- Social activities limited
- Signage posted

**Reviewed vaccination status of staff**
- Contacted the 8% unvaccinated staff and offered the vaccine
- If declined, would have to wear a mask for the rest of the season
Droplet Precautions should be implemented for residents with suspected or confirmed influenza for:

- 7 days after illness onset
- Until 24 hours after the resolution of fever and respiratory symptoms, whichever is longer
Flu is caused by influenza virus. Types A and B infect humans.

**Symptoms**
Sudden onset of fever (≥38°C) • cough and/or other respiratory symptoms (eg. shortness of breath) and systemic symptoms (fatigue, muscle soreness, headache).

**Note symptoms in the elderly may be atypical:**
- Fever may be absent
- Patients may present with anorexia, mental status changes

**Complications**
Pneumonia and worsening respiratory status in patients with underlying chronic obstructive lung disease and congestive heart failure

**Transmission**
Large respiratory droplets and by direct contact with droplets, followed by touching nose/mouth

**Infectiousness**
Begins 24 hours prior to onset of illness. May shed virus for five or more days after symptom onset

**Incubation Period**
1 to 4 days
What is an Outbreak?

Detecting and Reporting Outbreaks

Long term care facilities are required to report all suspected and confirmed outbreaks to their local health jurisdiction (LHJ) per Washington Administrative Code (WAC) 246-101-305. LTCFs are required to report the following:

- A sudden increase in acute febrile respiratory illness* over the normal background rate (e.g., 2 or more cases of acute respiratory illness occurring within 72 hours of each other) OR
- Any resident who tests positive for influenza.

*Acute febrile respiratory illness is defined as fever $\geq 100^\circ$F AND one or more respiratory symptoms (runny nose, sore throat, laryngitis, or cough). However, please note that elderly patients with influenza may not develop a fever.
Influenza-like Illness Outbreaks

**Definition:** A sudden increase in acute febrile respiratory illness over the normal background rate in an institutional setting or when any resident of a long term care facility (LTCF) tests positive for influenza.

**Reporting form:** Influenza-Like Illness Outbreak Reporting Form

**Comments:** LHJs should notify CDE of ILI outbreaks in institutional settings (excluding schools) using the above form or an equivalent form. Submission of a final outbreak report is not required unless there are circumstances of public health concern (e.g., significant morbidity or mortality) which require investigative activities beyond implementation of infection control measures.
**Fax completed forms to DOH Communicable Disease Epi**
Fax: 206-418-5515

**Date of initial notification to DOH:**
**Date report sent to DOH:**
**Form Status:**
- Preliminary report
- Final report

**LHJ Cluster #:**
**LHJ Cluster Name:**
**DOH outbreak #:**

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### LOCAL HEALTH JURISDICTION (LHJ)
- [ ] Local health jurisdiction (LHJ)
- [ ] Contact person

### INITIAL LHJ NOTIFICATION DATE & TIME
- [ ] Initial LHJ notification date & time
- [ ] am/pm

### INVESTIGATION START DATE & TIME
- [ ] Investigation start date & time
- [ ] am/pm

### INVESTIGATION COMPLETION DATE
- [ ] Investigation completion date

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### SYMPTOMS: (CHECK ALL THAT APPLY)
- [ ] Fever $>100^\circ$ F
- [ ] Chills
- [ ] Cough
- [ ] Sore throat
- [ ] Myalgia
- [ ] Headache
- [ ] Other

### CASE INFORMATION
- [ ] Total # symptomatic residents
- [ ] Total # residents in facility
- [ ] Resident attack rate (ill / total)
- [ ] Total # symptomatic staff
- [ ] Total # staff in facility
- [ ] Staff attack rate (ill / total)
- [ ] # ill staff providing direct patient care
- [ ] Date first case became ill
- [ ] Date last case became ill

### LABORATORY, HOSPITALIZATIONS, DEATHS
- [ ] Any flu testing?
- [ ] Any hospitalization?
- [ ] Any death?

### ANY FLU TESTING?
- [ ] Yes
- [ ] No

### ANY HOSPITALIZATION?
- [ ] Yes
- [ ] No

### ANY DEATH?
- [ ] Yes
- [ ] No

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### INFLUENZA VACCINATION INFORMATION
- [ ] Estimated % residents vaccinated
- [ ] Estimated % staff vaccinated

### PNEUMOCOCCAL VACCINATION INFORMATION
- [ ] Estimated % residents vaccinated

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### INVESTIGATION METHODS (CHECK ALL THAT APPLY)
- [ ] Interviews with infection control/management
- [ ] Site visit (e.g., outbreak in an institution)
- [ ] Interviews only of ill persons

### PUBLIC HEALTH ACTIONS TAKEN (CHECK ALL THAT APPLY)
- [ ] Discussed "Checklist for Controlling Influenza in LTCF"
- [ ] Reflected written material to LTCF administrator (Line List, Checklist, CDC guidance)
- [ ] Recommended PEP
- [ ] Implemented PEP
- [ ] Other

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**DISCUSSION / CONCLUSION / NOTES**
When is an Outbreak OVER?

Initiate **active daily surveillance** for influenza-like illness (ILI) among residents and staff until....

1 week after last onset of illness
# Case Tracking is Key

## Line List for Outbreaks in Long Term Care Facilities

Please list all residents and employees ill with respiratory symptoms. Designate employees with an *.

<table>
<thead>
<tr>
<th>Name</th>
<th>Age</th>
<th>Unit Or Room</th>
<th>Onset Date</th>
<th>Symptoms</th>
<th>Flu Specimen Collection Date</th>
<th>Lab Result/Type Test</th>
<th>Flu Vaccine (Y/N/Date)</th>
<th>Hospitalized (Y/N)</th>
<th>Died (Y/N)</th>
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Reporting to the Department of Social and Health Services (DSHS)

- Call DSHS 1-800-562-6078

- The DSHS/RCS response should only be to assure the facility is following their infection control policy and procedures, and they are following good infection control practices to minimize the impact of the outbreak and the number of clients who become ill.
Long term care facilities are required to report all suspected and confirmed outbreaks to their local health jurisdiction (LHJ) per Washington Administrative Code (WAC) 246-101-305.

http://www.doh.wa.gov/AboutUs/PublicHealthSystem/LocalHealthJurisdictions
Experts on the Line

Amy Abbott
DSHS - Licensed Social Worker,
Policy Unit Manager, Residential Care Services

Laura Stengel NHA
Manor Care Lacey
QUESTIONS

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THANK YOU!