(H3N2)v Influenza Talking Points and FAQ

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Four cases of Influenza A H3N2v or Variant H3N2 have been reported in individuals who attended an Indiana County Fair. County Health Officials say all four individuals visited the fair prior to becoming ill and two had contact with swine. The State Board of Animal Health reported 13 pigs tested positive for the virus. The Center for Disease Control (CDC) reported last year there were 309 human cases of H3N2v.

State health officials will monitor the situation and work with fair officials to take necessary precautions. There appears little cause for concern in attending fairs but fairgoers should be reminded to take precautions to protect themselves and the animals.

Q: What is Influenza?
A: A highly contagious respiratory illness caused by the influenza virus. There are several types, subtypes and strains of influenza virus that affects several species of animals including humans.

Q: What is swine influenza?
A: Swine Influenza (swine flu) is a respiratory disease of pigs caused by type “A” influenza virus. Like human influenza viruses there are different subtypes and strains of swine flu viruses. Among the influenza types, only type A is known to infect pigs. These viruses do not usually infect people and are genetically different from the H1N1 and H3N2 influenza viruses that commonly circulate in humans.

Q: How can I catch the “flu” from pigs?
A: Like influenza viruses in humans and other animals, the influenza virus in pigs constantly changes to protect itself from host immunity. Pigs can be infected by avian influenza, human influenza, and swine influenza. When influenza viruses from different species infect pigs, the viruses can swap genes (i.e. reassert) and new “variant” viruses that are a mix of swine, human, and/or avian influenza viruses can emerge. These variant viruses can sometimes move from pigs to humans and vice versa.

Q: Will my seasonal flu shot protect me against the (H3N2)v Virus?
A: No. Since the viruses are different, humans will have little to no protection against the (H3N2)v virus.

Q: How would I know if I had (H3N2)v Virus?
A: Symptoms are very similar to seasonal flu and may include but are not limited to: fever, cough, sore throat, runny nose, muscle aches, headache, and/or fatigue. Some complications may include but are not limited to pneumonia, secondary infections, or the worsening of underlying illness. (H3N2)v influenza could be suspected if you exhibit these symptoms after recently being in close contact with pigs.
Q: Who is most at risk?
A: The most at risk populations include:
- The very young – less than 5 years old
- Persons 65 years of age or older
- Persons with compromised immune systems
- Pregnant women
- Persons with certain medical conditions (i.e. asthma, heart disease, diabetes, and neurological or neurodevelopmental conditions, etc.).
- Note: This virus is related to human flu viruses from the 1990s, adults may have some immunity against these viruses, but young children probably do not.

Q: Where would I be exposed to the (H3N2)v Virus?
A: Livestock fairs, live markets, petting zoos, and farms. At this time there is no documented human to human spread; but all influenza viruses have the capacity to change. The main route of transmission is from swine to humans in close contact.

Q: What can I do to prevent getting the (H3N2)v Virus?
A:
- Frequently wash hands with soap and running water before and after exposure to animals. If not available, an alcohol-based hand rub may be used
- Never eat, drink, smoke, or put things in your mouth while in animal areas
- Do not take food or drink into animal areas
- Do not carry toys, pacifiers, spill-proof cups, baby bottles, strollers, or similar items into areas with pigs
- Children should be watched closely to discourage hand-to-mouth activities (i.e. nail biting, thumb sucking, etc.), contact with manure, and contact with soiled bedding
- Limit stroller and/or wheelchair use in animal areas
- Avoid close contact with animals that look or act ill
- Cover your nose and mouth with a tissue when you cough or sneeze and throw away the tissue
- Avoid touching eyes, nose, or mouth
- Wash clothes when you get home

Q: What should I do if I or a family member gets sick after attending a fair?
A:
- Tell your doctor you have had contact with swine
- Protect other animals and humans by limiting contact
- Practice good respiratory and hand hygiene – cover your mouth and nose when coughing/sneezing and wash hands after coughing/sneezing

Q: Is pork safe for human consumption?
A: Yes! Influenza is not transmitted as a food borne illness, it is a respiratory disease. Remember all food, including pork or products derived from pigs, should be handled and prepared correctly prior to consuming.
Q: How common is influenza among pigs?
A: H1N1 and H3N2 swine flu viruses are endemic in pig populations and the swine industry deals with them regularly. Outbreaks in swine herds usually occur in colder winter months, but can occur year round. The H1N1 swine virus has been known to circulate among pig populations since at least 1930; H3N2 influenza viruses did not start circulating among pigs in the U.S. until about 1998 and were introduced into pig populations by humans. Since viruses continue to change and evolve, the H3N2 virus circulating in pigs is very different than the seasonal H3N2 viruses that circulate in humans.

Q: How do pigs get the influenza?
A: It can be spread through close contact and from contaminated objects moving between infected and uninfected pigs. In addition, they can get viruses from people or birds. The cross-species spread and possible mixing of flu viruses can lead to new and different viruses that might gain the ability to spread easily between people. The swine flu virus can circulate among swine throughout the year, but most outbreaks typically occur during the late fall and winter months, similar to outbreaks in humans.

Q: Can influenza virus infections be prevented in pigs?
A: It is possible to limit the risk of infection in pigs and/or the severity of the disease with these management strategies:

- Vaccinating herds
- Using good biosecurity measures
- Practicing good hygiene
- Ensuring pig caretakers are vaccinated with the seasonal influenza vaccine
- Using proper ventilation systems

Q: Can pigs get a flu vaccine?
A: Yes, they can help but are not 100% effective due to the virus circulating or antibodies in young pigs from their mothers. Pigs that have been vaccinated for swine influenza can still get sick from some swine influenza viruses.

Resources and more information can be found at:

- http://www.cdc.gov/flu/swineflu/
- http://www.cdc.gov/flu/swineflu/h3n2v-factsheet.htm
- Korslund, J. (2012, August). Presentation. USDA SIV surveillance program and swine exhibitions