Health Care Provider Advisory
Mumps Virus Infections: Guidance for Laboratory Testing and Updated Vaccination Recommendations
December 11, 2017

Since January 2017, 56 cases of mumps infection have been reported in Florida. This is significantly higher than the previous five-year average of six cases during the same timeframe. Mumps cases have occurred across all ages (median 25 years, range 0-83 years). Infections have been detected across Florida, with the most cases reported in Broward, Collier, Duval, Hillsborough, and Palm Beach counties. Preliminary data indicate that among the cases, 50 percent have documented history of MMR vaccination (typically remote). Small mumps outbreaks have been investigated among household and other close contacts, and among a group of high-school students and their contacts.

Clinical Description
- Prodrome: low-grade fever (three to four days), myalgia, anorexia, malaise, and headache
- Parotitis: pain, tenderness, and swelling in one or both parotid salivary glands
- Mumps infection may also present only with nonspecific or primarily respiratory symptoms, or may be asymptomatic

Laboratory Testing
The early collection of buccal swab specimens for polymerase chain reaction (PCR) provides the best means of laboratory confirmation, particularly among suspected mumps patients with a history of vaccination. If you suspect mumps infection, collect:
- Buccal or oral swab using a synthetic swab, placed in viral transport media (VTM) for PCR
- Serum for mumps IgM and IgG
The buccal swab for PCR or culture should be collected as soon as possible after onset of parotitis, ideally within three days. Mumps PCR, culture, or serologic tests are available at many commercial laboratories.

Transmission
Mumps is transmitted by close contact with infected persons. Infected persons are contagious from two days prior to and five days after onset of parotitis and should be isolated from others during this time.

Vaccination Recommendations
CDC recommends children get two doses of MMR vaccine, starting with the first dose at 12 through 15 months of age, and the second dose at 4 through 6 years of age. Teens and adults should also be up to date on their MMR vaccination. In October, the Advisory Committee on Immunization Practices recommended a third dose of mumps-containing vaccine for persons who are identified by health department staff as at increased risk for mumps during an outbreak to reduce the risk of infection and complications. The Florida Department of Health will notify health care providers if outbreaks occur that would indicate a third dose of mumps-containing vaccine for specific at-risk persons or groups.

Disease Reporting
Mumps is a reportable disease and health care providers should immediately report all cases to their county health department to ensure a prompt public health investigation and response to prevent disease outbreaks. County health department contact information: www.floridahealth.gov/CHDEpiContact
Florida disease reporting information: www.floridahealth.gov/DiseaseReporting

Additional Resources
CDC – Mumps Lab Testing Question and Answer: www.cdc.gov/mumps/lab/qa-lab-test-infect.html
CDC – Mumps IgM Serology Question and Answer: www.cdc.gov/mumps/lab/overview-serology.html