Prioritizing Case Investigations and Contact Tracing for COVID-19 in Missouri

Introduction
The United States is currently experiencing an extreme wave of COVID-19 infections, with the highest rate of case growth since the beginning of the pandemic. Every state is affected and every community is at risk. DHSS is committed to a data-driven and practical approach to managing Missouri’s response to the COVID-19 pandemic, and will continue to partner with Local Public Health Authorities (LPHAs) to contend with the current conditions, utilizing all available tools to mitigate disease spread.

Critical public health tools include limiting the attendance of public and private gatherings, encouraging the use of masks and face coverings in public, at work, and at private gatherings, encouraging physical distancing of at least six feet, encouraging regular hand-washing and hand-sanitizing, employing contact tracing and case investigation, and promoting flu and future COVID-19 vaccinations.

DHSS is committed to contact tracing and case investigation as a crucial component of a robust public health response, but also acknowledges that other interventions may be more important when community transmission is uncontrolled.

Current levels of disease spread in Missouri require a re-alignment of public health resources to ensure the safety of those citizens most at-risk for serious complications from COVID-19 infections. However, it is also vital that public health agencies continue to track cases at the individual level, collect data essential to making sound public health decisions, and provide public health guidance to protect the highest-risk populations.

Contact Tracing Guidance
In Operational Considerations for Adapting a Contact Tracing Program to Respond to the COVID-19 Pandemic, the Centers for Disease Control and Prevention (CDC) recommend that contact tracing programs “prioritize activities to ensure that human and financial resources are utilized most effectively,” and that workforce, epidemiologic, system, and financial, logistical and operational adaptations are advised when the “the number of cases and contacts has outpaced the capacity of the public health system to quickly notify and quarantine all contacts.”

In addition, CDC released Prioritizing Case Investigations and Contact Tracing for COVID-19 in High Burden Jurisdictions on November 23, 2020, that recommends prioritizing case investigations based on risk factors for severe disease. The guidance below was developed in alignment with the CDC guidance, and sets expectations of LPHAs in regards to contact tracing and case investigations based on local conditions of case growth. Specifically, the categories below define what actions may be prioritized, based on the 7-day case rate per 100,000 population. If more than 14 days have elapsed since specimen collection, case investigation and contact tracing should not be pursued unless there are unique circumstances.
associated with the person tested. LPHAs may also elect to assess their capacity to provide case investigation and contact tracing using the CDC’s high, medium, and low burden based on case backlog and staffing levels.

DHSS expects that LPHAs will re-engage in vigorous contact tracing when cases and community transmission are reduced, according to the category in which the local jurisdiction falls in a given week. Contact tracing will remain a critical tool in the long-term fight against COVID-19, especially as vaccines are gradually distributed.

It is also essential that LPHAs utilize the statewide COVID-19 technology response system, consisting of EpiTrax and MO ACTS, for disease monitoring and surveillance in order to reduce manual processes such as symptom monitoring and organizing caseloads. In the guidance below, DHSS has limited expectations of LPHAs regarding contact tracing volume based on localized case growth data. Additionally, DHSS has worked to ensure that only the most essential data variables, used for public health policy development, are prioritized. LPHAs may continue to utilize additional data fields into EpiTrax, to assist in local data collection case monitoring. LPHAs are encouraged to enter the minimum data set or the simple case investigation variables into EpiTrax while performing case investigations, so as not to create a duplicative need for data entry. Trainings on the use of EpiTrax and MO ACTS can be found on the DHSS website.

LPHAs in Category 1 are encouraged to redeploy resources previously geared toward contact tracing to case investigations if adequate staffing is a challenge. DHSS has a limited, but growing corps of case investigators and contact tracers who may be deployed as surge support to assist LPHAs with meeting the expectations in this document. DHSS will prioritize surge support to those jurisdictions experiencing the highest case rates and the highest levels of case growth. DHSS surge case investigators and contact tracers will work remotely, and in EpiTrax and/or MO ACTS.

**Contact Tracing Tiers and Interventions**

Please note that before moving between risk tiers, a jurisdiction should experience a 7-day case rate per 100,000 population within that tier for one full week.

**Category 1**

*Extreme Risk: 7-day case rate of 351 cases or more per 100k population*

- Investigate cases prioritizing those reported within the past 6 days especially those in vulnerable populations, cases associated with congregate settings, cases associated with outbreaks, and other high-risk groups, as defined by the CDC, using the simple case investigation.
- Contact tracing may be limited and resources temporarily reassigned to case interviews depending on the number of staff and the amount of resources.
- If case interviews are prioritized, provide positive cases with instructions for self-notifying close contacts with a request for close contacts to self-quarantine according to current CDC guidelines after the last possible exposure.
Category 2

Critical Risk: 7-day case rate of 101-350 cases per 100k population

- Investigate cases prioritizing those reported within the past 6 days especially those in vulnerable populations, cases associated with congregate settings, and cases associated with outbreaks, and other high-risk groups as defined by the CDC. At this level of community transmission a simple case investigation may be appropriate.
- Prioritize contact tracing for household contacts exposed within the past 6 days and contacts outside the house who are living, working, attending, or visiting congregate settings, part of a cluster/outbreak, or settings or events with potential extensive transmission.

Category 3

Serious Risk: 7-day case rate of 10-100 cases per 100k population

- Investigate all cases with a positive test collected in past 14 days
- Trace all close contacts, while prioritizing contacts of symptomatic cases, household contacts, contacts associated with outbreaks, those associated with congregate settings, and other groups at increased risk for severe illness, as defined by the CDC

Category 4

Low to moderate risk: 7-day case rate of 0-9 cases per 100k population

- Investigate all cases with positive test collected in the past 14 days
- Trace all close contacts exposed within the past 14 days