Severe Vaping-Associated Pulmonary Illness (VAPI)
Enhanced Surveillance Guidance for County Health Departments (CHDs)
Version 2 | September 20, 2019

Background

Severe vaping-associated (i.e., use of e-cigarette) pulmonary illness (VAPI) is a reportable condition in Florida due to its urgent public health significance as provided in Rule 64D-3.029, Florida Administrative Code. With this authority, the Florida Department of Health (FDOH) has initiated public health surveillance and investigation for cases of severe VAPI. For more information about youth vaping, please visit www.tobaccofreeflorida.com/epidemic.

The Centers for Disease Control and Prevention (CDC) has issued an alert urging clinicians to report possible cases of unexplained VAPI to their local health department (https://emergency.cdc.gov/newsletters/coca/081619.htm). Symptoms commonly experienced are difficulty breathing, shortness of breath, or chest pain, which developed over days to a week with some developing respiratory failure requiring intubation. This document aims to provide guidance about identifying and investigating VAPI reports through various surveillance mechanisms.

It is recommended that counties distribute the attached letter to health care providers that may care for these illnesses (e.g., hospitalists, pulmonologists, pediatricians, infectious disease practitioners, urgent care centers) as well. County epidemiology staff are asked to prepare to receive reports and investigate cases.

Surveillance and Investigation

The following information can be used for surveillance and investigation for VAPI case reports.

1. Methods for identifying VAPI cases:
   - Health care provider reporting
   - ESSENCE-FL: Florida Poison Information Center Network (FPICN) exposure calls, emergency department (ED) visits, and urgent care center (UCC) visits
     - The Bureau of Epidemiology (BOE) will be actively monitoring ESSENCE-FL for potential cases and will email county primary epidemiologists daily about potential VAPI cases
     - Term-based query developed by CDC to identify possible VAPI cases utilizes chief complaint, discharge diagnosis, and triage note fields
       - This query can be downloaded by users in the myESSENCE Library: select the box for “Vaping” tab and select download
   - Self-reporting from exposed persons

2. Following criteria can be used to assess if further investigation is needed
   - History of e-cigarette (“vaping”) or dabbing in 90 days prior to symptom onset
   - Hospitalization
   - Patient had pulmonary infiltrate on chest x-ray or CT

3. Collect all relevant records when cases are identified
   - Medical records (e.g. ED, history and physical, pulmonology and infectious disease consults, discharge summary)
   - Microbiology laboratory results (if performed)
   - FPICN full reports
4. **Conduct interview**
   - Contact exposed person or proxy to conduct interview ensuring that all data for the Merlin Basic Case and Extended Data screens are collected.

5. **Enter case data into Merlin**
   - Enter potential VAPI cases into Merlin. Click “Non-Reportable” on the case create screen and use disease code “Severe Vaping-Associated Pulmonary Illness (VAPI) – 72000.”

   - On the Basic Case screen, indicate whether the person was hospitalized and answer the two priority questions in the “Determining Whether Investigation Needed” section.
     - If the answer to any of the questions is “no,” the dx status will automatically set to “not a case” and the case should be submitted with no further investigation.
     - If the person was hospitalized and the answer to both priority questions is “yes,” the dx status will automatically set to “suspect,” indicating additional information is needed to classify the case.

   - Complete the Basic Data, Symptoms, Health Care Visits, and Extended Data screens for suspect cases and attach all relevant information (e.g., medical records, medical examiner’s report, FPICN report).

   - Attempt to contact patients with potential VAPI 3 times. If the patient cannot be contacted after 3 attempts, note that on the Basic Case screen.

For surveillance and investigation questions, please contact Dr. Prakash Mulay (Prakash.Mulay@flhealth.gov) and Thomas Troelstrup (Thomas.Troelstrup@flhealth.gov).

**Laboratory Product Testing**

CHDs should facilitate collection and shipping of vaping products and legal substances only. Chain of custody forms are required to document receipt and transfer of vaping products and samples. For coordination of this process, contact Lylah Seaton (Lylah.Seaton@flhealth.gov).