

U.S. Medical Affairs 2025 Trends Insights Report: 8/3/25-9/6/25

This information is sourced and aggregated from BIOFIRE® FIREWORKS and BIOFIRE® Syndromic Trends and may vary from what is displayed on <u>BIOFIRE® Syndromic Trends</u>. For reference purposes only.

Visit our syndromic trends site for more information: <u>BIOFIRE® Syndromic Trends</u>

Gastrointestinal (GI)

What is the data showing us:

- C. difficile remains the highest detected GI pathogen across all regions, with detection rates >12% in the Midwest, 19% in the Northeast, and consistently elevated in the South and West.
- Norovirus detection rates persist in high activity (stable in most regions) with 17.1% in the Northeast and >7% in the South.
- Enteropathogenic *E. coli* (EPEC) remains high across regions (>12% in the Midwest, >7% in the South), while Enteroaggregative *E. coli* (EAEC) is high in the Northeast and South but declining in the West.
- · Campylobacter is elevated across all regions, though stable in the Midwest and South and trending down in the West.
- Salmonella is rising in all regions, reflecting medium activity in the Midwest (recent weeks) and West (1.5%), while displaying high rates in the Northeast and South.
 - Access CDC data: Investigation Update: Salmonella Outbreak, September 2025
- Shigella shows high activity in the Northeast, while Adenovirus F 40/41 is elevated in the South.

What this means for U.S. providers/labs:

- C. difficile remains high across all regions, but it's important to note that a positive result does not indicate an active infection. A positive result could be an indication of colonization. Therefore, a positive result should be interpreted alongside clinical symptoms and other factors.
- Norovirus, Campylobacter, and E. coli activity reinforce the need for broad diagnostic panels and strong infection prevention, as these pathogens continue to drive GI illness.
- Rising Salmonella detections in the South and Northeast align with the CDC's multistate outbreak notice, emphasizing the need for careful monitoring and reporting.
- Emerging signals from Shigella (Northeast) and Adenovirus F 40/41 (South) illustrate the value of detecting less common but clinically relevant GI pathogens.

Respiratory (RP)

What is the data showing us:

- Human Rhinovirus (RV)/Enterovirus (EV) remains the most frequently detected RP pathogen nationwide, rising sharply in the West (+11%), Midwest (+13%), and South (+14.7%) over the past 5 weeks, with more modest growth in the Northeast (>3.5%). Current rates range from 15.1% (Northeast) to 29.5% (Midwest) for the first week of September.
 - RV/EV dominance coincides with regional declines in other pathogens, including Human Metapneumovirus (hMPV) and parainfluenza serotypes.
- SARS-CoV-2 is the **second most detected RP pathogen**, with rates ranging from **4.9% (Midwest)** to **8.4% (West)**. Most regions saw a sharp spike in late August followed by decline, resulting in flat net-changes over the past 5 weeks, while the **Midwest continues a slow rise (4.2%–4.9%)**.
 - View CDC data: COVID-19 Surveillance Data in the United States
- Regional co-detection rates hovered around roughly 8-13% across all U.S. regions during recent weeks.
- Respiratory Syncytial Virus (RSV) activity is very low. As we enter respiratory season, RSV activity will be monitored closely. Typical activity picks up mid-September to mid-October with peak activity occurring December-February.

What this means for U.S. providers/labs:

- The seasonal RV/EV surge is underway, likely from back-to-school activity. **Northeast rates may rise in coming weeks** due to later school starts, and **ambulatory/ED settings can anticipate increased pediatric URI volumes**, with RV/EV dominance and blunting of other pathogens possibly leading to **more wheeze/reactive airway disease** than bronchiolitis.
- SARS-CoV-2 activity is peaking, driving more ED and urgent care visits, while sustained RV/EV surges mean some
 patients may carry multiple pathogens. For COVID-positive patients with persistent lower-respiratory symptoms, coinfections (e.g., RV/EV, PIVs) may play a role, highlighting the value of mPCR testing algorithms.
- RSV prevention is now standard of care for infants and high-risk adults. The CDC's May 2025 interim analysis showed substantial reductions in infant RSV hospitalizations with maternal vaccination or infant mAbs, making prenatal and primary care counseling critical for prevention this season.
 - Read more: Interim Evaluation of Respiratory Syncytial Virus Hospitalization Rates Among Infants and Young Children After Introduction of Respiratory Syncytial Virus Prevention Products United States, October 2024–February 2025