Reportable Disease Surveillance System (NEDSS)

Coordinator:

Courtney Marshall, MPH
Kentucky Department for Public Health
Division of Epidemiology and Health Planning
Informatics Epidemiologist/NEDSS Coordinator
(502) 234-4568
courtney.marshall@ky.gov

State Website: https://chfs.ky.gov/agencies/dph/dehp/idb/Pages/default.aspx

National Website: https://www.cdc.gov/nndss/about/nedss.html

Why is it used?

To monitor disease trends in the state.

- Provides data to create and evaluate prevention and treatment initiatives.
- To provide data to the CDC for national reportable disease statistics.
- Provides data for grant applications related to reportable diseases in Kentucky.
- To monitor and evaluate geographic and/or spatial characteristics of disease.
- To monitor and evaluate outbreaks of disease.

What data is collected?

- Demographic information including gender, age, race, ethnicity and place of residence.
- Clinical symptoms.
- Risk factors.
- Outbreak associations.
- Laboratory information.
- Vaccine information.

How is data collected?

Disease reporting by health care providers, hospitals, clinics and laboratories is mandated by the Kentucky Disease Surveillance Administrative Regulation 902 KAR 2:020. Data collection tools include:

- EPID 200 Reportable Disease form.
- CDC disease-specific supplemental forms.
- Electronic case reports from hospital electronic health record systems.
- Clinical laboratory reports.

Data is submitted via fax, mail, or electronically through KHIE by:

- Hospitals and clinics.
- Local health departments.
- Private practice physicians.

- Commercial laboratories.
- State public health laboratory.

Data Strengths:

- Provides an estimate of communicable disease incidence and trends across the state.
- Works toward one of the ten essential public health services to monitor health status to identify and solve community health problems.



Data Limitations:

- Data on the EPID200 form and in NEDSS investigations is often incomplete.
- Follow-up is difficult and may not result in obtaining the needed information.
- Data are often sent to the state or LHD weeks and sometimes months after the reportable event, which makes follow-up even more difficult.
- Due to large volumes of data in the system, extracting data can be cumbersome and typically needs to be done by reportable disease staff or regional epidemiologist.
- NEDSS is a passive system and thus data availability is dependent on reporting by health care providers and laboratories.

How is the system evaluated?

- Data collection is routinely monitored utilizing quality control standards developed by the CDC.
- Reportable Disease staff at KDPH review individual cases before initial submission to the CDC.
- Data are reviewed annually; any discrepancies between Kentucky and the CDC are reconciled before data are finalized.
- Informatics staff review incoming lab and case data daily for errors.

Data Set Availability:

- Fully identified data is not available to the public.
- Most data are released as an Excel file; other formats or connection types are available on request.

Data Release Policy:

- Portions of the data set may be shared, and identified data can be made available to research organizations if the requestor signs a confidentiality / security agreement with KDPH.
- Approval by the IRB is occasionally necessary.
- Any data released to the public will be de-identified.
- All requests should include a project justification, variables of interest, time of interest and anticipated deadline.

Data Publications:

- The Reportable Disease Section produces a 5-year and 10-year statewide reportable disease summary, which is available at:
 - https://chfs.ky.gov/agencies/dph/dehp/idb/Pages/diseasesummary.aspx
- The most recent 5-year report includes data from 2017-2021.
- The most recent 10-year report contains data from 2006-2015.

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Kentucky Department for Public Health Reportable Disease File. Frankfort, Kentucky. Cabinet for Health and Family Services, Department for Public Health [data year].

Contributing Author:

Carrell Rush, MPH, Kentucky Department for Public Health

