FoodCORE Foodborne Diseases Centers for Outbreak Response Enhancement

Improving foodborne disease investigation and response in state and local health departments

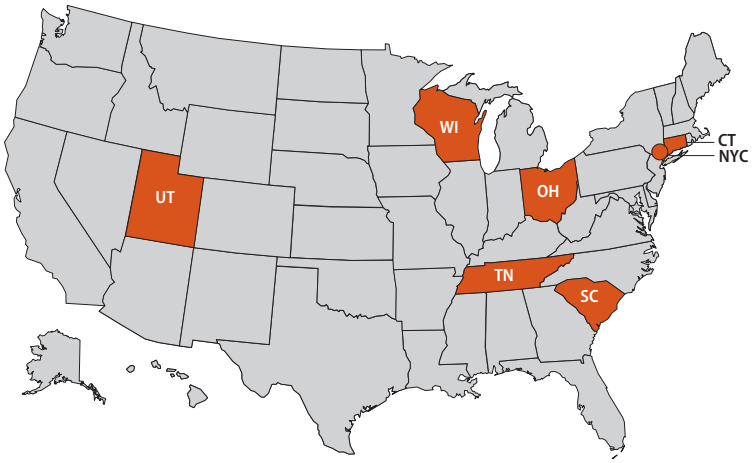
"FoodCORE improves our capacity to interview ill persons sooner and more comprehensively about what they ate, conduct faster DNA fingerprinting of the bacteria that made them sick, and pool information swiftly to determine sources of more contaminated foods, so solutions can be found more rapidly."

Dr. Robert Tauxe, Deputy Director, CDC's Division of Foodborne, Waterborne, and Environmental Diseases

FoodCORE in action: Enhancing investigation and response

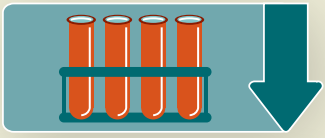
CDC started FoodCORE in 2009 to enhance the ability of state and local health departments to respond to foodborne disease outbreaks. Centers work together to

- Detect more outbreaks
- Conduct thorough investigations
- Control outbreaks faster
- Protect other people from getting sick



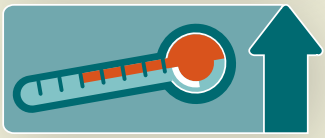
The centers cover 13% of the U.S. population, or 41 million people. Centers are located in health departments in Connecticut, New York City, Ohio, South Carolina, Tennessee, Utah, and Wisconsin.

IMPACT: Better, faster, more complete



Laboratory: decreased time to serotype *Salmonella* from 8 days to 4 days

Epidemiology: decreased time to attempt an interview with *Listeria* patients from 7 days to 1 day



Environmental health: participated in multidisciplinary investigations and trainings

National Center for Emerging and Zoonotic Infectious Diseases
Division of Foodborne, Waterborne, and Environmental Diseases

CS234463

Helping solve *Salmonella* outbreak mysteries

FoodCORE played a key role in solving a 2012 multistate outbreak of *Salmonella* infections involving two rare strains. FoodCORE laboratories identified sick people in five of the seven centers. These centers contributed critical evidence that accelerated the investigation.

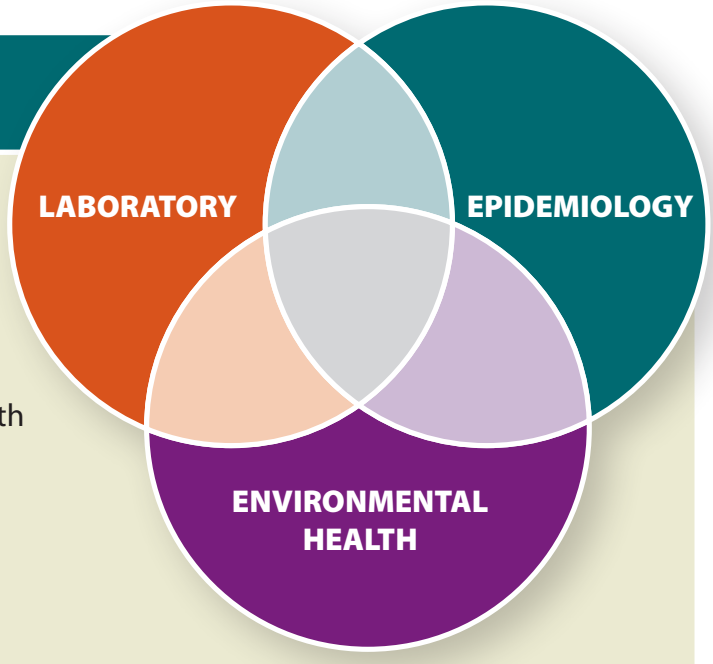
Public health officials in the centers rapidly conducted interviews of sick people to determine which foods and where the sick people ate. Multiple people reported eating sushi the week before they became sick. This information was crucial to quickly identify which foods to test and investigate. Using interview information as well as their enhanced resources, environmental health specialists and laboratory personnel collected and tested food samples.

FoodCORE efficiently worked together with other involved health departments and regulatory partners to pinpoint frozen raw scraped ground tuna as the likely source of contamination. They were among the first to find the rare *Salmonella* strains in the contaminated tuna. The product was recalled, which likely prevented additional illnesses.

Determining what works best

The centers work together to develop model practices for outbreak response. They do this so that others can learn from their experiences and replicate what works best.

Epidemiology, laboratory, and environmental health teams effectively work together to find what sick people ate, do faster DNA fingerprinting of the bacteria that made them sick, and respond more rapidly. These teams work together to quickly share information in order to find the sources of contaminated foods.



Strength in three critical public health areas:
Merging the key building blocks of expertise through teamwork with state and local health departments

Partners are key

To enhance and complement states' outbreak response capacity, we work closely with other federal and state collaborative programs, including PulseNet, Environmental Health Specialists Network, and FoodNet, which are coordinated by CDC. FoodCORE and CDC also work with the Association of Public Health Laboratories, U.S. Department of Agriculture's Food Safety and Inspection Service, and the U.S. Food and Drug Administration's Rapid Response Teams.