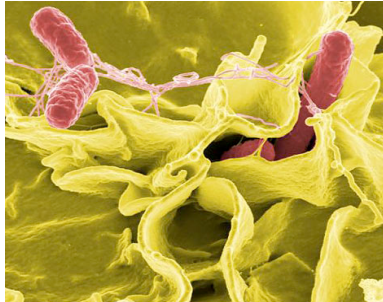


Common Foodborne Pathogens: *Salmonella*



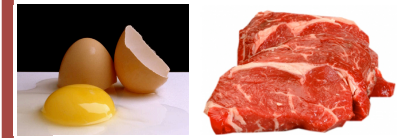
What is *Salmonella*?

Salmonella species are common, naturally occurring bacteria found in the intestinal tracts of many animals and birds. When certain species of *Salmonella* are transferred from animals to humans – often through food contaminated with animal feces – humans experience symptoms of *Salmonella* poisoning.

Salmonella species are a leading cause of foodborne bacterial illnesses in humans. Human salmonellosis (the disease caused by *Salmonella*) is generally increasing worldwide. Poultry, beef and eggs are the predominant reservoirs of *Salmonella* species with other foods (fruits and vegetables) as potential vehicles for infection.

Commonly Associated Foods

- Chicken and Turkey
- Eggs
- Raw meat
- Unpasteurized Milk and juices
- Fish
- Chocolate
- Tomatoes, melons and other fresh produce



Safe Food Handling Checklist

- Wash hands thoroughly
- Wash counter and utensils
- Keep foods separated
- Cook foods thoroughly
 - Poultry = 165°F
 - Ground beef = 160°F
 - Steak = 145°F
 - Fish = 145°F
 - Eggs = cook until yolk and whites are firm
- Refrigerate/leftovers immediately after use

For More Information Contact:
Renee R. Boyer, Ph.D.
Extension Specialist
rrboyer@vt.edu

Symptoms of *Salmonella* Infection

The most common symptoms of *Salmonella* infection are non-bloody diarrhea and abdominal cramps. Symptoms generally occur 8 to 72 hours after ingestion of the pathogen and can last 3 to 5 days.

Who gets *Salmonella* Infection?

Foodborne infections from *Salmonella* are obtained through eating contaminated food or water. While children, the elderly and immunocompromised individuals are more susceptible to infections, anyone at any age can get sick.

Proper Food Handling Techniques to Avoid Infection

Do not eat undercooked poultry and other meat products. Cook all poultry (even frozen), meats, and eggs thoroughly. Using a meat thermometer, make sure meat reaches the correct temperature. When not using, immediately place foods in refrigerator or freezer. Drink only pasteurized milk. Wash fruits and vegetables thoroughly with cold water, especially those that will not be cooked. Make sure infected people, especially children, wash their hands carefully with soap after using the toilet to reduce the risk of spreading the disease.

Recent *Salmonella* Outbreaks in the U.S.

From August 2006 to May 2007 there were 628 cases of salmonellosis linked to peanut butter. Following investigation it was determined that the contamination occurred at the plant.

In April 2005, USDA linked cases of *Salmonella* infections in people to stuffed frozen chicken products sold in Minnesota and Michigan.

In 2004, several outbreaks of *Salmonella* were linked to consumption of uncooked roma tomatoes. These outbreaks resulted in over 500 cases of illness. It is believed that the implicated tomatoes were contaminated in either the field or packing house.