**Escherichia coli O157 Infection**

Over the past 20 years, O157 has emerged from obscurity to become, rightly or wrongly, perhaps the most dreaded of the common causes of infectious diarrhea. Oregon has been the setting for many O157 outbreaks, and investigations of those outbreaks combined with the analysis of other surveillance information have contributed greatly to our understanding of this pathogen. Spread by the fecal-oral route, O157 has a number of animal reservoirs, the most important of which are ruminants: including cattle, goats, sheep, deer, and elk. Transmission often occurs from consumption of contaminated food or water, as well as direct person-to-person spread.

Nationally, outbreaks have involved undercooked ground beef, contaminated alfalfa sprouts and other produce, swimming in contaminated water, and drinking unpasteurized milk. In 2002, 80 of that year’s 204 cases were due to an outbreak associated with animal exhibits at the Lane County Fair. Despite efforts nationally to reduce the levels of meat contamination, the rate of sporadic (i.e., not outbreak-related) cases has been essentially unchanged over the past decade. Person-to-person transmission remains an important source.
**E. coli O157 Infection**
by Onset Month
Oregon, 2003

Cases

![Graph showing E. coli O157 infection by month, with a spike in August reflecting outbreaks in 2000 and 2002.]

- **Mean, 1998–2002**
- **2003**

**Incidence of E. coli O157 Infection**
by Age and Sex
Oregon, 2003

Cases/100,000

![Graph showing incidence of E. coli O157 infection by age and sex, with a peak in August.]

- **Male**
- **Female**
Incidence of *E. coli* O157 Infection
Oregon vs. Nationwide
1994–2003

Cases/100,000

Year

2002 outbreak (80 cases) associated with animal exhibits at Lane County Fair
Nationally reportable as of 1994

Incidence of *E. coli* O157 Infection
by County
Oregon, 2003

Oregon rate = 2.85

Malheur County rate represented 1 case