Vibriosis

Vibriosis is caused by infection with bacteria from the Vibrionaceae family. This family of bacteria includes the species that causes cholera, and public health investigators typically distinguish between either cholera (infection with toxigenic V. cholerae) and other “vibriosis” (infection with any other Vibrionaceae, including those vibrios lately rechristened as “Grimontia”).

Commonly, vibriosis is acquired by eating raw or undercooked molluscan shellfish and presents as watery diarrhea, abdominal cramps and fever. In Oregon, V. parahaemolyticus is the most frequently reported species, as this pathogen is found naturally in the coastal waters and shellfish of the Pacific Northwest, especially during summer months. Nonfoodborne infections with Vibrio species can also occur through contact with sea or brackish water (e.g., infection with V. alginolyticus after swimming with an open wound, or through a laceration while shucking an oyster). These types of infections can produce bullae, cellulitis, muscle pain, fever and sepsis.

Vibriosis was not reportable until 1998 in Oregon and 2007 nationwide. Today, all Vibrio infections are nationally notifiable. Case reporting is essential to the identification of contaminated shellfish beds and removal of these shellfish from the raw seafood market. In 2013, the CDC FoodNet Program estimated every reported case of Vibrio represents 142 people not diagnosed with the infection.

Nationally, reported rates of vibriosis have trended upwards in the past decade. Rates of reported infections have also been rising in Oregon, although increases are not seen every year. The reason for the increasing trend is not clear. It could be that we’re getting better at identifying cases or it could be that with warmer temperatures there are just more opportunities for exposure.

In 2013, Oregon saw 27 (22 confirmed and 5 presumptive) cases of vibriosis, an increase from the 19 cases reported in 2012. The majority of reported cases 19 (70%) of the cases occurred in males. Twenty-two cases (82% of all reported cases last year) occurred during July–September. Of the 23 confirmed cases, 18 (82%) were V. parahaemolyticus, with one case each of V. mimicus and V. alginolyticus a co-infection (where two species were identified) of V. cholerae and V. parahaemolyticus.
**Vibrio infections: Oregon, 1988–2012**

![Bar chart showing Vibrio infections from 1988 to 2012. Not reportable until 1998.]

**Vibriosis by onset month: Oregon, 2013**

![Bar chart showing Vibriosis by onset month in 2013.]

Median 2009-2013
Vibriosis by species: Oregon, 2013

**Prevention**

- Avoid eating raw oysters or other raw shellfish.
- Cook shellfish (oysters, clams, mussels) thoroughly.