

Campylobacter Jejuni Infection Associated with Raw Milk Consumption – Utah, 2014

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Summary: Despite routine testing, raw milk from a Utah dairy sickened 99 people with *Campylobacter*; 1 died and 10 were hospitalized. A 2-month shutdown failed to stop the outbreak and the dairy's raw milk permit was revoked.

Abstract:

Background: In Utah, raw milk sales are legal from farm to consumer. Despite routine bacterial and coliform counts by the Utah Department of Agriculture and Food (UDAF), raw milk-related illnesses occur. In May 2014, the Utah Department of Health (UDOH) identified a cluster of 3 *Campylobacter jejuni* infections with indistinguishable pulsed-field gel electrophoresis (PFGE) patterns. All patients reported consuming Dairy A's raw milk. Routine testing of UDAF-licensed Dairy A's raw milk was acceptable. We investigated to identify a source and prevent additional infections.

Methods: UDAF used onsite milk neutralization technique to preserve *C. jejuni* during testing. Utah's electronic disease surveillance system identified cases. Confirmed illness was defined as diarrhea caused by *C. jejuni* matching the cluster PFGE pattern. Probable illness was diarrhea and contact with a confirmed patient or raw milk purchased from Dairy A. Confirmed patients were interviewed by using a standardized questionnaire.

Results: During May 9–July 31, a total of 89 (52 confirmed and 37 probable) cases were identified. Eleven (21.2%) confirmed patients were hospitalized; 1 died. Twenty-five (48.1%) confirmed patients reported having consumed Dairy A raw milk. Fifteen (28.8%) confirmed patients reported having eaten queso fresco. Dairy A's raw milk yielded *C. jejuni* with the cluster PFGE pattern. UDAF suspended Dairy A's raw milk permit on August 4 for 2 months. Additional cases occurred in November; UDAF revoked Dairy A's raw milk permit on December 1.

Conclusions: Routine testing of raw milk does not ensure its safety. Mandatory reporting, timely sample collection, pathogen testing, and onsite milk neutralization likely led to *C. jejuni* detection. Linking case and raw milk PFGE patterns might identify the source and allow implementation of control measures.