

## **A Consumer Calf-tastrophe: An Outbreak of Cryptosporidiosis After Exposure to Ill Calves**

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**Background:** In July 2015, the Thomas Jefferson Health District was notified by a local hospital that four persons had visited the emergency department with gastrointestinal illness; all four reported contact with calves experiencing diarrhea at the same farm. In collaboration with the Virginia Department of Agriculture and Consumer Services (VDACS) and the Division of Consolidated Laboratory Services, an investigation was initiated to detect the causative agent, identify additional cases, ascertain risk factors, and prevent further illness.

**Methods:** Interviews were conducted with ill persons and stool samples were collected from both ill humans and calves. Human samples were tested on a gastrointestinal polymerase chain reaction panel at the hospital laboratory, while calf samples were tested at a VDACS laboratory for *Escherichia coli* and *Cryptosporidium* by enzyme-linked immunosorbent assay. Both human and animal samples were sent to the Centers for Disease Control and Prevention for further analysis. Education and outreach were provided to affected persons.

**Results:** Interviews revealed eight calves from one goat farm had been sold or re-sold to five separate families. All eight calves were ill upon or shortly after purchase, five of which subsequently expired. In total, 14 human illnesses were reported among persons exposed to ill calves, with risk factors identified to include touching, holding, and/or bottle feeding calves. Four human specimens and three calf specimens were positive for *Cryptosporidium*.

**Conclusion:** Proper hand hygiene is critical for the prevention of zoonotic gastrointestinal illnesses. Ill cattle should be separated from healthy cattle to prevent spread of disease in farm settings, with proper disinfection of areas where ill cattle are housed. Persons handling ill calves should be educated about the risks of disease and should seek medical care immediately if symptoms develop.