

FoodNet Canada – Integrated surveillance for Food Safety: Farm to Fork

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FoodNet Canada, facilitated by Public Health Agency of Canada, is an innovative, integrated enteric pathogen surveillance system, similar to US CDC FoodNet. The system has three sentinel sites in operation in the Fraser Region, lower mainland, British Columbia since 2010, in Calgary and Central Zones, Alberta since 2014 and in the new Ontario site in the Middlesex-London area since 2014. In each sentinel site, enhanced human disease surveillance is performed in parallel with active surveillance of enteric pathogens in various exposure sources. Enhanced epidemiological and microbiological data are collected for the human cases, based on a strong collaboration with the local public health unit and private, hospital and public health diagnostic laboratories. The analysis of the detailed, rich, risk factor information for reported cases of enteric illness, obtained by public health inspectors using an enhanced, standardized questionnaire, forms the cornerstone of FoodNet Canada. In parallel, active monitoring of enteric pathogens on farms, retail food (chicken, pork, beef and produce (soft berries, fresh cut fruits, leafy greens and herbs - episodic)) and untreated surface water is conducted. Continuous surveillance for enteric pathogens in each component provides the ability to compare pathogen profiles amongst components and contributes to the understanding of source attribution. These analyses provide benchmarks for measuring interventions, future initiatives and policy development related to food and water safety in Canada. The presentation will provide an update on this integrated enteric disease surveillance system for Canada, share recent results and successes from the integrated analysis, and discuss future directions.

