USA: épinards bio / E. coli

Voici quelques extraits d'AgBioView, suite à une contamination microbiologique (E. coli O157:H7) d'épinards bio aux USA, dont l'origine semble être de mauvaises pratiques d'utilisation de fumier. 150 personnes ont été touchées, dont 23 avec atteintes rénales, et un mort. Cette contamination entraîne une situation de crise aux USA, incluant un débat sur les risques spécifiques de l'agriculture bio concernant le risque microbiologique (utilisation d'engrais organiques et non pas minéral sur des légumes pouvant être mangés crus). Mais le débat porte aussi plus généralement sur les conditions d'utilisation des fumures organiques : quelles cultures peuvent présenter un risque, quelles conditions de compostage, de méthodes d'application, de délai avant récolte, etc.

Il y a fort à parier que ce genre de questions débarquera rapidement sur le vieux continent.

http://www.webcommentary.com/asp/ShowArticle.asp?id=averyd&date=060927
http://www.webcommentary.com/asp/ShowArticle.asp?id=averyd&date=060927

Tainted Spinach Raises Questions of Manure on Food Crops

Center for Global Food Issues, September 27, 2006, By Dennis T. Avery

Ten years after one of the country's top food safety experts warned of danger from putting manure on food crops, Americans are still being devastated by manure-born pathogens. It doesn't have to be.

Contaminated raw spinach has just killed at least one person, brought devastating kidney failure to 23, hospitalized more than 75, and sickened more than 150 people across America. The deadly spinach has been traced back to Natural Selections Foods, the largest grower of organic lettuce and spinach in the United States.

Organic rules bar the use of manufactured fertilizer on their crops, so organics use composted manure and other animal wastes on their fields. Animal manure is the ultimate source of the virulent E. coli O157:H7, which contaminated the spinach.

In 1995, the Journal of the American Medical Association quoted Dr. Robert Tauxe, head of foodborne illnesses for the U.S. Centers for Disease Control, telling a medical conference that "'Organic' means a food is grown in animal manure. . . . We got rid of human waste in our food and water, and I think we're going to have better control in the future of manure in our food and water."

The Organic Trade Association responded that organic food was safe because farmers compost their manure. Dr. Tauxe responded that "Unfortunately, knowledge of the critical times and temperatures needed to make composted animal manures microbiologically safe is incomplete."

Today, USDA organic rules allow manure to be applied after just 3 days of composting—right up to harvest time! Raw manure can be applied until 90 to120 days prior to harvest, under most state-level rules for all farms. But a recent University of Minnesota study found that produce grown with manure aged 6 to 12 months was still 19 times more likely to be contaminated with E. coli than foods grown with manure aged more than a year.

Virtually no farmers age their manure for a year as too much of the vital nitrogen gasses off into the air during that time. Instead, most conventional farmers put their manure only on feed crops such as corn or on pasture. That may be why the Minnesota researchers found organic produce three times more likely to be contaminated with E. coli (7% of samples) than conventional (2%).

Organic activists love to claim that the deadly O157:H7 strain of E. coli is caused by "factory farming." Not so. The USDA says it has found O157:H7 in every cattle herd it's tested for it. A Swiss study last year found "no significant differences" in O157:H7 prevalence between organic and conventional dairy farms. Claims that "grain feeding" of cattle causes O157:H7 to flourish are also unsupported; various studies have found the opposite.

Washing the food can't fully protect consumers either. Rutgers University has shown

that lettuce (and likely spinach) can take up O157:H7 via its roots and harbor the pathogens inside the leaves! In short, there is no practical way to ensure full safety in the food crops fertilized with manure, composted or not.

Is it time to get the manure out of human food crops?

States could require that manure either be used on non-food crops or composted for at least a year. Annual questionnaires could identify the relatively few farms that compost with regular government inspections made.

This will raise howls of protest from the organic movement, which also protested the current weak manure rules. However, it's now clear that using manure on food crops involves a serious public risk—especially with leafy produce like lettuce and spinach. The organic movement should want to ensure its customers health as urgently as do public health officials.

Eating no longer needs to be a deadly game of Russian roulette.

http://www.cqfi.org/cqficommentary/spinach-e-coli-contamination-media-advisory

Spinach E. coli Contamination: Media Advisory

- Center for Global Food Issues, September 20, 2006

Contact: Alex Avery, Center for Global Food Issues, 540-337-6354 or cell: 540-255-6378

Churchville, Virginia, September 19

The following is to correct misinformation regarding organic farming practices and food safety risks distributed to national media by organic food interest groups in an effort to deflect scrutiny in the wake of the recent and tragic outbreak of virulent E. coli that has killed at least one, hospitalized nearly 20, and sickened 114 individuals in 21 states.

Unless otherwise identified, all discussion points can be attributed to the Center for Global Food Issues' director of research and education, Alex Avery.

1. Organic farming practices are not safer and may, in fact, be less safe than nonorganic farming practices.

- -- A University of Minnesota study published in the Journal of Food Protection in 2004 concluded that organic produce was six times more likely to be contaminated with E. coli. Salmonella was found on organic lettuce and organic green peppers, but not on any conventional produce. According to the researchers, the "prevalence of E. coli on certified organic produce" was "almost threefold higher than that on conventional", but because of the comparatively smaller conventional food sample size, this difference could not be considered "statistically significant". Yet of the total of 15 farms that had E. coli-positive samples, 13 were organic and only two were conventional. (Mukherjee, A, et al. J of Food Prot 67(5):894-900, 2004)
- -- The most frequently contaminated product found in the Minnesota study was organic lettuce, with roughly one quarter of organic lettuce samples contaminated by E. coli. The levels of E. coli on organic lettuce and leafy greens was also higher than found on conventional samples.
- -- Importantly, the research determined that fruits and vegetables were 19 times more likely to be contaminated with E. coli if the manure was composted 6 to 12 months compared to produce fertilized with manure aged more than one year. Current organic manure handling regulations allow application of manure that has been composted for as little as three days right up to harvest time.
- -- Some have suggested that manure use is "highly regulated" on organic farms but is not regulated on non-organic farms. This is incorrect. Every state has regulations against the use of raw (uncomposted) manure on crops consumed raw. However, all use of manure and manure-based compost by organic and non-organic farmers needs to be reexamined in light of the findings in the Minnesota study and applied to all.

Fortunately, this is essentially the point of "The Lettuce Safety Initiative" that has now been expanded to include spinach. This is a sound policy reaction to this and other E. coli contamination episodes of the past decade, including a multi-state outbreak from organic lettuce that sickened many in Connecticut and Illinois in June of 1996.

2. None of the organic brands from Natural Selections Foods LLC have been cleared of possible contamination by the FDA.

- -- While Natural Selections Foods LLC has claimed that "manufacturing codes" from packaging retained by patients are all from non-organic spinach, this is totally inadequate information. The FDA and state authorities have package/UPC codes for a relatively small number of victims identified so far.
- -- Why was Natural Selections posting reassuring (and conflicting) messages about the apparent safety of its organic products on its website only three days into a growing foodborne-illness outbreak for which no products had been cleared and the source of the contamination had yet to be identified?

3. Is E. coli O157:H7 a by-product of grain-based feeding or other "industrial" farming practices? No.

- -- Studies have found E. coli O157:H7 in every single cattle herd tested by USDA researchers, including cattle raised on open pastures at low densities in remote areas. Genetic evidence indicates the O157:H7 strain arose thousands of years ago. Studies are conflicting as to whether grain-based feed increases the prevalence and shedding of O157:H7 strains of E. coli compared to grass feeding. Some have found higher rates with grass and hay feeding, others with grain.
- 4. This outbreak is due to practices used in organic farming While some outbreaks in the past have been thought to have occurred due to cross contamination during rinsing, current regulations if followed have been designed to address this hazard.
- -- Ironically, the Minnesota research indicates that larger, certified operations are considerably less prone to bacterial contamination than smaller, more independent uncertified operations. E. coli contamination rates were roughly twice as high on un-certified organic farms compared to certified farms.

http://www.foxnews.com/wires/2006Sep26/0,4670,TaintedSpinachLawsuit,00.html

Ohio Family Sues Over Tainted Spinach

- FoxNews.com, September 26, 2006

TOLEDO, Ohio — Five family members who said they were sickened after eating fresh spinach filed a lawsuit Tuesday against a processing company investigators are examining in their search for the source of the tainted greens.

The lawsuit in U.S. District Court seeks at least \$100,000 in damages from Natural Selection Foods LLC.

Roger Drummond and Laura Snider, of Bowling Green, said they and their three children became ill in late August and early September after eating packages of organic spinach salad.

The family suffered from diarrhea, cramping and headaches, the lawsuit said. The youngest, 1-year-old Amrita Drummond, was hospitalized and tests showed that she was suffering from a highly virulent strain of E. coli, according to the lawsuit.

She suffered permanent kidney damage and will require lifelong care, said attorney David Zoll.

A message seeking comment was left with the company Tuesday, but was not immediately returned.

Health officials tracking the source of the E. coli outbreak from spinach has sickened at least 175 people nationwide are focusing on Natural Selection Foods LLC, which officials believe packaged the tainted spinach for Dole and dozens of other brands. They're also looking specifically at nine farms in three California counties that supplied the company with leafy greens.

Natural Selection Foods, based in San Juan Bautista, Calif., has recalled more than 30 brands, including Dole, President's Choice, Ready Pac, Trader Joe's, Nature's Basket and Premium Fresh.