



# Managing Challenges of Import Safety in a Global Market

**CFIRE 03-02**  
**June 2009**

National Center for Freight & Infrastructure Research & Education  
Department of Civil and Environmental Engineering  
College of Engineering  
University of Wisconsin–Madison

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**Technical Report Documentation Page**

1. Report No. CFIRE 03-02	2. Government Accession No.	3. Recipient's Catalog No. <b>CFDA 20.701</b>	
4. Title and Subtitle <b>Managing Challenges of Import Safety in a Global Market</b>		5. Report Date June 2012	
		6. Performing Organization Code	
7. Author/s Vicki Bier, Ph.D.		8. Performing Organization Report No. <b>CFIRE 03-02</b>	
9. Performing Organization Name and Address National Center for Freight and Infrastructure Research and Education (CFIRE) University of Wisconsin-Madison 1415 Engineering Drive, 2205 EH Madison, WI 53706		10. Work Unit No. (TRAIS)	
		11. Contract or Grant No. <b>DTRT06-G-0020</b>	
12. Sponsoring Organization Name and Address Research and Innovative Technology Administration U.S. Department of Transportation 1200 New Jersey Ave, SE Washington, D.C. 20590		13. Type of Report and Period Covered <b>Final Report xx/xx/xx – xx/xx/xx]</b>	
		14. Sponsoring Agency Code	
15. Supplementary Notes <b>Project completed for USDOT's RITA by CFIRE.</b>			
16. Abstract This collaborative will examine market, regulatory, and hybrid approaches to managing risk from deliberate or unintentional contamination in imported commodity products from the global supply chain, through research and on-campus activities involving industry, regulators, and visiting academics.			
17. Key Words Risk, regulatory, security, contamination, supply chain	18. Distribution Statement <b>No restrictions. This report is available through the Transportation Research Information Services of the National Transportation Library.</b>		
19. Security Classification (of this report) <b>Unclassified</b>	20. Security Classification (of this page) <b>Unclassified</b>	21. No. Of Pages 16	22. Price <b>-0-</b>

**Form DOT F 1700.7 (8-72)**

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# Managing Challenges of Import Safety in a Global Market

## **I. Brief summary**

The first year was spent learning about the current situation, framing the problem, and bringing the diverse collaborative members together. In order to do this, we needed to learn about each other's disciplines and understand each other's terminology and problem approaches. We are a diverse project team, and did not all know each other at the start of the project. The fall law seminar, which met weekly, was helpful in this regard, because it brought in speakers from diverse areas to address the common issue of import food safety and explain their perspectives. Students enrolled in the class were mainly from the law school, but other enrollees included one student from food science and two from business. All members of the collaborative participated in this class, except the members from the School of Business and the Department of Consumer Science. This class was helpful to the group, because all were able to participate equally as learners. We greatly appreciate the superb efforts of Prof. Dave Trubek for his assistance with this seminar as a way to get the collaborative off to a good start.

Eight working meetings of the collaborative were held during the year—three in the summer of 2008 (to organize speakers in the law seminar), two in the fall (not including the weekly meetings of the law seminar) to discuss additional speaker events and set a date for the spring conference, and three in the spring to organize the May conference. The collaborative members from the Law School, the College of Engineering, and the Food Research Institute participated regularly and actively, while the members from the School of Business were able to attend only twice, due to schedule conflicts and other outstanding commitments.

Links have been forged across campus among the Law School, the College of Engineering, and the Food Research Institute. Still to come are closer links with the School of Business and the Department of Consumer Science (although these units may never take quite as active a role in the collaborative).

## **II. Events and publications undertaken under the auspices of the collaborative**

### Classes

- Law 940: Law and Contemporary Problems, Fall 2008. *Transnational Regulation: Increasing the Safety of Globally Sourced Products* Attendance: 14 students (two from the School of Business, one from the food science dept, and the balance from the Law School), 2 auditors.

### Lectures in classes

- Guest lecturer in ISyE 516 (Introduction to Decision Analysis), on “*Risk-based Decision Making for Food Safety*,” Lorna Zach, October 15, 2008, Attendance: 30
- Guest lecturer in Law 940: (Law and Contemporary Problems), “*Management of International Suppliers at Pepsi Co./Quaker Oats*.” Dale Morton, Director of Food Safety

Programs for Quaker Tropicana Gatorade (QTG) and Pepsi Cola North America (PCNA), October 23, 2008, Attendance: 25

- Guest lecturer in Law 940: (Law and Contemporary Problems), *Current Issues in the U.S. Congress*. Benjamin Cohen, Center for Science in the Public Interest, November 20, 2008, Attendance: 23

#### Professional Development Seminar

- April 21, 2009 *International Agriculture and Food*, April, 2009, 2:45 PM - 6:00 PM, 200 Lubar Commons, Law School, Attendance: 32  
<http://wage.wisc.edu/events/Index.aspx?ID=562>

#### Outreach events <http://wage.wisc.edu/research/collaboratives/safety/events/>:

- September 25, 2008, *Alternative forms of regulation: A roundtable on innovation in food safety*. Cary Coglianese, Univ. of Pennsylvania. Attendance: 25
- October 21, 2008, *Risk-based regulation and food safety*. Lorna Zach, Univ. Wisconsin, Attendance: 23
- October 30, 2008, *From Plan to Market: The development of China's food safety law*. Yuanyuan Shen, Brandeis University. Attendance: 27
- November 4, 2008, *The regulation of innovation: The special problem of international safety standards*. Vincent Brannigan (University of Maryland) and Bernd Beier (Munich University of Applied Sciences). Attendance: 10
- November 5, 2008, *Application of Phytosanitary Measures in International Trade*. Shirley Wager-Pagé, Branch Chief, Commodity Import Analysis and Operations Staff, Plant Protection and Quarantine, Animal and Plant Health Inspection Service. Attendance: 21
- November 13, 2008, *Deadly food and product liability: A law-in-action perspective*. Denis Stearns, Marler Clark LLP. Attendance: 23
- April 9, 2009, *Quantifying uncertainty in campylobacter transmission in chicken processing lines*. Roger M. Cooke, Chauncey Starr Senior Fellow, Resources for the Future. Attendance: 15 (10 students and faculty from ISyE 574: Methods for Probabilistic Risk Analysis, plus five additional attendees from the CVM and CALS)

#### Conferences

- Conference: May 26 - 27, 2009, *Food Import Safety: Systems, Infrastructure, Governance*. Attendance: 72, see appendix for agenda
- Conference April 30 - May 1, 2008, *Treatment and Disposal of Food Products Contaminated by Biological Threat Agents* Attendance: 42  
<http://wage.wisc.edu/events/index.aspx?ID=447>

#### Presentations at conferences

- Haphuriwat, N., and V. M. Bier, "How Many Containers to Inspect to Deter Terrorist Attacks," INFORMS Annual Meeting, Washington, D.C., October 200
- Bier, V. M., "How Many Containers to Inspect to Deter Terrorist Attacks," Workshop on Port Security/Safety, Inspection, Risk Analysis and Modeling, Rutgers University, November 17-18, 2008

- Haphuriwat, N., and V. M. Bier, “How Many Containers to Inspect to Deter Terrorist Attacks,” Annual Department of Homeland Security University Network Summit, Washington, D.C., March 18-20, 2008.

#### Publications and proposals

- Zach, Lorna and Vicki M. Bier. 2009. “Risk-based Regulation for Import Safety,” to appear in *Food Safety in the Global Economy*, Eds.: Cary Coglianese, Adam Finkel, David Zaring, September 2009, University of Pennsylvania Press, Philadelphia.
- Bier, Vicki M. and Nara Haphuriwat. "Analytical method to identify the number of containers to inspect at US ports to deter terrorist attacks," submitted to *Annals of Operations Research*. 2008
- Book to be published from the spring 2009 conference: Wiley-Blackwell Food Science Books, Tentative title: *Improving Import Safety of Foods*. Editors: Wayne Ellefson, Lorna Zach, Darryl Sullivan. Chapters to include speaker presentations from the spring conference, as well as other contributions. Expected publication date: Spring 2011.
- Research Proposal to the Robert Wood Johnson Foundation / Public Health Law Research, Co-PI's: Tai and Bier. “Information Collection and Sharing for Contaminated Food Issues” \$149,971, Dates: 1-1-2010 to 6-30-2011, Submitted May 19, 2009.

#### May 26 & 27 conference feedback

Total registered attendance for the conference was 67, although 5 additional people stopped in for only the Tuesday morning session, bringing the total to 72. 24 conference evaluation forms have been received, along with numerous other positive verbal comments about the Food Import Safety Conference. All were extremely positive, with the average overall rating for the conference at 4.63 out of 5 (“excellent”). The verbal and numerical feedback on the speakers in the Tuesday morning session was the most positive, particularly for the two plenary speakers, who were consistently rated at 5 (“excellent”). (Sample attendee comments: “I could have listened to this speaker for much longer than the allotted time”; “great info to have”). The industry presentations were similarly well received, with comments such as “These are difficult problems and it was good to learn how the industry leaders are dealing with it,” and “good information on supplier quality.” Sample comments on the conference as a whole included: “Enjoyed the broad range of speakers within this topic”; “international speakers at a free price—unheard of”; “Would like to see a more comprehensive ‘Chinese imports’ program.”

The timing of the conference appeared to be right for this issue, and the speaker mix was broad and well received. The collaborative effort placed the university in a role of facilitating stakeholder cooperation through communication between government and industry. Business attendees were hungry for information about the difficult and risky area of food imports. The informal feedback that we received indicated that all food businesses find themselves working with imported foods or food ingredients, and they worry that a contamination episode and the ensuing publicity could put them out of business. No one appears to be comfortable with the current import situation. Even if they believe they know who their suppliers are, this can change without notice when their suppliers start to import one or more ingredients from other countries for a cheaper price, without disclosing that fact or labeling the resulting product accordingly. In addition, some ingredients can now be sourced only from China, which is a problem, especially since trust in third-party inspectors is low. There appears to be demand from both the private sector and the public for more information on this topic.

### **III. Expectations for academic year 2009-10**

- Plans for documentation of the spring '09 conference with a paper published in a journal such as Food Protection Trends (Lorna and Ellin).
- Editing of chapters (from spring '09 conference) as submitted by speakers for the Wiley-Blackwell book (Lorna).
- Travel to China for Steph (postponed from this year, and including use of a grad student);
- An additional paper on container security (Vicki and a grad student).
- Fall speaker for the Retail club in Consumer Science from the retail industry (e.g., Target or SuperValu) to discuss experiences with recalls of imported products).
- Spring speaker for FRI "FRESH" speaker series, possibly Irv Rosenthal of Wharton to address third-party inspection, an issue of interest to the food industry.
- Panel of local experts and possible visitors to address local food issues in comparison to imported foods. This would most likely be scheduled for an evening in the first half of October, and be directed to the generally public, possibly in association with the Big Read. Possible panel participants include Lydia Zepeda, a representative of the Food and Sustainability Working Group on campus, a speaker on traditional approaches to food safety (kitchen cleanliness, how to cook meat safely), a representative of REAP in Madison, and one or more industry representatives.
- Grainger Center to bring in one or more speakers addressing supply-chain issues, as a way to forge closer links with the School of Business.
- One or more informal working groups (small numbers of attendees, most likely not open to the public) addressing world trade in food, governance, and risk issues. One working group may involve some of the industry representatives who attended the May meeting, to talk about further areas of cooperation. Another working group being considered would focus more on international governance, and might involve Ellen Vos (Faculty of Law, University of Maastricht, Netherlands), Tracey Epps (Faculty of Law, University of Otago, New Zealand), Timothy Büthe (Department of Political Science, Duke University), Alberto Alemanno (Department of Business Law and Taxation, HEC Paris).

#### IV. Budget status

**Table 1: Summary of spending in year 1**

<b>Personnel</b>	Title	Annual Time	Y1 Amount Requested	Y1 Amount Spent
PI: Vicki Bier (CHPRA, Industrial and Systems Engineering), student support, and associated expenses	Prof	Year 1	\$0	\$0
PI: Stephanie Tai (Law School)	Asst. Prof	1 month	\$0	\$0
CHPRA administrative support	To be determined	20% time		\$0
Lorna Zach (CHPRA, School of Engineering)	Asst. Scientist	1 month	\$5,833	\$5,890
M. Ellin Doyle (Food Research Institute)	Researcher	1 month	\$4,310	\$4,310
<i>Personnel Subtotal</i>			<i>\$10,143</i>	<i>\$10,200</i>
<b>Conference and Speaker Expenses</b>				
Conference venue and meals			\$5500	\$350
Expenses for conference speakers			\$8,000	
Promotion for conference			\$333	
Invited speaker travel expenses for non-conference events			\$1,500	\$1,397
<i>Conference and Speaker Subtotal</i>			<i>\$15,333</i>	<i>\$1,747</i>
<b>Total Requested/Spent</b>			<b>\$25,476</b>	<b>\$11,947</b>
<b>Requested Rollover</b>	\$13,527			

**Rollover request:** We would like to request a rollover of  $\$25,474 - \$11,947 = \$13,527$ . This amount reflects about \$9,000 in expenses that have already been incurred for the May workshop, but have not yet been debited from our account due to the short time elapsed since then (less than a month), and about \$4,527 that was under-spent compared to our original budget (due to lower than expected travel costs and extensive matching funds).

**Table 2: Additional matching funds and sponsoring organizations**

<b>SPONSORING ORGANIZATIONS</b>	<b>AMOUNT (\$)</b>	<b>PURPOSE</b>
Center for Freight Infrastructure Research and Education	\$4,151	Salary support for conference organization (Dr. Zach)
Center for Human Performance and Risk Analysis	\$7,410	Salary support for conference planning and research on container security
Center for International Business Education and Research	\$750	Speaker travel expense
Center for Risk and Economic Analysis of Terrorism Events	\$69,733	Salary support for Prof. Bier and a graduate student for research on container and border security
China Initiative	(est.) \$500	Speaker travel expense
College of Engineering	\$6,042	Salary support for conference organization (Dr. Zach)
Department of Engineering Professional Development	\$1,020	Salary support for conference organization (meals, logistics, and audiovisual assistance)
Department of Industrial and Systems Engineering	\$9,025	Salary support for conference organization, research, and publications (Dr. Zach)
European Union Center of Excellence	\$1,360	Speaker travel expense
Food Research Institute	(est.) \$500	Speaker travel expense
Law School	\$494	Support for a student hourly to work with Prof. Tai on food safety in the law
Vilas Associate	\$47,694	Salary support for Prof. Bier and a graduate student for research on container and border security
<b>TOTAL Matching Funds</b>	(est.) \$148,680	

## **Appendix: Conferences, Seminars, and Speaker Series Sponsored/Cosponsored by WAGE**

### **1) Conference April 30 - May 1, 2008, *Treatment and Disposal of Food Products Contaminated by Biological Threat Agents***

**Sponsor:** Center for World Affairs and the Global Economy (WAGE), Department of Civil & Environmental Engineering, School of Journalism & Mass Communication, Food Research Institute, Center for Human Performance & Risk Analysis, Industrial & Systems Engineering and Engineering Professional Development

**Cost:** \$295

This workshop provided a forum to discuss each major element of a response to a contaminated food product incident, from testing to final disposal. The discussion will feature crisis communications, regulatory and legal response, and technical considerations. Specific topics were:

- Major obstacles in disposal and decontamination of food products
- Issues with inter-jurisdictional coordination of regulating agencies
- Risk communication and public relations
- Disposal and decontamination contacts in emergency events.

The discussion identified future research needs and areas requiring more study and policy or technology development.

### **2) Law 940: Law and Contemporary Problems, Fall 2008**

#### **Transnational Regulation: Increasing the Safety of Globally Sourced Products**

Course description: This seminar will explore ways to increase the safety of products produced through global supply chains and imported into the United States and Europe. Recent incidents indicate that globally sourced products can create serious safety issues and present regulatory challenges. Imports from global supply chains cross several borders and their regulation is affected by both national and international law. To understand the special challenges of transnational regulation of this type, we will focus measures to ensure the safety of foodstuffs entering the US and EU markets with special attention to products originating in China. We will look at food safety law in the US, EU and China, explore such measures as improved testing and self-regulation by firms, better and more effective regulation by both exporting and importing countries, increased harmonization, and the role of the WTO and other global actors.

3) **Managing Challenges of Import Safety in a Global Market**  
Speaker Series – Fall 2008

All events took place in Law 2260 from 12:00 PM – 2:00 PM.  
All events were free and open to the public.

**“Alternative Forms of Regulation: A Roundtable on Innovation in Food Safety”**

Cary Coglianese, University of Pennsylvania Law School  
Thursday, September 25

Cary Coglianese serves as Associate Dean and Edward B. Shils Professor of Law and Professor of Political Science at the University of Pennsylvania Law School. Mr. Coglianese specializes in the study of regulation and regulatory processes, with a particular emphasis on the empirical evaluation of alternative regulatory strategies and the role of disputing, negotiation, and business-government relations in regulatory policy making. He is the founder and co-chair of the Law & Society Association’s international collaborative research network on regulatory governance, and he is a founding editor of the international, peer-reviewed journal, *Regulation & Governance*. His work has appeared in, among other journals, the *Administrative Law Review*, *Duke Law Journal*, *Law & Society Review*, *Michigan Law Review*, *University of Pennsylvania Law Review*, and *Stanford Law Review*.

**“Managing Food Safety From Within a Company”**

Dale Morton, Quaker Oats / PepsiCo  
Thursday, October 23

R. Dale Morton serves as Group Manager of Microbiology and Thermal Processing for Quaker Oats and Director of Food Safety at PepsiCo. He is a graduate of Ohio University and the University of Maryland at College Park. Mr. Morton’s career started at the National Food Processors Association, where he spent nine years as a Project Microbiologist. Before joining Quaker Oats, Mr. Morton also worked for five years as Microbiologist and HACCP Coordinator for Armour Dial in Scottsdale, Arizona.

**“Regulating Food Safety in China”**

Yuanyuan Shen, Brandeis University  
Thursday, October 30

Yuanyuan Shen is a Lecturer in Economics at Brandeis University and a Lecturer in Law at Harvard Law School. Ms. Shen is a graduate of the People's University in Beijing and Harvard Law School and holds a doctorate in law from the University of Wisconsin. She has written extensively on human rights and women's issues in contemporary China.

**“How is the WTO SPS Agreement Used to Protect Free Trade as well as to Protect Our Resources from Invasive Vectors on Imported Goods?”**

Shirley Wager-Page, USDA Animal and Plant Health Inspection Service

Thursday, November 6

Mike Firko is Assistant Director of Biological and Technical Services for the Animal and Plant Health Inspection Service (APHIS) of the United States Department of Agriculture (USDA), a service with a broad mission that includes protecting and promoting U.S. agricultural health, regulating genetically engineered organisms, administering the Animal Welfare Act and carrying out wildlife damage management activities. In 2006, Mr. Firko accepted an Intergovernmental Solutions Award on behalf of APHIS from the American Council for Technology (ACT). The award recognized the ePermits system, an online verification tool which enhances the integrity and efficiency of the APHIS permits process.

**“Deadly Food and Product Liability: A Law-in-Action Perspective”**

Denis Stearns, Marler Clark LLP

Thursday, November 13

Denis W. Stearns is a principal in Marler Clark LLP. Mr. Stearns received an undergraduate degree in philosophy from Seattle University and a law degree from the University of Wisconsin Law School. As a trial attorney, Mr. Stearns has extensive experience with complex litigation, in both state and federal court. Notably, Mr. Stearns was one of the lead attorneys who represented Foodmaker Inc. in the widespread litigation that arose from the January 1993 Jack in the Box E. coli 0157:H7 outbreak. Mr. Stearns has also written several articles regarding product liability law and subjects related to foodborne illness litigation.

**“Current Issues in the U.S. Congress”**

Benjamin Cohen, Center for Science in the Public Interest

Thursday, November 20

Benjamin Cohen is a Senior Staff Attorney at the Center for Science in the Public Interest, a non-profit organization that seeks to educate the public, advocate for government policies that are consistent with scientific evidence on health and environmental issues, and counter industry’s powerful influence on public opinion and public policies. Mr. Cohen offers commentary and analysis on U.S. food safety laws and has testified before committees of the United States House of Representatives.

#### 4) Food Import Safety: Systems, Infrastructure, and Governance

Tong Auditorium in the Engineering Centers Building  
University of Wisconsin - Madison  
Sponsored by the Center for World Affairs and the Global Economy (WAGE)  
May 26 and 27, 2009 (1.5 days)

**Registration began at 7:45am**

#### **Agenda**

8:15am Welcoming remarks:

Lorna Zach, Scientist, Center for Human Performance and Risk Analysis;

Steve Ingham, Administrator, Food Safety Division, Wisconsin Department of  
Agriculture, Trade and Consumer Protection

Tuesday 8:30am: **Opening Plenary—Understanding the Scope of the Problem:**

8:30am Wenran Jiang, Mactaggart Research Chair, China Institute, University of  
Alberta. *The Impact of the Chinese Development Model on Food Safety*

9:15am Joe Corby, Executive Director, Association of Food and Drug Officials.  
*Experiences with Food Import Violations in New York State*

10:00 Break

#### **Industry Panel:**

10:30am Gale Prince, Food Product Safety Pioneer, Moderator, *Changing  
Challenges with Food Import Safety*

11:00am Dale Morton, Director of Food Safety Programs, Quaker Tropicana  
Gatorade and Pepsi Cola North America *Internal Company Management, Suppliers,  
and Trade Associations*

11:30am Joe Shebuski, Director, Global Food Safety Products and Processes,  
Department of Food Safety and Regulatory Affairs, Cargill, Inc. *The world-wide  
melamine contamination issue and Cargill's supplier agreements*

12:00am Scott Hood, Manager Microbiology Quality and Regulatory Operations,  
General Mills, Inc. *International Supplier Quality Issues and Ethics*

12:30 Lunch

Tuesday 1:30pm: **Issues in Detection and Enforcement**

1:30pm William Njanje, Associate Professor of Agribusiness Finance, Morrison School of Management and Agribusiness, Arizona State University. *Intelligent Sampling of Fresh Produce*

2:00pm Wayne Ellefson, Senior Client Manager, Covance, Inc. *Testing and Detection Technologies.*

2:30pm John Spink, PhD. Associate Director & Assistant Professor, Anti-Counterfeiting and Product Protection Program, School of Criminal Justice, Michigan State University. *Defining Food Fraud & The Chemistry of the Crime.*

3:15pm Break

**3:45pm Moderated Discussion: How to Achieve Stakeholder Cooperation**

Moderator: Vicki Bier, Director, Center for Human Performance and Risk Analysis, University of Wisconsin-Madison

4:45pm Adjourn

7:00pm Dinner for conference registrants and speakers at the Inn Towner Hotel, 2424 University Avenue, Madison, WI 53726

Wednesday 8:30am: **The Way Forward**

8:30am William Sperber, Global Ambassador for Food Protection, Cargill, Inc. *Proposed World Organization for Food Protection*

9:00am Rhodri Evans, Chief Specialist, Toxicology, Food Safety Authority of Ireland. *Experience of Food Safety Authorities in Europe*

9:30am Miriam Haritz, Faculty of Law, University of Maastricht, Netherlands. *Food Safety, Trust, and the European Union.*

10:00am Neal Fortin, Director and Professor, Institute for Food Laws and Regulation, Michigan State University. *The Regulation of Food Imports: Past, Present, and Future.*

10:30am Belem Avedaño, International Food Policy Research Institute (IFPRI), Baja, Mexico, *The Role of Public-Private Partnerships on Access to Fresh Produce Export Markets for Small Latin American Producers*

11:00am Break

**11:30am Closing Plenary**

Shaun Kennedy, Director, National Center Food Protection and Defense,  
University of Minnesota, *Emerging Global Food System Risks and Potential  
Solutions*

**12:00pm Adjourn**

**Sponsoring organizations at the University of Wisconsin-Madison:**

Center for World Affairs and the Global Economy (WAGE)  
Center for Freight Infrastructure Research and Education (CFIRE)  
Center for Human Performance and Risk Analysis (CHPRA)  
Center for International Business Education and Research (CIBER)  
China Initiative  
College of Engineering  
Department of Engineering Professional Development  
Department of Industrial and Systems Engineering  
European Union Center of Excellence (EUCE)  
Food Research Institute (FRI)



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