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Protecting Senior Citizens from Foodborne Illness

Who cares and why?

Food safety matters to every one of us every day, and is a priority research area for USDA. According to new estimates from the Centers for Disease Control and Prevention, about 48 million people (1 in 6 Americans) get sick, 128,000 are hospitalized, and 3,000 die, each year as a result of foodborne illnesses.

Many of these illnesses can be prevented through safe food handling and proper cooking, storage and preparation techniques. However, many consumers are simply unaware of these safety techniques and of the risks that improperly handled or prepared food can present.

In the Department of Family and Consumer Sciences at Tennessee State University, Dr. Sandria Godwin's research focuses on food safety and increasing consumer awareness. In the past decade, TSU researchers have become national leaders in the field of food safety, with special emphasis on improving consumer knowledge and practices.

What has the project done so far?

Since the incidence and rate of sickness and mortality associated with foodborne illnesses increases with a person's age, much of Tennessee State University's recent work has focused on older adults. As the older population continues to increase, it is important to ensure that this special at-risk population and those who help care for them have access to food-safety education.

Research directed by Dr. Sandria Godwin found that although older adults identified health-care providers as a desired source of information about food safety, other research suggests that physicians who treat patients at high risk for foodborne illness do not routinely provide information on food safety or the resulting illnesses.

TSU's goal was to integrate food-safety education into preventive health care for adults 60 and older. Incorporating the best available official guidance,

TSU created an educational brochure titled "Food Safety Because You Care!" and a website



containing information available for printing and distribution by healthcare providers.

Additionally, with funding from FDA and the USDA National Integrated Food Safety Initiative, TSU researchers coordinated with a national team of scientists from RTI International and Kansas State University to conduct a national survey of U.S. adults, examining consumer practices related

to the storage and consumption of 10 categories of refrigerated ready-to-eat foods.

Research efforts are now focused on the safety of poultry and eggs, the safety of foods purchased over the internet, development of rapid assessment methods for pathogens and the presence of antibiotic resistant pathogens in fresh produce.

Impact Statement

By identifying common improper food handling practices and communicating this information to consumers, health care professionals and caregivers, this research reduces the risk of contracting foodborne illnesses.

- "Take Control of Food Safety," a booklet produced by this program, incorporates food safety information into an attractive and entertaining guide. The guide is used to help seniors avoid life-threatening foodborne illnesses by consuming fewer potentially hazardous foods, using a refrigerator thermometer, and storing foods properly.
- Health care providers are better informed about food safety, and are sharing the educational materials
 prepared by TSU researchers with the older adults for whom they care. Equipping health care providers
 with information on foodborne illness prevention and working with them to disseminate this information to
 older adults will result in safer food consumption and handling practices among older adults.
- A complete educational curriculum was developed by Tennessee State University on the topic of food safety during disasters: "What Will You Do When a Disaster Strikes? A Quick Reference Guide to Help Keep You and Your Food Safe." This material is being used by Cooperative Extension agents and community educators throughout the United States. Consumers report being better prepared for disasters and feeling more confident that they will avoid getting sick from eating food that was not handled properly
- Listeriosis is a serious infection that sickens an estimated 2,500 people per year and is the cause of death of approximately 500 people annually. Of the nineteen high-risk foods, deli meat sliced for over-the-counter sale at retail establishments presents a comparatively higher risk of listeria relative to deli meat that is prepackaged at processing plants for retail sale. Dr. Sandria Godwin's research was instrumental in helping the Food Safety and Inspection Service (FSIS) of the USDA and the FDA to protect public schools from listeriosis, a foodborne illness. The FSIS utilized TSU survey data to update its "deli meat pathway model" which provides deli-meat risk managers with a practical decision-support tool to understand and evaluate such relative risk between these two particular forms of RTE meat.

Want to know more?

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Strategic Priority: Food Safety, Nutrition and Health

Additional Links:

http://www.tnstate.edu/agriculture/research_projects_improve_food_safety.aspx http://www.umes.edu/ard/Default.aspx?id=46285

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