Food Safety Attitudes and Food-Handling Behavior of U.S. Residents 65 and Older: Areas of Concern

Investigator: Joye Gordon
Kansas State University
“Food safety education for the prevention of foodborne illness among U.S. residents 65 and older”

This project was partially funded through a grant from the National Integrate Food Safety Initiative (Grant No. 92-977-3554) of the Cooperative State Research, Education, and Extension Service, U. S. Department of Agriculture.

Other Principal Investigators

Kristina Boone
204 Umberger Hall
Kansas State University
Manhattan, KS 66506
Phone: (785) 532-1163
Fax: (785) 532-5633
kboone@oznet.ksu.edu

Karen Penner
216 E Call Hall
Kansas State University
Manhattan, KS 66506
Phone: (785) 532-1672
Fax: (785) 532-5681
kpenner@oznet.ksu.edu

Valentina Remig
206 Justin Hall
Kansas State University
Manhattan, KS 66506-1407
Phone: (785) 532-0172
Fax: (785) 532-3132
remig@ksu.edu
“Food safety education for the prevention of foodborne illness among U.S. residents 65 and older”

1. Research
   – Telephone survey
   – Focus groups

2. Extension
   – “To Your Health: Food Safety for Seniors”

3. Education
   – CD development and distribution
Research

• Objectives
  – Identify current behaviors
  – Understand the cognitive variables that are correlated with adaptive or maladaptive behaviors

• Methodology
  – Telephone interviews
  – Focus groups
  – Experimental field study
Variables of interest

• Risk perception
• Attitudes
• Knowledge
• Behavior
Telephone survey

- Random sample
- 65 or more years
- 5 or more meals a week
- Reside in 48 contiguous states of USA
- 353 participants
  - 70% female
  - 30% male
- Mean age 74.3 years
- Average preparation of 12 meals per week
Risk perceptions

• 56% said micro-organism contamination serious or very serious
• Chicken was perceived as most hazardous
• Fresh fruits and vegetables judged least hazardous
• More concern for food prepared outside of the home
Attitudes

• Generally adaptive
• Education level finding
  – More education, less adaptive attitudes
  – “I am not concerned if I thaw perishable food on the kitchen counter”
  – “It is not important to cover a cut or sore on my hand before I prepare food”
Knowledge

- 57% did not know proper temperature for ground beef
- 60% said cook-by-look acceptable
- Thought perishables at room temp for 2 hours was safe to eat
Behavior

• 37% eat undercooked egg
• 26% eat uncooked cookie dough
• 26% eat raw sprouts or alfalfa
• 49% do not check refrigerator temp
• 90% cook-by-look
Findings to take to the field

• Specific foods
  – Undercooked eggs
  – Raw sprouts
  – Raw fruits and vegetables

• Preparation habits
  – Thermometer use/cook-by-look
  – Leaving foods at room temperature

• Education level
Telephone Survey Article


• http://www.aiaee.org/2004/Accepted/060.pdf
Focus Groups

- Eight focus groups
- 14 theme-centered areas
  - General food safety concern
  - Amount of perceived control
  - Meat thermometers
  - Approaches to changing behavior
  - Information sources
Findings to take to the field

• Overall concern topics centered on
  – Cleanliness
  – Microorganisms
  – Public cooking-restaurants and vendors
  – Cook by look

• Responses to video
  – New information/provided needed repetition
  – Lengthy/condescending
Focus Group Article

Extension education program

- Followed up with seniors receiving the booklet
- Little evidence that one-time exposure in real-world environment impacts food-safety attitudes, perceptions, or behaviors
Educational CD

Food Safety Education

Student
Instructor
Module 2: Food Safety Beliefs, Knowledge, and Food Handling Practices of the General Population

Click on the activities throughout this presentation to enhance your learning experience. Please be aware that the activities need time to load. It is also recommended that you disable any pop-up blockers during viewing this presentation.

After reviewing all the information, you can review specific sections by using the links to the right under 'On this Page'. Clicking on each link will take you directly to that section.

Roll your cursor over bolded text to see additional information. Click on the speaker icon to hear audio that will give you additional information. After the audio clip is completed, you may need to click on your back button to return to the presentation.

In this module, we will review the following areas: food safety beliefs, food safety knowledge, and food handling practices of the general population; thermometer use, food safety in industry, and government food regulations.
How sick can I get from eating contaminated food?

There are many factors that determine this. Your age, general health, and how much contaminated food you ate are all factors. You may not get all the symptoms previously discussed. At-risk people can become very ill and can even die from foodborne illness because their immune systems are less likely to be able to fight off the pathogen.
Ordering Activity

Put items in order from the highest contributor to food safety problems to the least contributor. Drag items from the left column to the right when ordering.

- contaminated cooking equipment
- poor personal hygiene
- inadequate cooking temperature
- improper holding temperature

Do people really talk about food safety?

FDA Study/Utah

To answer this question:
- 100 persons preparing food:
  - before cooking, only 45% of persons washed their hands; of those, 16% didn't use soap
Who is more likely to consume undercooked hamburgers?

- a. females
- b. males

Check Answer  Reset

Health People 2010 Food Safety Goals

The government has identified 7 food safety goals.

Objective 10-1: Reduce infections caused by key foodborne pathogens by 50%.
Objective 10-2: Reduce outbreaks of infections caused by key foodborne bacteria
Objective 10-3: Antimicrobial resistance of Salmonella species
Objective 10-4: Food allergy deaths
Objective 10-5: Increase the proportion of consumers who follow key food safety practices
Objective 10-6: Improve food employee behaviors and food preparation practices that directly relate to foodborne illnesses in retail food establishments
Objective 10-7: Organophosphate pesticide exposure
QUESTIONS?

Joye C. Gordon
Associate Professor
Kansas State University
gordon@ksu.edu

“Food safety education for the prevention of foodborne illness among U.S. residents 65 and older”