

Egg Safety Memo



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Subject: Egg Safety Memo

Dear Extension Colleague:

You have no doubt heard, by now, of the voluntary ½ billion egg recall from the Wright County Egg Farm in Galt, Iowa. I have put together a concise outline of facts and resources for your use. Unfortunately, there is a lot of unreliable information available on the internet concerning agriculture and food safety, but I believe the material in this memo to be accurate. Hopefully, this document will be of use to you when answering stakeholder questions. Please call me at 979-845-4319 or email me at mfarnell@poultry.tamu.edu if you have any further questions or concerns.

Sincerely,

Morgan Farnell, Ph.D.
Texas AgriLife Extension Service

Industry Facts:

- Per capita egg consumption is 248 eggs
- There are approximately 282 million egg laying hens in the US
- Egg companies produce 75 billion eggs per year
- Texas is 6th in egg production with approximately 14 million layers
- Caged poultry housing has benefits such as better biosecurity, environmental control, automation, reduced exposure to parasites, reduced exposure to bacteria, cleaner eggs, etc.
- The US egg industry is already regulated by multiple entities including: trade associations, customers, third party auditors, FDA, TSSWCB, TCEQ, EPA, etc.

Salmonella Facts:

- Foodborne pathogens are difficult to control in poultry because:
 - Many are considered “commensal” organisms in poultry. They don’t harm their host, so the chicken’s immune system doesn’t attempt to remove these microbes.
 - Medications are not available to eradicate the bacteria in poultry.
 - Salmonella vaccination of poultry is promising, but not extensively used due to problems with selecting the correct strain, conflicts with testing methods and proper administration of the product.
 - Foodborne pathogens are ubiquitous in our environment and are easily spread by: boots, tires, floor mats, pets, wildlife, mice, rats, insects, wild birds, contaminated feedstuffs, etc.
 - The reproductive tract and digestive tracts terminate at a common structure that is called the “cloaca”. The locations of these two systems can result in fecal contamination.
 - In addition to fecal contamination, the egg could be contaminated within the oviduct.
- The FDA Salmonella ruling recently went into effect to reinforce standards of good practice, many of which are already in place and being done by producers.
- Its estimated that only 1 egg out of every 20,000 is contaminated with Salmonella
- There are approximately 2,400 strains of Salmonella known
 - Only a small percentage are known to cause illness

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- Raw meat and eggs should never be considered sterile and should not be consumed unless fully cooked.
- Salmonellosis usually causes fever, aches and a self limiting diarrhea in humans
 - By the time (~3 days) that the laboratory has determined if the diarrhea was, in fact, caused by Salmonella the bacteria will typically be cleared
 - Doctors typically do not prescribe antibiotics to treat foodborne illness for people with an intact and functioning immune system.

FDA Egg Food Safety Tips:

- Don't eat recalled eggs or products containing recalled eggs.
- Keep shell eggs refrigerated at $\leq 45^{\circ}$ F ($\leq 7^{\circ}$ C) at all times.
- Discard cracked or dirty eggs.
- Wash hands, cooking utensils, and food preparation surfaces with soap and water after contact with raw eggs.
- Eggs should be cooked until both the white and the yolk are firm and eaten promptly after cooking.
- Do not keep eggs warm or at room temperature for more than 2 hours.
- Refrigerate unused or leftover egg- containing foods promptly.
- Avoid eating raw eggs.
- Avoid restaurant dishes made with raw or undercooked, unpasteurized eggs.
- Consumption of raw or undercooked eggs should be avoided, especially by young children, elderly persons, and person with weakened immune systems or debilitating illness.

How to Determine if Your Eggs Have Been Recalled:

- Identify the plant number and Julian date on the carton
- Then go to the FDA website to view the recall list and see if the numbers match what is on the carton
 - <http://www.fda.gov/Food/NewsEvents/WhatsNewinFood/ucm223536.htm>

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Pertinent Texas AgriLife Extension Materials - <https://agrilifebookstore.org/>

- L-5323 - Poultry Q&A
- L-5004 - Prepare Meat and Poultry Safely
- L-5088 - Enjoy Poultry Meat Safely
- L-5090 - Freezing Poultry for Home Use
- E-123 - Keep Foodborne Illness from Spoiling Holiday Parties
- SP-200 - Fight Foodborne Illness! (CD)
- SP-61 - Food Safety: It's Our Business
- L-5214 - Economic Impact of the Texas Poultry Industry

Recommended Websites:

- **CDC**
 - <http://www.cdc.gov/Features/SalmonellaEggs/>
 - <http://www.cdc.gov/salmonella/enteritidis/>
 - http://www.cdc.gov/nczved/divisions/dfbmd/diseases/salmonella_enteritidis/
- **FDA**
 - <http://www.fda.gov/Food/FoodSafety/Product-SpecificInformation/EggSafety/EggSafetyActionPlan/ucm170746.htm>
 - <http://www.fda.gov/Safety/Recalls/MajorProductRecalls/ucm223522.htm>
 - <http://www.fda.gov/Food/ResourcesForYou/Consumers/ucm077342.htm>
 - <http://www.fda.gov/Food/NewsEvents/WhatsNewinFood/ucm223723.htm>
- **Federal Agencies**
 - <http://www.foodsafety.gov/>
- **Poultry Industry**
 - <http://www.eggsafety.org/>
 - <http://www.unitedegg.org/default.cfm>
 - <http://www.poultryegg.org/>
 - <http://www.texaspoultry.org/>
 - <http://www.aeb.org/>
 - <http://www.aeb.org/foodservice-professionals/egg-safety>

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- *Texas AgriLife Extension Service*
 - <https://agrilifebookstore.org/>
 - <http://gallus.tamu.edu/extensionprograms/index.htm>
- *USDA*
 - http://www.agcensus.usda.gov/Publications/2007/Full_Report/index.asp
 - http://www.fsis.usda.gov/Fact_Sheets/Salmonella_Questions_&_Answers/index.asp