

Good Agricultural Practices (GAP) Food Safety Plans and Audits

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Introduction

The American food supply is safer than at any time in history, but people remain concerned about food safety after recent foodborne illness outbreaks and other harmful incidents widely publicized in the media and on the Internet. Companies have found that when one company with a safety issue is mentioned in the news, companies that produce similar products also get hurt in the marketplace. For example, an incident of *Escherichia coli* O157:H7 contamination a few years ago involving spinach led to several years of lower spinach purchases by the public. The food industry is very competitive, but when it comes to food safety, companies, universities and producers must work together to improve safety. A **Good Agricultural Practices (GAP)** plan is one tool the industry has used to increase the certainty of food safety.

Physical hazards may involve rocks, glass and other foreign objects in the food product. Overall, the vast majority of recalls are due to either undeclared allergens or microbial contamination.

By following GAP procedures, producers can minimize the risk of these hazards entering the food supply.



What Is GAP?

GAP stands for "Good Agricultural Practices." This set of practices is meant to reduce biological (virus, bacteria, protozoa), chemical and physical hazards resulting from production and harvesting practices.

The most common hazard is microbiological and includes viruses such as norovirus and Hepatitis A virus as well as bacteria including *E. coli* O157:H7, *Salmonella* spp and *Listeria monocytogenes*. Chemical hazards involve pesticide and herbicide residues and gas/oil spills.

Food Safety Plans and Audits

Producers of fresh produce are legally liable for the safety of their products. In order to reduce legal involvement and be able to sell to most retailers, a producer needs to develop a food safety plan.

The plan is a written narrative describing farm policies and

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procedures involved in the day-to-day operation of production and harvesting. In addition, producers should document their water-sampling activities, fertilizer application dates and crop-harvesting times, among other routine practices.

Food safety plans will also help producers provide information for food safety audits. Most retailers require producers to have a food safety audit conducted prior to their purchasing the produce. There are several brand names and types of audits, so it is essential to get the detailed information up front on exactly what the audit will include.

Typically, an audit is performed by a third party who is not an employee of the retailer but represents the company involved. The audit will consist of going over the producer's food safety plan and other required documentation. The auditor will also spend time observing the operation and employee practices. Audits are usually conducted during the growing season.

Sources of Food Safety Assessment and Plan Information

Before beginning to write a food safety plan, you should determine the buyer requirements. If you are not required to have a commercial third-party audit, the Produce Self-Assessment Program may help you to understand any food safety weaknesses. Larger growers may be required by the retailer to have a specific type of GAP audit. More details are available at <http://www.uark.edu/ua/gap>.

The following resources offer information that can be helpful for producers interested in creating a food safety plan:

- **Arkansas Produce Self-Assessment Program** – If you are a small grower and sell to farmers' markets, restaurants, school systems or

other small groups, you may wish to do a self-assessment. The University of Arkansas Division of Agriculture has developed a two-page voluntary checklist to help identify possible food safety issues. The checklist and helpful tips can be found online at <http://www.uark.edu/ua/gap/Volunteer%20Certification%20Program/index.html>.

- **USDA GAP** – The U.S. Department of Agriculture offers an extensive GAP audit program that may be acceptable to some retailers. Details of the program can be found at <http://www.ams.usda.gov/AMSV1.0/HarmonizedGAP>.
- **Commercial GAP Audits** – These third-party audits are required by most large-scale retailers. Third-party audit companies include GlobalGAP (www.globalgap.org/uk_en/), SQF (www.sqfi.com) and PrimusLabs (www.primuslabs.com). The companies follow standards or use benchmarks approved by the Global Food Safety Initiative (GFSI), an organization that has helped standardize worldwide food safety audits.
- **FamilyFarmed** – This nonprofit organization offers an online tool to help small farmers write food safety plans. The tool uses a decision-tree style questionnaire to help develop a personalized food safety plan. More information can be found at <http://onfarmfoodsafety.org/how-to-get-food-safety-certified/>.
- **FDA GAP** – As part of the new Food Safety Modernization Act, the Food and Drug Administration has proposed a rule to require produce growers to follow certain practices to prevent microbial contamination of produce that is not always cooked prior to consumption. Details of the proposed regulations can be found at <http://www.fda.gov/Food/GuidanceRegulation/FSMA/ucm334114.htm>.

Reference to web sites not related to the Division of Agriculture that may be of use to you are made with the understanding that no discrimination is intended and no endorsement is implied.

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