

FSMA PRODUCE SAFETY TOOLKIT

for Almond Growers





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PRODUCE SAFETY IN A NUTSHELL

WHAT: Under the Food Safety Modernization Act (FSMA), the Produce Safety Rule provides the first-ever mandatory federal standard for the growing, harvesting, packing and holding of fresh produce, including nuts. The rule focuses on efforts to reduce risks associated with microbial contamination at the farm level.

WHO: The Produce Safety Rule applies to farms, including almond growers and other primary or secondary activities farms, such as some hullers/shellers and some brownskin almond facilities. However, a Commercial Processing Exemption may be available for some farms (see Page 8 for details).

WHEN: The FDA established Produce Safety Rule compliance dates for farms based on crop value:

Large Farms (>\$500,000) – Jan. 26, 2018

Midsized Farms (\$250,000-\$500,000) – Jan. 28, 2019

Small Farms (\$25,000-\$250,000) – Jan. 27, 2020

ADDITIONAL COMPLIANCE DATES

Growers will have additional time to comply with Agricultural Water quality testing requirements. Compliance dates for testing are as follows:

Large Farms – Jan. 26, 2022

Midsized Farms – Jan. 26, 2023

Small Farms – Jan. 26, 2024

HOW: Here is the general approach for Produce Safety Rule compliance:

1. Assess risks on your farm and implement practices to reduce those risks
2. Establish and implement monitoring programs to reduce risks on your farm
3. Maintain records

DID YOU KNOW that principles established in the Produce Safety Rule align well with Good Agricultural Practices (GAPs) for almonds? Growers who implement the Almond Board of California's GAPs program are already well ahead of the curve and may only need to make minor updates to their practices.

AM I A FARM?

PRIMARY PRODUCTION FARM

- Grow, harvest, hull and shell almonds in one physical location
- Handle almonds (i.e., size, sort, clean and pack brownskin almonds) in the same physical location

SECONDARY ACTIVITIES FARM

- Not located on a primary production farm; devoted to harvesting (such as hulling or shelling), packing and/or holding almonds
- Has certain ties to the farm(s) that grows the majority of the almonds harvested, packed and/or held

If you are not a primary or secondary farm, you are not subject to Produce Safety Rule compliance. However, other FSMA rules may apply.



PRIMARY FOCUS AREAS OF PRODUCE SAFETY

There are six primary focus areas under the Produce Safety Rule, which are applicable to almonds as follows:

1. Worker Health, Hygiene and Training
2. Biological Soil Amendments
3. Buildings, Tools and Equipment Sanitation
4. Domesticated and Wild Animals
5. Agricultural Water Quality
6. Growing, Harvesting, Packing and Holding Activities

1. Worker Health, Hygiene and Training

Appropriate resources must be available to support worker health and hygiene, including restrooms and hand-washing stations. In addition, all employees and farm workers, including contract laborers and custom harvesters, must be properly trained in the principles of food hygiene and safety, and all must understand their role in preventing contamination of almonds. Worker training records must be maintained at all times, especially as further training may be necessary for workers and supervisors to properly conduct their jobs.

2. Biological Soil Amendments

The Produce Safety Rule requires that growers assess risks related to the use of biological soil amendments and implement appropriate practices for their use. Biological soil amendments must be handled, stored and transported in a manner that prevents them from becoming a source of contamination. Growers' use of biological soil amendments of animal origin is allowed if, *before use*, the amendments are treated to a scientifically validated process for pathogen reduction or subjected to appropriate composting practices with sufficient temperature and time exposure. Alternatively, untreated biological soil amendments of animal origin can be used if applied in a manner that does not contact almonds and is applied at least nine months prior to harvest.



3. Buildings, Tools and Equipment Sanitation

To prevent the possible contamination of almonds, the Produce Safety Rule establishes standards related to buildings, tools and equipment sanitation, paying specific attention to restroom and hand-washing facilities, waste disposal and overall building design. Growers must also implement practices to prevent the contamination of surfaces that come in contact with almonds.



4. Domesticated and Wild Animals

Under the Produce Safety Rule, if the farming activity takes place in an outdoor area or partially enclosed building, or if there is reasonable probability that animal activity could lead to contamination of the product, growers must properly monitor for potential contamination in and around their orchards and determine what to do if contamination is found. Growers are not required to exclude animals from their operation entirely but must monitor extensively for them.

5. Agricultural Water Quality

The Produce Safety Rule mandates that all agricultural water must be safe and of adequate sanitary quality for its intended use. Agricultural Water systems must be inspected annually, at least, to identify potential hazards, and microbial water quality testing must be conducted for all water sources at regular intervals. If testing results exceed established limits, remedial action is required.

Please note: Growers will have an additional four years from their compliance date to comply with the Produce Safety Rule's water quality testing requirements.

WHAT IS AGRICULTURAL WATER?

Water intended for, or likely to come in contact with, covered produce (almonds) or food contact surfaces. This includes water used for growing activities like irrigation, fertigation, crop sprays and certain activities after harvest.



6. Growing, Harvesting, Packing and Holding Activities

Prior to and during harvest, growers must take all measures to identify, and not harvest, almonds that may be contaminated by a known or foreseeable hazard. Food grade materials must be used for packing, and almonds must always be handled to protect against contamination.

For more on how to address the Produce Safety Rule's six primary focus areas, check out the Almond Board of California's FSMA page for growers: [Almonds.com/Growers/FSMA](https://www.almonds.com/growers/fsma)

TWO STEPS TO GETTING STARTED

1. Attend a FSMA Produce Safety Training

All growers should attend a FSMA Produce Safety training to better understand how the rule applies to their operation. Trainings will inform growers on how to assess risk, train employees, organize food safety activities and more.



If I plan to utilize the Commercial Processing Exemption (see Page 8), do I have to attend a training?



If I do not plan to utilize the Commercial Processing Exemption, who from my farm must attend a training?

All growers, regardless of their situation, should attend a training to understand how to reach full compliance. We anticipate the Commercial Processing Exemption may not be available beyond a few years as additional FDA requirements are implemented, so growers interested in this opportunity should plan accordingly and attend a Produce Safety training.

At least one supervisor or responsible party for your farm must successfully complete a FSMA Produce Safety training under FDA-approved, standardized curriculum. Curriculum from the Produce Safety Alliance, for example, meets this requirement.

Individuals who participate in a Produce Safety training will gain a basic understanding of:

1. FSMA Produce Safety Rule requirements
2. Microorganisms relevant to food safety: How to identify microbial risks, and how to implement Produce Safety practices on the farm to reduce those risks.
3. Elements of a Farm Food Safety Plan: What the plan includes and how growers may use it.



2. Build and Implement your Farm Food Safety Plan

Although not required, a Farm Food Safety Plan allows you to organize the compliance practices you have in place to meet Produce Safety Rule requirements.

A Farm Food Safety Plan should include the following:

1. Farm name and address
2. Farm description: size, farm map, products grown, etc.
3. Name and contact information for the manager of your Farm Food Safety Plan
4. Farm policies, including those related to hand-washing, vendor food safety practices, farm visitor procedures, etc.
5. Employee training requirements and records
6. Risk assessment of practices and environmental conditions of your farm that impact food safety, including Agricultural Water quality test results
7. Farm food safety practices, including monitoring and corrective action procedures

Keep in mind that under the Produce Safety Rule, FDA has the authority and obligation to inspect your farm.

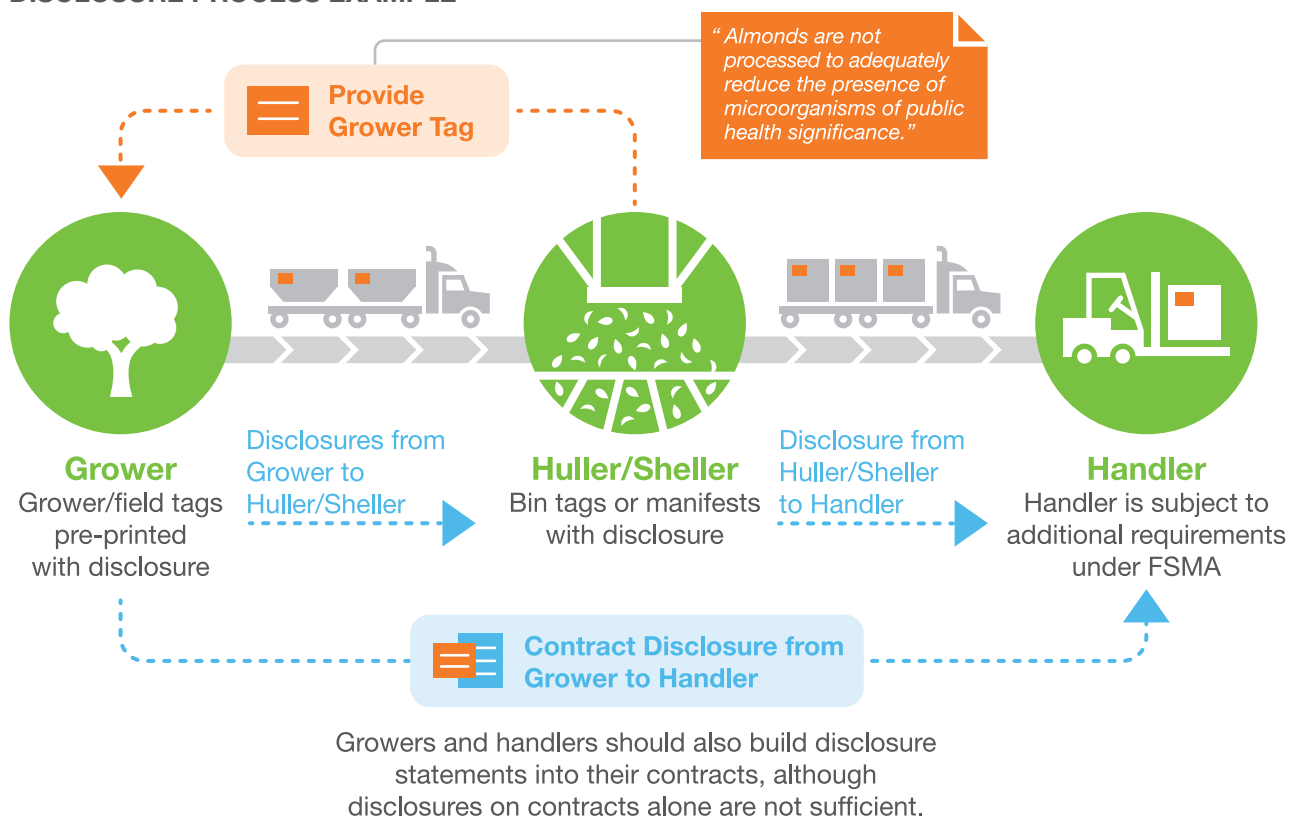


COMMERCIAL PROCESSING EXEMPTION

DEFINITION:

A Commercial Processing Exemption is currently available for growers and hullers/shellers who fall under the primary or secondary farm definition in the Produce Safety Rule. To utilize the Commercial Processing Exemption, growers must provide a written disclosure to the huller/sheller and handler that states, "Almonds are not processed to adequately reduce the presence of microorganisms of public health significance." The disclosure must be made on all documents accompanying almonds from the orchard throughout processing and beyond (i.e., grower tags, delivery statements, bills of lading, shipping manifests).

DISCLOSURE PROCESS EXAMPLE



Almond Board Recommendation: Create an Exemption Plan Summary

To utilize the Commercial Processing Exemption, prepare a one-page summary document describing your farm, how you are making the disclosure and the regulatory basis allowing the exemption. An Exemption Plan Summary will prove especially useful if your farm is visited by a federal or state inspector on behalf of the FSMA Produce Safety Rule. See the Appendix for an example of a Commercial Processing Exemption Plan Summary.

We anticipate the Commercial Processing Exemption may not be available beyond a few years as additional FDA requirements are implemented, so growers interested in this opportunity should plan accordingly and attend a Produce Safety training.

APPENDIX: ALMOND-SPECIFIC COMMERCIAL PROCESSING EXEMPTION PLAN SUMMARY

Farm Name: Freedom Farms

Farm Manager: Pat B. Safe

Farm Location(s):

1 Ranger Way, Modesto, CA 95354

Farm Description:

Freedom Farms operates a single 100-acre almond orchard in Stanislaus County; Freedom Farms utilizes one contract huller/sheller (Victory Shelling) and one handler (Leatherneck Nut Co.)

Exemption Regulatory Basis:

Freedom Farms is utilizing the Commercial Processing Exemption specified under Subpart A – General Provisions § 112.2 (b) (1) of the Produce Safety Rule. As such, Freedom Farms is only subject to specified disclosure requirements.

1. Freedom Farms is fully complying with the disclosure requirements as specified in Subpart A – General Provisions § 112.2 (b) (2).
2. Based on the Jan. 4, 2018, FDA Notification of Enforcement Discretion no written assurances are required.
 - <https://bit.ly/2OGDedG>
 - <https://bit.ly/2zj8HOW>

Written Disclosure Summary:

1. Freedom Farms utilizes field tags that accompany each load of almonds from the orchard to the huller/sheller.
 - a. Field tags are printed with the following disclosure statement: Almonds are not processed to adequately reduce the presence of microorganisms of public health significance.
2. At the huller/sheller, a manifest is generated for each outgoing load of hulled and shelled nuts.
 - a. The manifest is printed with the disclosure statement shown above.
 - b. The manifest accompanies the product from the huller/sheller to the handler facility.
3. Freedom Farms also provides the above disclosure on all contracts with Leatherneck Nut Co.

RESOURCES PAGE:

ALMOND BOARD OF CALIFORNIA:

FSMA and Produce Safety Rule: Almonds.com/Growers/FSMA

Almond Board Good Agricultural Practices (GAPs): Almonds.com/GAPs

FOOD & DRUG ADMINISTRATION:

Produce Safety Rule Standards: <https://bit.ly/2DCQEXd>

Commercial Processing Exemption: <https://bit.ly/2OGDedG>

PRODUCE SAFETY ALLIANCE:

About Produce Safety Alliance: <https://bit.ly/2kScFa8>

Resources on Writing Your Farm Food Safety Plan: <https://bit.ly/2DjIKRD>

UNIVERSITY OF CALIFORNIA DIVISION OF AGRICULTURE AND NATURAL RESOURCES:

FSMA Page: <https://bit.ly/2DAHdrt>

Resources on Food Safety in Almonds: <https://bit.ly/2zP7U7s>

Calculator for Determining Microbiological Water Quality: <https://bit.ly/2JZVTRj>



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Document #2018IR0298
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