## Michigan's Produce Safety Risk Assessment

# For fruit and vegetable producers

A voluntary and confidential produce safety program that provides confidence that inspected practices are consistent with the current U.S. Food and Drug Administration Produce Safety Rule and provides recognition with a certificate of program completion.

Extension

MICHIGAN STATE UNIVERSITY



**Michigan** On-Farm

Produce Safety





### Introduction

Regardless of the size of your farming operation, using good production, harvest and postharvest management practices that keep disease-causing organisms and other contaminants off produce will help ensure the wellness of your customers and the success of your fresh produce business.

Many grocery chains and institutional produce buyers have addressed consumer food safety concerns by requiring a certified produce safety audit from their fresh produce growers and suppliers. A number of public and private organizations can assist producers who wish to have a certified audit.

Whether or not your fresh produce buyers require a certified produce safety audit, you may be interested in demonstrating that your farming operation utilizes safe food practices. If so, then the **Produce Safety Risk Assessment (PSRA)** may be for you.

The PSRA is a voluntary program designed to educate fresh fruit and vegetable growers about food safety and to recognize those who implement produce safety management practices. Producers who successfully complete the assessment and on-site farm review receive certificates of completion that they can share with their consumers and buyers. The completion of the assessment will help you prepare for a certified produce safety audit. The PSRA is only a review of your farming practices and is not the same as a certified audit. It is also not a guarantee of food safety. To become a Produce Safety recognized producer, you must be able to demonstrate or document conformance with all of the key produce safety management practices applicable to your farm listed in the green-outlined boxes in the PSRA. The other produce safety management practices in the risk assessment (not in green-outlined boxes) are educational guestions to assist in conformance with other laws, rules or regulations. Producers are encouraged to adopt all of the low-risk management practices listed in the PSRA, but only the green-outlined box practices will be evaluated for the awarding of a certificate of completion. The Food Safety Modernization Act (FSMA) was signed into law on January 4, 2011. FSMA aims to ensure that the U.S. food supply is safe by shifting the focus from responding to contamination to preventing it. FSMA requirement/ guidelines that may affect produce farms are included in the PSRA. The FSMA, administered by the U.S. Food and Drug Administration.

#### How to get started:

The PSRA is a series of risk questions that will help you assess how effectively your management practices ensure food safety on your farm.

- Contact your local Produce Safety Technician to determine when they can meet you or another food safety representative on your farm for a PRSA
- 2. Schedule a walk-through of the farm and review the PRSA with a Technician.

3. Meet on the farm and review the assessment and parts of your operation that apply to produce safety or schedule a follow up to go through the assessment. Develop an action plan.

4. Implement action items and complete their Food Safety Plan, which continued assistance from Technician as needed

5. Technician schedules another visit with you to check that the action items and Food Safety Plan are ready to go (this may take multiple visits). Once complete, the Technician submits a certificate to be signed and approved by the State

6. The Technician will continue to be available to assist after completion. The Technician will schedule a revisit with the farm on the 3-year mark of them being awarded a Certificate. This is detailed as the 'expiration date' on the Certificate

**To schedule a Produce Safety farm review**, contact your local Produce Safety Technician. Your successful completion of this assessment, plan development/ implementation and review will support the growing public interest in healthy local foods along with associated jobs and economic activity. Thank you for your interest and participation in the Produce Safety Risk Assessment.

Michigan Department of Agriculture and Rural Development P.O. Box 30017, Lansing, MI 48909 800-292-3939

| Produce Safety Risk Assessment  |  |  |  |              |  |  |  |  |
|---|--|--|--|--------------|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |  |  |  |              |  |  |  |  |
| Risk Question   | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)   | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)   | Your<br>Risk | Produce Safety Review<br>Requirement   |  |  |  |
| 1.01) Does the farm operator<br>have a produce safety program<br>that is followed to reduce the<br>risk of food-borne illness?  | A written produce safety<br>plan (document) exists and is<br>being implemented.  | Produce safety practices are<br>generally followed, but a<br>written document needs to be<br>developed.  | A food safety plan is not<br>available.  |              | A written plan or<br>conformance with Cornell<br>bulletin "Food Safety Begins<br>on the Farm." Examples<br>include www.gaps.cornell.edu<br>or www.onfarmfoodsafety.org |  |  |  |
| 1.02) Does the farm operator<br>have a person designated<br>to implement and oversee a<br>produce safety program?   | The designated produce<br>safety person is documented<br>in the food safety plan.  | Yes, but the written document needs to be <b>developed</b> .   | There is no designated produce safety person.  |              | Code of Federal Regulations<br>(CFR) §112.23   |  |  |  |
| 1.03) Has a farm representative<br>completed the Produce Safety<br>Alliance (PSRA) training?  | Yes.   |  | No.  |              | Requirement of FSMA<br>112.22 (c)  |  |  |  |
| 1.04) Are any crop production<br>areas located near or adjacent<br>to dairy, livestock or fowl<br>production facilities and/or a<br>municipal sewage treatment<br>plant or landfill? If so, are<br>crop areas downwind of these<br>facilities in the predominant<br>wind direction? | There is no crop production<br>within 1 mile of a livestock<br>or poultry operation and/or<br>municipal sewage treatment<br>plant or landfill.<br>Or,<br>There is crop production<br>within 1 mile, but a<br>natural barrier prevents<br>contamination of produce<br>from runoff, dust or excessive<br>numbers of flies. | A commercial livestock<br>or poultry facility and/or<br>municipal sewage treatment<br>plant or landfill is located<br>within 1 mile but greater than<br>100 yards away.<br>Or,<br>There is a natural barrier that<br>prevents contamination of<br>produce. | There is crop production<br>within 1 mile.<br>And,<br>There is no natural barrier<br>to prevent contamination of<br>produce. |              | \$112.83   |  |  |  |

Definitions: A **document** may be a combination of standard operating procedures outlining company policy as well as a record indicating that a particular action was taken. A **policy** indicates that a policy/standard operating procedure (SOP) must be documented in the food safety plan to show conformance with the question. A **record** indicates a record is required to be kept showing an action was taken.

\*Produce Safety Plan = Food Safety Plan

| Worker Health and Hygiene   |  |  |  |              |  |  |  |  |  |
|---|--|--|--|--------------|--|--|--|--|--|
|   | Note: green text indicates proof of produce safety intentions.   |  |  |              |  |  |  |  |  |
| Risk Question   | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)   | <b>High Risk – 1</b><br>(significant produce safety<br>hazard) | Your<br>Risk | Produce Safety Review<br>Requirement   |  |  |  |  |
| 2.01) Does the farm operator<br>provide workers with clean<br>water to wash hands?          | Water is provided by<br>municipal water system.<br>Or,<br>Water is provided by a service<br>provider that tests their water<br>sources. Records are available.<br>Or,<br>Water is provided by an<br>on-farm well that is tested at<br>least annually and proven to<br>have no detectable generic <i>E.</i><br><i>coli.</i> Test records are on hand. | Water is provided from<br>on-farm well that is not<br>regularly tested.<br>Or,<br>Water is provided by a service<br>provider and records indicating<br>water quality are not readily<br>available to the grower. | Water is provided from<br>surface water source.                |              | Water test reports indicate<br>no detectable generic <i>E. coli</i> ,<br>or municipal drinking water is<br>documented.<br>§112.44(a)(4)  |  |  |  |  |
| 2.02) Does the farm operator<br>provide workers with clean<br>drinking water?               | Potable water is provided by a<br>municipal water system.<br>Or,<br>Potable water is provided<br>by an on-farm well that is<br>regularly tested and proven<br>potable with records.  | Water is provided from on-<br>farm well that is not regularly<br>tested.   | Water is provided from<br>surface water source.                |              | Occupational Safety and<br>Health Administration (OSHA)<br>requirement,<br>Michigan Department of<br>Environment, Great Lakes and<br>Energy (EGLE) Safe Drinking<br>Water Act. |  |  |  |  |
| 2.03) Does the farm operator<br>provide staff training on proper<br>sanitation and hygiene? | A training program is<br>delivered to all staff and<br>documented in the produce<br>safety plan.   | Informal training is provided that is not documented.  | No training is provided.                                       |              | Records indicate workers<br>are adequately training on<br>sanitation and hygiene.<br>§112.21(a)<br>§112.22(a)<br>§112.30(a)(b)   |  |  |  |  |

| Worker Health and Hygiene  |  |  |  |              |   |  |  |  |
|--|--|--|--|--------------|---|--|--|--|
|  | Note: gree   | en text indicates proof of produce                             | safety intentions.   |              |   |  |  |  |
| Risk Question  | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard) | <b>High Risk - 1</b><br>(significant produce safety<br>hazard)                       | Your<br>Risk | Produce Safety Review<br>Requirement  |  |  |  |
| 2.04) Are all visitors informed<br>of farm hygiene practices and<br>provided proper toilet and<br>hand-washing facilities?                               | Yes.   |  | No.  |              | §112.33(a)(b)<br>§112.44(a)   |  |  |  |
| 2.05) Do employees/workers<br>wash their hands before<br>beginning or returning to<br>work or after any potential<br>contamination?                      | Yes.   |  | No.  |              | Employee/worker interview(s)<br>indicate(s) satisfactory hand-<br>washing practices.<br>§112.32(b) §112.44(a) |  |  |  |
| 2.06) Are signs posted to<br>instruct employees to wash<br>their hands before beginning or<br>returning to work or after any<br>potential contamination? | Yes. Signs are posted in<br>the native language of the<br>predominant number of<br>workers.  |  | No.  |              |   |  |  |  |
| 2.07) Is employee tobacco use,<br>eating and/or chewing gum<br>confined to areas separate from<br>where produce is handled?                              | Written policy indicates the<br>use of tobacco, eating and/<br>or chewing gum is confined<br>to edges of fields out of<br>harvesting zones or in the<br>driveway areas between<br>fields.<br>In packing and storing<br>facilities, a smoking and<br>eating area is in a designated<br>area located separate from<br>the produce flow zone. | Yes, but a written policy will be<br>developed.                | No. Use of tobacco, eating<br>and/or gum chewing occurs in<br>produce contact areas. |              | \$112.32  |  |  |  |

| Worker Health and Hygiene   |  |  |   |              |   |  |  |  |
|---|--|--|---|--------------|---|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |  |  |   |              |   |  |  |  |
| Risk Question   | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard) | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)        | Your<br>Risk | Produce Safety Review<br>Requirement  |  |  |  |
| 2.08) Are workers/visitors/<br>volunteers or anyone with<br>potential to touch produce with<br>diarrheal disease or symptoms<br>of other infectious diseases<br>prohibited from handling fresh<br>produce or touching food<br>contact surfaces? | Written policy prohibits sick<br>worker contact with fresh<br>produce. Supervisors are<br>familiar with symptoms of<br>infectious disease.   | Yes, but a written policy will be<br>developed.                | No. Sick workers may continue<br>to work in produce contact<br>areas. |              | Written policy or employee/<br>worker interview(s)<br>indicate(s) sick workers are<br>not allowed contact with<br>produce.<br>§112.31(a)(b)   |  |  |  |
| 2.09) Is there a policy<br>describing procedures for<br>dealing with produce and food<br>contact surfaces that come<br>into contact with blood and/or<br>other bodily fluids?   | Written policy specifies<br>handling/disposition of<br>fresh produce and surfaces<br>contaminated with blood and/<br>or other bodily fluids. | Yes, but a written policy will be developed.                   | No.   |              | §112.31   |  |  |  |
| 2.10) Are workers instructed to seek prompt treatment for cuts, abrasions and other injuries?   | Written policy requires<br>workers to seek treatment for<br>all injuries.  | Yes, but the written policy will be developed.                 | No.   |              |   |  |  |  |
| 2.11) Are company workers<br>applying pesticides, sanitizing<br>agents or other regulated<br>materials certified or licensed?   | Records indicate that workers are certified or licensed.   |  | No.   |              | Michigan Occupational Safety<br>and Health Administration<br>and MDARD:<br>http://www.michigan.gov/<br>documents/mdard/Final_<br>Reg_633_Restricted_Use_<br>Pesticides_547932_7.pdf |  |  |  |

| Water Usage   |   |  |  |              |   |  |  |  |  |
|---|---|--|--|--------------|---|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |   |  |  |              |   |  |  |  |  |
| Risk Question   | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)   | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)                       | Your<br>Risk | Produce Safety Review<br>Requirement  |  |  |  |  |
| 3.01) Is production water<br>quality monitored for the<br>crop grown (covered or<br>uncovered) and intended<br>use? (ie. irrigation, fertilizer<br>application, frost protection,<br>dust abatement, hand washing,<br>etc.) | Irrigation water provided by<br>municipal system. Annual<br>water test by local water<br>authority is documented.<br>Or,<br>Irrigation water provided by<br>an on-farm well that is tested<br>annually and the results are<br>documented.<br>Or,<br>Irrigation water provided by<br>surface water that is tested<br>five times a year and the<br>results are documented.<br>Or,<br>Water never contacts the<br>harvestable portion. | Surface water sources are<br>tested once near harvest time.<br>(Note: Water testing is<br>especially important if water<br>comes in direct contact with<br>harvestable parts of the plant<br>and the food is eaten raw.) | Water is provided from a source that is not tested.                                  |              | Water test reports indicate<br>water is safe for intended use.<br>\$112.44(b)<br>Production water can be<br>water used for irrigation, dust<br>abatement, frost protection,<br>hand washing, etc.<br>\$112.44(b)<br>Find a testing lab: |  |  |  |  |
| 3.02) Is water used during or<br>after harvest, such as for hand<br>washing, cooling, ice, used on<br>food contact surfaces etc?  | Municipal water is used, and<br>annual report is documented.<br>Or,<br>Well water is used and is<br>tested at least annually, and<br>results show no detectable<br>generic <i>E. coli</i> .   |  | Well water or surface water is used and not tested.                                  |              | §112.44(a)<br>§112.44(a)(4) Water test<br>reports indicate water is safe.   |  |  |  |  |
| 3.03) Is production water<br>source (if under your control)<br>inspected at least annually<br>and protected from potential<br>direct and non-point sources of<br>contamination?   | Farm operator takes steps<br>to minimize risk of water<br>contamination (berms,<br>diversions, fencing, etc.).  |  | Water source is contaminated<br>or not inspected (if under the<br>grower's control). |              | §112.42(a)<br>Production water can be for<br>irrigation, dust abatement,<br>frost protection, hand<br>washing, etc.   |  |  |  |  |

| Water Usage  |  |  |  |              |                                      |  |  |  |
|--|--|--|--|--------------|--------------------------------------|--|--|--|
|  | Note: gree   | en text indicates proof of produce   | safety intentions.   |              |                                      |  |  |  |
| Risk Question  | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)                   | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)               | Your<br>Risk | Produce Safety Review<br>Requirement |  |  |  |
| 3.04) Are all water distribution<br>systems inspected annually and<br>maintained as needed?                  | All water distribution systems<br>are inspected annually.  |  | Water distribution systems not inspected.                                    |              | §112.42(b)                           |  |  |  |
| 3.05) If used wash water is<br>generated, is it disposed of<br>according to county and state<br>regulations? | No used water is generated<br>Or<br>County and state regulations<br>are followed in disposing of<br>used wash water. All activities<br>are recorded. | County and state regulations<br>are followed in disposing of<br>used wash water. | County and state regulations<br>are not followed when<br>disposing of water. |              |                                      |  |  |  |

| Animals/Wildlife/Livestock Exclusion  |  |  |   |              |                                      |  |  |  |
|---|--|--|---|--------------|--------------------------------------|--|--|--|
|   | Note: gree   | en text indicates proof of produce   | safety intentions.  |              |                                      |  |  |  |
| <b>Risk Question</b>  | Low Risk – 3<br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)                         | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)                                  | Your<br>Risk | Produce Safety Review<br>Requirement |  |  |  |
| 4.01) Are measures taken<br>to restrict access of animals<br>(domestic and wild) to the<br>source or delivery system of<br>crop irrigation water? | Every effort is made to restrict<br>animal access, including<br>use of noise cannons, scare<br>balloons, fencing, and other<br>barriers. | Some effort is made to limit<br>animal access to irrigation<br>water.                  | No effort made to limit animal access.  |              | §112.41 and §112.42                  |  |  |  |
| 4.02) Are measures taken to<br>restrict or minimize access of<br>animals, domestic or wild, to<br>crop production areas?                          | Every effort is made to<br>restrict animal access,<br>including use of noise<br>cannons, scare balloons,<br>fencing and other barriers.  | Some effort is made<br>to limit animal access<br>to crop production<br>areas.          | No effort is made to limit<br>animal access.  |              |                                      |  |  |  |
| 4.03) Are crop production<br>areas monitored for the<br>presence or signs of wild or<br>domestic animals entering the<br>land?                    | Records indicate production<br>areas are monitored for the<br>presence of animals.   | Yes, but records will be developed.  | Production areas are not<br>monitored for the presence<br>of animals where potential<br>exists. |              | \$112.83                             |  |  |  |
| 4.04) Are production fields<br>assessed before harvest for<br>possible sources of<br>contamination?   | The produce safety plan<br>documents a preharvest<br>assessment.   | A preharvest<br>assessment is done,<br>and a written<br>document will be<br>developed. | No preharvest assessment<br>is done.  |              |                                      |  |  |  |

| Manure, Compost and Municipal Biosolids (Skip this section if manure, compost and/or biosolids are not used on the farm.)   |  |   |   |              |  |  |  |  |
|---|--|---|---|--------------|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |  |   |   |              |  |  |  |  |
| Risk Question   | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)  | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)  | Your<br>Risk | Produce Safety Review<br>Requirement   |  |  |  |
|   |  | Raw manure  |   |              |  |  |  |  |
| 5.01) If raw manure or other<br>animal byproducts are used in<br>crop production, is it applied in<br>a manner that does not contact<br>the edible portion of the crop?         | Manure application records<br>document that manure is soil<br>incorporated and applied 270<br>or more days before harvest<br>and does not touch any part<br>of the edible product. | Manure application records<br>document that manure is<br>applied, and soil incorporated<br>120 or more days before<br>harvest when the edible<br>portion of the crop has soil<br>contact or 90 days prior to<br>harvest and does not touch<br>any part of the harvestable<br>product.   |   |              | Manure use records indicate<br>proper produce safety use<br>practices.<br>USDA NOP >120 days if<br>contact with harvestable<br>portion and >90 days if no<br>contact with harvestable<br>portion<br>\$112.56 |  |  |  |
| 5.02) If liquid manure storage<br>structures are located near or<br>adjacent to crop production<br>areas, are they contained to<br>prevent contamination of crops?              | Storage structures are properly<br>constructed and maintained to<br>prevent leakage and overflow.  |   | Storage structures are not<br>properly constructed and<br>maintained to prevent leakage<br>and overflow.        |              | §112.52(a)   |  |  |  |
| 5.03) If manure, compost or<br>biosolids are stored either<br>in the field or on the farm<br>near production areas, are<br>they contained to prevent<br>contamination of crops? | No manure, compost or<br>biosolids are stored near the<br>crop production area.  | All manure and compost are<br>contained in accordance with<br>generally accepted agricultural<br>and management practices<br>(GAAMPs). There is no potential<br>for runoff to flow into the crop<br>production area. Biosolids are<br>handled in accordance with<br>EGLE rules and regulations, and<br>there is no potential for runoff<br>to flow into crop production<br>areas. | Manure, compost or biosolids<br>can leach and/or run off into<br>crop production areas and is<br>not contained. |              | Proper manure storage<br>demonstrated or indicated<br>in records.<br>§112.52(a)  |  |  |  |

| Manure, Compost and Municipal Biosolids (Skip this section if manure, compost and/or biosolids are not used on the farm.)                         |   |  |  |              |  |  |  |  |  |
|---|---|--|--|--------------|--|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |   |  |  |              |  |  |  |  |  |
| <b>Risk Question</b>  | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard) | <b>High Risk – 1</b><br>(significant produce safety<br>hazard) | Your<br>Risk | Produce Safety Review<br>Requirement   |  |  |  |  |
|   |   | Composted Manure and Bioso                                     | lids   |              |  |  |  |  |  |
| 5.04) If composted manure,<br>dead animals and/or biosolids<br>are used, is the material properly<br>treated to reduce the level of<br>pathogens? | Document in food safety plan<br>indicates materials have been<br>treated to reduce the level of<br>pathogens or, if received from<br>a third party, a certificate has<br>been provided. |  | Treatment of the materials is not documented.                  |              | Compost use records indicate<br>proper produce safety use<br>practices.<br>Once the compost has been<br>documented as treated, no<br>other untreated amendments<br>can be added.<br>§112.54, §112.55 |  |  |  |  |

Michigan Department of Environment, Great Lakes and Energy (EGLE)

| Soils  |  |   |  |              |                                      |  |  |  |
|--|--|---|--|--------------|--------------------------------------|--|--|--|
|  | Note: gre  | en text indicates proof of produce  | safety intentions.   |              |                                      |  |  |  |
| <b>Risk Question</b>   | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)  | <b>High Risk – 1</b><br>(significant produce safety<br>hazard) | Your<br>Risk | Produce Safety Review<br>Requirement |  |  |  |
| 6.01) Have production fields<br>been assessed for previous<br>land uses that may pose<br>contamination risks?      | Yes. Records indicate there<br>are no potential risks from<br>previous land uses (dairy,<br>livestock or poultry feedlot<br>and/or improper use of animal<br>wastes, farm dump or other<br>potentially contaminating<br>uses). | Fields are assessed, but records need to be developed.  | No assessment of previous land<br>use has been conducted.      |              |                                      |  |  |  |
| 6.02) When previous land<br>uses indicate possibility of<br>contamination, have preventive<br>measures been taken? | Records indicate that crops<br>with minimal contact with<br>the soil or non-food crops are<br>grown.   | Crops with minimal contact with<br>the soil or non-food crops are<br>grown, but records need to be<br>developed.  | No preventive measures taken to prevent food contamination.    |              |                                      |  |  |  |
| 6.03) Are fields that are subject<br>to flooding avoided to prevent<br>crop contamination?                         | Yes.   | Fields subject to flooding<br>are used for non-food crops,<br>portions of food crops that<br>experience flooding are<br>not harvested, or other<br>precautionary measures are<br>taken. | No precautionary measures are taken on high risk fields.       |              |                                      |  |  |  |

| Field Sanitation and Hygiene  |  |  |  |              |   |  |  |  |  |
|---|--|--|--|--------------|---|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.  |  |  |  |              |   |  |  |  |  |
| <b>Risk Question</b>  | Low Risk – 3<br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard) | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)   | Your<br>Risk | Produce Safety Review<br>Requirement  |  |  |  |  |
| 7.01) Are the number, condition,<br>capacity and placement of<br>toilet and hand-washing units<br>in compliance with state and<br>federal regulations?            | At least one toilet and one<br>hand-washing facility are<br>available for each 20 or<br>fraction of 20 workers.                    |  | OSHA regulations are not met.  |              | Convenient field sanitation<br>unit(s) confirmed.<br>OSHA   |  |  |  |  |
| 7.02) Are toilet and<br>handwashing systems easily<br>accessible to farm workers and<br>are they using them?  | Farm workers can easily get to<br>toilets and handwash facilities<br>and they are being used.                                      |  | Toilet and handwash facilities<br>are difficult for farm workers to<br>access or farm workers are not<br>using them. |              |   |  |  |  |  |
| 7.03) Are field sanitation<br>units located in a place that<br>minimizes the risk for product<br>contamination in the case of<br>tipping, leaking or malfunction? | Field sanitation units are<br>properly located to prevent or<br>minimize risk of contamination<br>to crop fields.                  |  | A spill or leak from a field<br>sanitation unit may run into<br>production area or product<br>storage area.          |              | Note: This question is n/a<br>if farm does not use a field<br>sanitation unit(s).<br>§112.129(b)(1) |  |  |  |  |
| 7.04) Are field sanitation units<br>located in an accessible place<br>for servicing and adequately<br>stocked?  | Location is accessible. Unit<br>has adequate supply of paper<br>towels, water and soap.  |  | Location is inaccessible.<br>Or<br>Unit does not have adequate<br>supply of paper towels, water<br>or soap.          |              | Note: This question is n/a<br>if farm does not use a field<br>sanitation unit(s).                   |  |  |  |  |
| 7.05) Does the farm operator<br>have a response plan in the<br>case of a spill or leak of a field<br>sanitation unit?   | A clean-up policy is in the<br>produce safety plan. A spill<br>response kit is ready and<br>accessible to everyone on the<br>farm. | A clean-up policy is in the pro-<br>duce safety plan.          | No.  |              | Note: This question is n/a<br>if farm does not use a field<br>sanitation unit(s).                   |  |  |  |  |
| 7.06) Are sewage and septic<br>systems monitored and<br>maintained?   | Facilities are periodically<br>monitored and maintained<br>in accordance with state and<br>local laws.                             |  | No.  |              | \$112.131(a)(b)(c)<br>\$112.133(a)(b)(c)(d)   |  |  |  |  |

| Field Harvesting and Transportation  |   |  |  |              |   |  |  |  |  |
|--|---|--|--|--------------|---|--|--|--|--|
| Note: green text indicates proof of produce safety intentions.   |   |  |  |              |   |  |  |  |  |
| Risk Question  | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)   | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)           | Your<br>Risk | Produce Safety Review<br>Requirement                      |  |  |  |  |
| 8.01) Are harvesting containers<br>that come in direct contact with<br>produce cleaned and sanitized<br>as appropriate and necessary or<br>single-use? | The produce safety plan<br>documents that containers<br>are cleaned and sanitized as<br>appropriate and necessary or<br>are single-use.                           | Containers are kept cleaned<br>and sanitized as appropriate<br>and necessary, but a written<br>document will be developed. | Containers are not kept<br>cleaned.                                      |              | Clean harvest containers<br>confirmed.<br>§112.123(d)     |  |  |  |  |
| 8.02) Is transportation<br>equipment that comes in direct<br>contact with produce cleaned<br>and sanitized as necessary?                               | The produce safety plan<br>documents that transportation<br>equipment is kept adequately<br>clean for the purposes they are<br>used.                              | Transportation equipment<br>is kept clean, but a written<br>document will be written.                                      | Transportation equipment is not kept clean.                              |              | Clean harvest vehicles<br>confirmed.<br>§112.125(a) & (b) |  |  |  |  |
| 8.03) Are handharvesting<br>implements (knives, pruners,<br>machetes, etc.) kept clean on a<br>scheduled basis?  | The food safety plan<br>documents a cleaning and<br>sanitizing schedule for<br>harvesting equipment.  | Harvesting implements are<br>cleaned and sanitized, but<br>a written document will be<br>written.                          | Harvesting implements are not cleaned and sanitized.                     |              | Clean harvest implements<br>confirmed.<br>§112.123(d) (1) |  |  |  |  |
| 8.04) Are damaged containers<br>properly repaired or disposed<br>of?   | Containers are inspected for<br>damage on a regular basis.<br>Damaged containers are<br>repaired, discarded, or used<br>for other purposes and clearly<br>marked. |  | Damaged containers are used in harvest operations.                       |              | \$112.22(b)   |  |  |  |  |
| 8.05) Is harvest equipment and/<br>or machinery in good repair?  | Yes.  |  | Leaking fluids and/or damaged<br>parts may contaminate<br>produce.       |              | §112.123(b)(2)  |  |  |  |  |
| 8.06) Has the risks posed<br>by chemicals, petroleum,<br>pesticides, broken glass or<br>plastic during the harvesting<br>operations being addressed?   | Written policy is available<br>to deal with product<br>contamination.   | Written policy will be<br>developed.   | Physical or chemical<br>contaminants may end up in<br>harvested produce. |              |   |  |  |  |  |

| Field Harvesting and Transportation   |   |   |  |              |                                      |
|---|---|---|--|--------------|--------------------------------------|
|   | Note: gre   | en text indicates proof of produce  | safety intentions.   |              |                                      |
| <b>Risk Question</b>  | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)  | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)                             | Your<br>Risk | Produce Safety Review<br>Requirement |
| 8.07) Are containers currently<br>being used for harvest also used<br>for carrying or storing non-<br>produce items?                                    | No. Written policy in the food<br>safety plan does not allow<br>harvest containers to be used<br>for non-produce items.   | Harvest containers are used<br>to carry or store non-produce<br>items and are clearly labeled.                                    | Harvest containers are used<br>to carry or store non-produce<br>items and are not labeled. |              | \$112.116                            |
| 8.08) Is produce that is high-<br>risk, such as leafy greens,<br>washed and stored after<br>harvest in a way that minimizes<br>potential contamination? | Yes. No water is used after<br>harvest or a sanitizer is used<br>and monitored frequently.<br>Water temperature is adjusted<br>if the differential between<br>produce and water is greater<br>than 10° F. | A sanitizer is used, wash water<br>is changed frequently, and/<br>or only running water is used.<br>Temperature is not monitored. | No.  |              | §112.113                             |
| 8.09) Are efforts taken to<br>remove excess dirt and mud<br>from produce during harvest?  | Every effort is taken to keep<br>the produce adequately clean.  |   | Dirt and mud contaminate<br>harvested produce.   |              | §112.113                             |
| 8.10) How is dropped produce<br>handled prior to harvest?   | No dropped produce is<br>collected, Or,<br>Dropped produce collected<br>from the ground is not<br>distributed for human<br>consumption.   | Dropped produce is collected<br>and sent for further processing<br>with a scientifically valid kill<br>step.                      | Produce is picked up from the<br>ground and sold for raw human<br>consumption.             |              | \$112.114                            |

| Field Harvesting and Transportation   |   |   |   |              |                                      |
|---|---|---|---|--------------|--------------------------------------|
|   | Note: gre   | en text indicates proof of produce  | safety intentions.  |              |                                      |
| Risk Question   | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)  | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)  | Your<br>Risk | Produce Safety Review<br>Requirement |
| 8.11) If dropped produce is<br>collected for processing that<br>receives a scientifically valid kill<br>step, what actions are taken to<br>minimize cross-contamination of<br>raw covered produce for human<br>consumption? | Collection of dropped produce<br>occurs after the collection<br>of raw produce for human<br>consumption to minimize<br>potential cross-contamination<br>of produce and produce<br>contact surfaces. | Collection of dropped produce<br>occurs during the collection of<br>produce for raw consumption,<br>but equipment used for<br>dropped produce is distinctly<br>marked and not used for other<br>purposes, handled and stored<br>separately, and hand washing<br>and equipment cleaning follows<br>the collection of dropped<br>produce. | Collection of dropped produce<br>occurs during the collection of<br>produce for raw consumption,<br>the same equipment is used<br>and not cleaned in between,<br>and both types of products are<br>stored together. |              |                                      |
| 8.12) Is harvested produce<br>covered during transportation<br>from the field?  | Farm policy in the produce<br>safety plan requires produce to<br>be covered with tarp or hauled<br>in an enclosed trailer or truck,<br>or protected by some other<br>means.                         | Produce is covered, but a<br>written policy needs to be<br>developed.   | Produce is not covered and is<br>exposed to contamination by<br>other vehicles, birds, dust, and<br>other sources.  |              |                                      |

| Produce Packing – Field or Packing House   |   |   |   |              |   |
|--|---|---|---|--------------|---|
|  | Note: gre   | en text indicates proof of produce  | safety intentions.  |              |   |
| Risk Question  | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)  | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)  | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)  | Your<br>Risk | Produce Safety Review<br>Requirement  |
| 9.01) Are only new or sanitized containers used for packing produce?   | Produce safety plan<br>documents that only new or<br>sanitized consumer containers<br>are used.                               | Some new containers are used.<br>Only clean, used consumer<br>containers are used. Containers<br>are not sanitized.   | Some dirty, not sanitized containers are used.  |              | New, sanitized or clean<br>consumer containers<br>confirmed.<br>§112.116                            |
| 9.02) Are produce containers<br>and other packing materials<br>properly stored and protected<br>from contamination?  | Produce containers and other<br>packing materials are properly<br>stored and protected from<br>contamination.                 |   | There is a potential risk that<br>containers and packing<br>materials may become<br>contaminated in storage area. |              | Proper storage of containers<br>and packing materials<br>observed.<br>§112.123(b)(2)<br>§112.116(b) |
| 9.03) Are produce contact<br>surfaces in packing area<br>and equipment (including<br>refrigeration units) in good<br>condition, clean and sanitized on<br>a regular basis? | Produce safety plan<br>documents that produce<br>contact surfaces and areas<br>are clean and sanitized on a<br>regular basis. | Produce contact surfaces and<br>areas are cleaned and sanitized<br>on a regular basis. A document<br>will be written. | Soiled produce contact<br>surfaces or packing area may<br>contaminate produce.                                    |              | Clean produce contact<br>surfaces and packing area<br>observed.<br>§112.123(c) & (d)(1)             |

| Produce Traceability  |  |  |  |              |  |
|---|--|--|--|--------------|--|
| Note: green text indicates proof of produce safety intentions.  |  |  |  |              |  |
| Risk Question   | <b>Low Risk – 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard)                                 | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)   | Your<br>Risk | Produce Safety Review<br>Requirement   |
| 10.01) Is the produce container<br>or the product itself uniquely<br>identified to allow trace-back<br>to the farm where it was<br>produced?  | Yes. Traceability is<br>documented. Mock recalls are<br>performed annually.  | Traceability program exists.<br>Verification through mock re-<br>calls have not been performed | No traceability system exists.                                   |              | Produce uniquely identified to allow traceability.   |
| 10.02) If the farm is qualified<br>exempt, are you keeping proper<br>records and providing complete<br>business information on labels<br>and/or signs?  | Yes. Records are kept, and all<br>labels and/or signs provide the<br>complete name and business<br>address of the farm where the<br>produce is grown.  |  | No.  |              | §112.6(b)  |
|   | Pesticid   | es and Crop Protect  | tion Materials   |              |  |
|   | NOTE: If the farm  | n is MAEAP Verified for cropping   | systems, skip this section.                                      |              |  |
| 11.01) Is crop protection material<br>mixing and loading adequately<br>isolated from water sources and<br>production fields?  | <ul> <li>-At least 200 feet from surface waters.</li> <li>-At least 150 feet from private wells.</li> <li>-At least 800 feet from public wells unless protective site features exist.</li> <li>-Adequate isolation to prevent contamination of production fields.</li> </ul>                             |  | Isolation does not meet<br>the minimum low-risk<br>requirements. |              | *Note: See Michigan<br>Agriculture Environmental<br>Assurance Program (MAEAP)<br>technician for additional<br>information on reduced<br>isolation requirement from<br>public wells or the MAEAP<br>Crop *A*Syst. |
| <ul> <li>11.02) Are crop protection<br/>materials registered for use on<br/>the crops that are treated (the<br/>product label lists the crop as<br/>eligible for application)?</li> <li>11.03) Do crop protection<br/>material applicators read and<br/>follow the label instructions?</li> </ul> | <ul> <li>Products are registered for<br/>use with the Environmental</li> <li>Protection Agency and with<br/>the Michigan Department<br/>of Agriculture and Rural</li> <li>Development.</li> <li>Everyone using crop protection<br/>materials follows label and</li> <li>Labeling instructions</li> </ul> |  | Products are not registered<br>for use.                          |              |  |

| Pesticides and Crop Protection Materials  |  |  |   |              |   |
|---|--|--|---|--------------|---|
|   | Note: gre  | en text indicates proof of produce                             | e safety intentions.  |              |   |
| Risk Question   | <b>Low Risk - 3</b><br>(recommended to pass<br>produce safety audit)   | <b>Medium Risk – 2</b><br>(potential produce safety<br>hazard) | <b>High Risk – 1</b><br>(significant produce safety<br>hazard)  | Your<br>Risk | Produce Safety Review<br>Requirement  |
| 11.04) Do applicators follow<br>preharvest interval requirements<br>(days to harvest)?  | No produce is harvested<br>after the last crop protection<br>application until the minimum<br>days have passed.                              |  | Harvest may occur before the preharvest interval is met.  |              |   |
| 11.05) Are the applicators of restricted-use pesticides (RUP) certified applicators?  | The applicators of RUP comply with the certification requirements.   |  | Non-certified and unsupervised applicators use RUP.   |              |   |
| 11.06) How do you assure that<br>pesticide applications remain<br>on-target and minimize off-<br>target pesticide spray drift?                  | A written drift management<br>plan is utilized that minimizes<br>off-target drift.   |  | Spraying operations are<br>completed regardless of<br>weather conditions or forecast,<br>and regardless of the potential<br>for off-target drift. |              |   |
| 11.07) What pesticide application records are kept?   | Accurate records are<br>maintained of all application<br>of pesticides for at least three<br>years (one year for general-use<br>pesticides). | Partial records are kept.                                      | No record is kept. Chemicals<br>used are known by memory or<br>invoices only.   |              | Adequate pesticide records<br>confirmed or plans to maintain<br>complete application records. |
| 11.08) How are excess mixtures<br>and pesticide tank rinsate<br>disposed of?  | Excess mixtures and rinsate are used at or below label rates.  |  | There is no plan in place to deal with excess mixtures or rinsate.  |              |   |
| 11.09) Are crop protection<br>materials and harvested<br>products transported in the<br>same vehicle or stored in the<br>same storage area?     | Never.   | Yes, but after a thorough cleaning of the area.                | Yes, without cleaning the<br>area. Produce may become<br>contaminated.  |              |   |
|   | C  | other Produce Safety   | / Risks   |              |   |
| 12.01) There are no other<br>immediate produce safety risks<br>(egregious condition) where<br>produce is grown, processed,<br>packed or stored? | No. There is no evidence of conditions or processes that have contaminated or can contaminate products.                                      |  | Yes. There is evidence of<br>conditions or processes that<br>have contaminated or can<br>contaminate products.                                    |              | Please see the "egregious conditions" document.   |

| <b>Pro</b><br>List | duce Safety Improvement Action Plan: Comple<br>the risk, the proposed solution and the target date for imp | te the action plan when a high risk to food safety is id<br>plementation.  | entified on th                | e farm.                            |
|--------------------|--|--|-------------------------------|------------------------------------|
|                    |  |  | Actio                         | on plan                            |
| Risk<br>Question   | List medium and/or high-risk practice(s)<br>from Produce Safety Risk Assessment                            | List alternative low-risk practice(s)<br>(include potential sources of technical assistance)   | Planned<br>completion<br>date | Indicate<br>date when<br>completed |
| 2.03               | Example: Farm does not provide staff training on worker sanitation and hygiene.                            | Add worker training to the food safety plan. Utilize Cornell<br>Univ. "Health and Hygiene on the Farm" video. Record date<br>and names of workers trained. Monitor worker sanitation<br>practices in the field and produce packing area. | March 2019                    | (✔) Completed<br>March 15, 2019    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |
|                    |  |  |                               |                                    |

Farm Name: \_\_\_\_\_\_

\_\_\_\_\_

Address:

**Produce Safety Improvement Action Plan:** Complete the action plan when a high risk to food safety is identified on the farm. List the risk, the proposed solution and the target date for implementation.

|                  |  |  | Action plan                   |                                    |  |
|------------------|--|--|-------------------------------|------------------------------------|--|
| Risk<br>Question | List medium and/or high-risk practice(s)List alternative low-risk practice(s)estionfrom Produce Safety Risk Assessment(include potential sources of technic) |  | Planned<br>completion<br>date | Indicate<br>date when<br>completed |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |
|                  |  |  |                               |                                    |  |

Farm Name: \_\_\_\_\_\_Address:

I understand that this Produce Safety Risk Assessment and corresponding Improvement Action Plan were developed on the basis that I have disclosed, to the best of my knowledge, all relevant information pertaining to my farming operation.

| Producer's signature                | Date: |
|-------------------------------------|-------|
|                                     |       |
| Produce Safety Review conducted by: |       |
|                                     |       |
| Name and Title                      | Data  |
|                                     | Date. |

| <b>Pro</b><br>List | duce Safety Improvement Action Plan: Complete<br>the risk, the proposed solution and the target date for imp | te the action plan when a high risk to food safety is id<br>plementation.  | entified on th                | e farm.                            |  |
|--------------------|--|--|-------------------------------|------------------------------------|--|
|                    |  |  | Action plan                   |                                    |  |
| Risk<br>Question   | List medium and/or high-risk practice(s)<br>from Produce Safety Risk Assessment                              | List alternative low-risk practice(s)<br>(include potential sources of technical assistance)   | Planned<br>completion<br>date | Indicate<br>date when<br>completed |  |
| 2.03               | Example: Farm does not provide staff training on worker sanitation and hygiene.                              | Add worker training to the food safety plan. Utilize Cornell<br>Univ. "Health and Hygiene on the Farm" video. Record date<br>and names of workers trained. Monitor worker sanitation<br>practices in the field and produce packing area. | March 2019                    | (✔) Completed<br>March 15, 2019    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |
|                    |  |  |                               |                                    |  |

Farm Name: \_\_\_\_\_\_

Address:

**Produce Safety Improvement Action Plan:** Complete the action plan when a high risk to food safety is identified on the farm. List the risk, the proposed solution and the target date for implementation.

|                  | List medium and/or high-risk practice(s)<br>from Produce Safety Risk Assessment |  | Action plan                   |                                    |  |
|------------------|---|--|-------------------------------|------------------------------------|--|
| Risk<br>Question |   | List alternative low-risk practice(s)<br>(include potential sources of technical assistance) | Planned<br>completion<br>date | Indicate<br>date when<br>completed |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |
|                  |   |  |                               |                                    |  |

Farm Name: \_\_\_\_\_\_Address:

I understand that this Produce Safety Risk Assessment and corresponding Improvement Action Plan were developed on the basis that I have disclosed, to the best of my knowledge, all relevant information pertaining to my farming operation.

| Producer's signature                  |        | Date: |  |
|---------------------------------------|--------|-------|--|
|                                       |        |       |  |
| Produce Safety Review conduct         | ed by: |       |  |
| , , , , , , , , , , , , , , , , , , , |        |       |  |
| Name and Title                        |        | Dato: |  |
|                                       |        | Date. |  |

## $\frac{\text{MICHIGAN STATE}}{U N I V E R S I T Y} | \text{Extension}$

MSU is an affirmative-action, equal-opportunity employer, committed to achieving excellence through a diverse workforce and inclusive culture that encourages all people to reach their full potential. Michigan State University Extension programs and materials are open to all without regard to race, color, national origin, gender, gender identity, religion, age, height, weight, disability, political beliefs, sexual orientation, marital status, family status or veteran status. Issued in furtherance of MSU Extension work, acts of May 8 and June 30, 1914, in cooperation with the U.S. Department of Agriculture. Jeffrey W. Dwyer, Director, MSU Extension, East Lansing, MI 48824. This information is for educational purposes only. Reference to commercial products or trade names does not imply endorsement by MSU Extension or bias against those not mentioned. 12:2017–PA/AB