

HACCP Plan

Hazard analysis critical control point (HACCP) is a preventive approach to food safety. It identifies food safety hazards in the food production process and designs measurements to reduce those hazards to a safe level.

HACCP includes having a written plan that addresses identified critical control points (CCPs) where illness or injury is reasonably likely to occur in the absence of the hazard's control.

Submit the completed HACCP plan and provide all documents relating to your establishment's HACCP plan to the Department of Health and Human Services, Food and Lodging Unit by email (foodandlodging@nd.gov), fax (701-328-0340), or mail (600 E. Boulevard Ave., Dept. 325, Bismarck, ND 58505-0200). If you have further questions, please contact us at: 701-328-1291.

Establishment information

Establishment Name: 123 Meats	Date: MM/DD/YYYY
Establishment Address: 123 Ave.	
City, State, ZIP code: Any City, ND, XXXXX	License Number: XXXX
Owner/Corporate Name: ABC Meats	
Mailing Address (if different): same as establishment	
City, State, ZIP code:	
Primary Contact for HACCP Plan: General Manager	Phone: XXX-XXX-XXXX
Primary Contact Email Address: gmgr@email.com	

HACCP team

Name	Job Title or Description
<i>Joe Smith</i>	<i>General Manager</i>
<i>Sue Smith</i>	<i>Assistant Manager</i>
<i>Ted Smith</i>	<i>Sausage Maker</i>
<i>Frank Smith</i>	<i>Quality Control Officer</i>

Template adapted from the Minnesota Department of Health

Reason for this HACCP plan*

Please check one of the following:

- New HACCP plan
- Modification of existing HACCP plan

Activity or food category

Please check one or more of the following:

- Curing food
- Custom processing animals for personal use
- Operating and maintaining molluscan shellfish tanks
- Reduced oxygen packaging (ROP) - ROP methods include vacuum packaging, cook-chill, sous vide, modified atmosphere packaging (MAP), and controlled atmosphere packaging (CAP)
- Smoking food as a method of food preservation rather than as a method of flavor enhancement
- Sprouting seeds or beans
- Using food additives or adding components, such as vinegar, to preserve food rather than as a method of flavor enhancement, or to render the food so that it is not time and temperature control for safety food
- Other:

*Please consult with the Regulatory Authority to determine if a variance is required.

Product: *Cured Beef & Pork Sausage, Smoked*

Ingredients: *Raw beef and pork, 6.25% sodium nitrite, water, salt, pepper, garlic, dry milk powder, natural beef casings*

Recipe/directions: *Original Style Beef & Pork Sausage*

- *50 lbs. of beef trim*
- *50 lbs. of pork trim*
- *6 lbs. of salt, pepper, & garlic seasoning mix (purchased blend from Brand ABC)*
- *4 oz. of 6.25% sodium nitrite cure*
- *1.2 gallons of water*
- *14 oz. of dry milk powder*
- *Natural beef casings*

Process description:

Ingredients are combined according to the recipe, mixed, ground, and stuffed. A cure is included to control for microbiological growth of pathogens that may be present in the sausage, to add flavor, to extend shelf life, and to enhance product color. Stuffed sausage is smoked, cooled, then packaged and labeled. Sausages are packaged for the purposes of retail sale and to extend shelf life of the products. All product ingredients are purchased from approved and licensed suppliers and inspected during receiving for temperature (41°F or below, if applicable) and quality. The handling, preparation, packaging, and monitoring of vacuum packaged products are conducted by employees who have a thorough understanding of this HACCP plan and are trained in the reduced oxygen packaging process. The ROP operations are conducted only in the designated areas of the kitchen and all vacuum packaged products are maintained at 41°F or below.

Product details

Provide product name, ingredients list, recipe/directions, and process description. Additional scientific documentation, as required by the Regulatory Authority, addressing the food safety concerns involved for this HACCP activity shall be provided.

Intended use and consumer

Please check one or more of the following to indicate how the product will be used.

- Ready-to-eat; served in the food establishment to consumers.
- Ready-to-eat; distributed to satellite location; served at satellite location to consumers.
- Ready-to-eat; packaged and sold in the food establishment for home use.
- Ready-to-eat; packaged and sold wholesale to another food establishment for retail sale.
- Raw; served in the food establishment to consumers.
- Raw; distributed to satellite location; served at satellite location to consumers.
- Raw; packaged and sold in the food establishment for home use.
- Raw; packaged and sold wholesale to another food establishment for retail sale.
- Other:

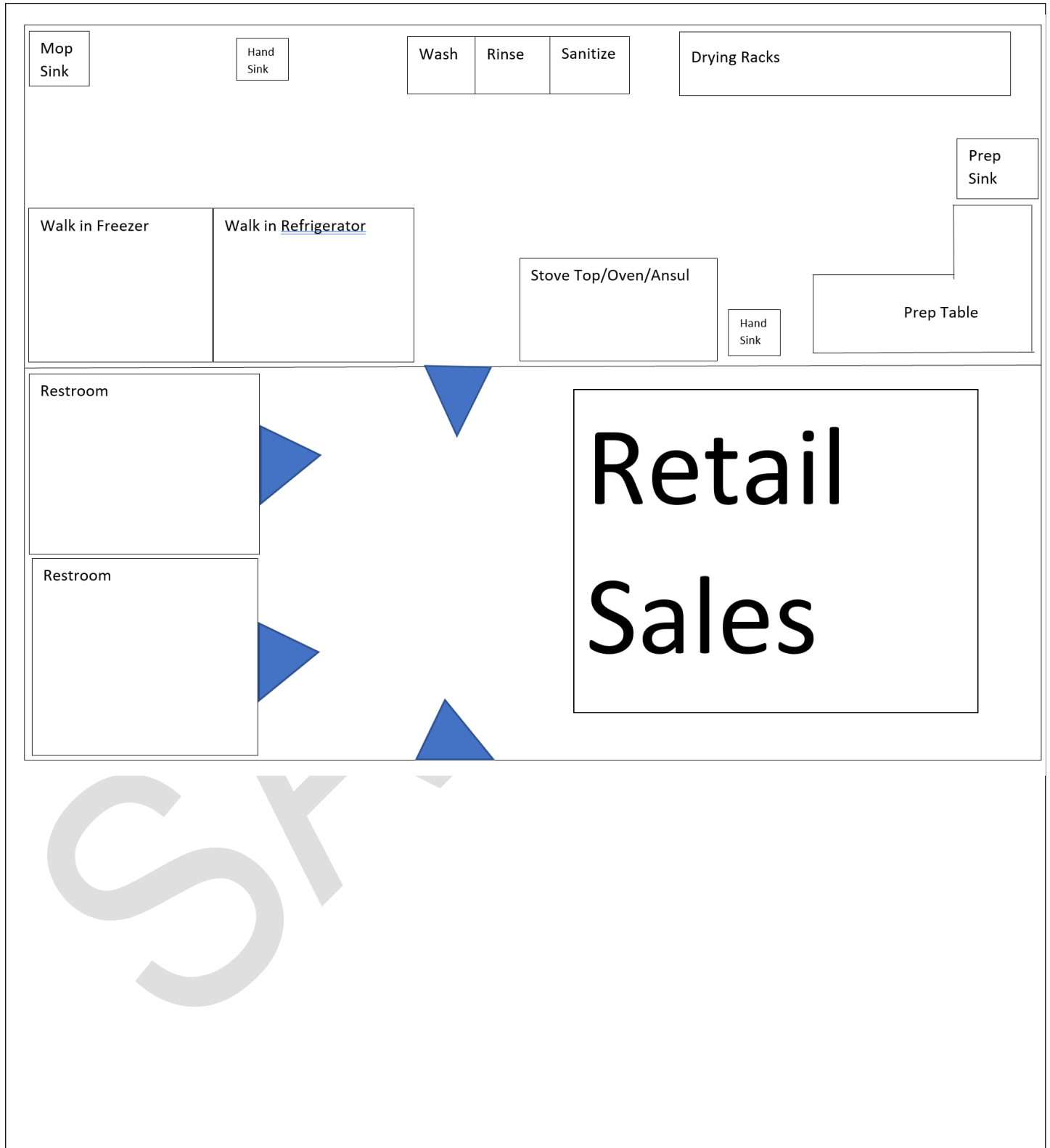
Shelf life

For each storage method included in this HACCP plan, indicate the maximum time products will be stored.

*30 days in refrigeration maintained at $\leq 41^{\circ}\text{F}$
If maintained frozen, product may be stored indefinitely.*

Layout of production area

Provide a hand drawing, blueprint, or other diagram of the production area. Include all areas involved with this HACCP activity. Important details may include: sink types and locations, equipment locations, receiving, storage, preparation, and processing areas.



Equipment and materials

List all equipment and materials used for this HACCP activity. Include manufacturer names and model numbers. Attach specification sheets, if available.

Walk-In Cooler: Make ABC, Model 123

Display Cooler: Make ABC, Model 123

Freezer: Make ABC, Model 123

Grinder: Make ABC, Model 123

Mixer: Make ABC, Model 123

Thermometers: Make ABC, Model 123

Vacuum Packager: Make ABC, Model 123

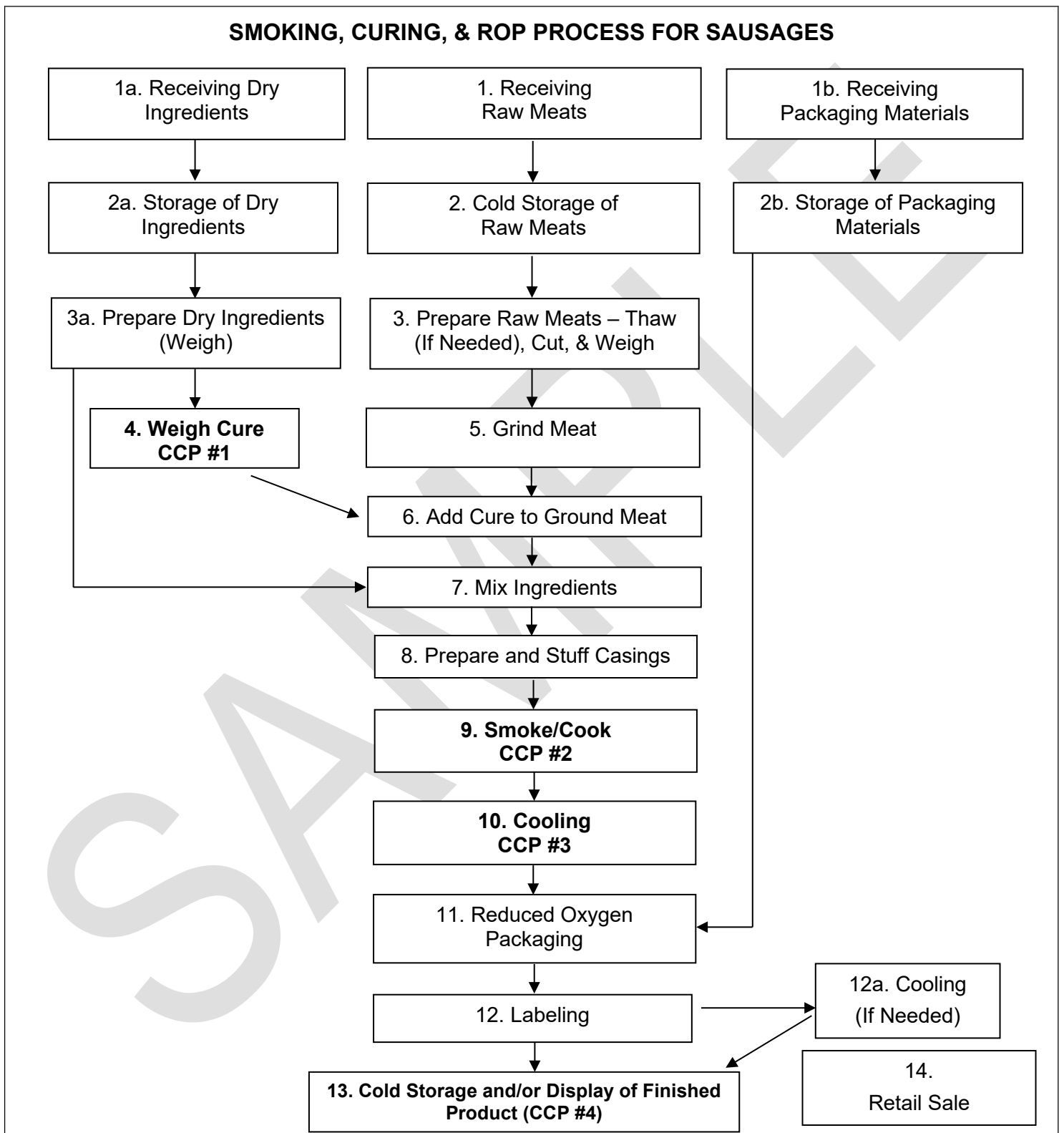
Scale: Make ABC, Model 123

Smokehouse: Make ABC, Model 123

*Assorted Food Grade Measuring Containers, Knives, Utensils, Lugs, Totes and Labels:
Brand ABC*

Food flow diagram

Provide a written flow diagram for foods covered in this HACCP plan. Identify process steps from receiving through service. Identify the critical control points (CCPs) on the flow diagram.



Food flow, procedure, and hazard analysis adapted from the City of Minneapolis HACCP Plan Template.

Hazard analysis

Use the chart below to conduct and document the hazard analysis. The HACCP plan shall include CCPs for each identified hazard.

Step from food flow diagram	Identify potential biological (B), chemical (C), and physical (P) hazards introduced, controlled, or enhanced at this step	Does this step involve a hazard of sufficient risk and severity to warrant its control? (Yes/No)	Justification for decision	What preventive measure(s) can be applied for the significant hazards?	Is this step a CCP? (Yes/No)
1. Receiving Raw Meats	<p><i>B – Pathogens - Salmonella, E. coli O157:H7, S. aureus, Clostridium botulinum</i></p> <p><i>C – None</i></p> <p><i>P – None</i></p>	Yes	<i>Fresh meat is known to contain pathogens</i>	<i>Meat will be purchased from approved suppliers and received at proper temperatures</i>	No
<p>1a. Receiving Dry Ingredients</p> <p>1b. Receiving Packaging Materials</p>	<p><i>B – None</i></p> <p><i>C – Deleterious Chemicals</i></p> <p><i>P – Foreign Material</i></p>	No	<p><i>Dry ingredients will be purchased from approved sources.</i></p> <p><i>Non-food packaging materials might have been treated/washed with chemicals not suitable for food contact surfaces</i></p>	<p><i>Visual inspection of dry ingredients upon receipt</i></p> <p><i>Use of food grade packaging only</i></p>	No
2. Cold Storage of Raw Meats	<p><i>B – Pathogens - Salmonella, E. coli O157:H7, S. aureus, Clostridium botulinum</i></p> <p><i>C – None</i></p> <p><i>P – None</i></p>	Yes	<i>Potential Growth of Pathogens</i>	<i>All meats will be immediately stored in coolers and freezers</i>	No

Step from food flow diagram	Identify potential biological (B), chemical (C), and physical (P) hazards introduced, controlled, or enhanced at this step	Does this step involve a hazard of sufficient risk and severity to warrant its control? (Yes/No)	Justification for decision	What preventive measure(s) can be applied for the significant hazards?	Is this step a CCP? (Yes/No)
<p>2a. Storage of Dry Ingredients</p> <p>2b. Storage of Packaging Materials</p>	<p>B – None</p> <p>C – Chemical Contaminants</p> <p>P – Foreign Material</p>	No	<p>C – Proper chemical storage makes contamination unlikely</p> <p>P – Visible foreign material that could compromise product safety; rodent droppings and/or insects</p>	<p>C – All chemicals are stored in an area separate from dry ingredients and packaging materials</p> <p>P – Visual inspection of packaging materials to ensure no foreign material is present</p>	No
<p>3. Prepare Raw Meats – Thaw (If Needed), Cut, & Weigh</p>	<p>B – Pathogens - Salmonella, E. coli O157:H7, S. aureus, Clostridium botulinum</p> <p>C – None</p> <p>P – None</p>	Yes	<p>Potential introduction and/or growth of pathogens</p>	<p>All meats will be thawed in walk-in cooler at ≤41°F</p> <p>SSOPs for handwashing and cleaning of equipment</p>	No
<p>3a. Prepare Dry Ingredients</p>	<p>B – None</p> <p>C – Chemical Contaminants</p> <p>P – Foreign Material</p>	No	<p>C – Proper chemical use makes contamination unlikely</p> <p>P – Visible foreign material that could compromise product safety; rodent droppings and/or insects</p>	<p>C – All chemicals are used in an area separate from dry ingredients</p> <p>P – Visual inspection of dry ingredients to ensure no foreign material is present</p>	No

Step from food flow diagram	Identify potential biological (B), chemical (C), and physical (P) hazards introduced, controlled, or enhanced at this step	Does this step involve a hazard of sufficient risk and severity to warrant its control? (Yes/No)	Justification for decision	What preventive measure(s) can be applied for the significant hazards?	Is this step a CCP? (Yes/No)
4. Weigh Cure (CCP #1)	B – C. Botulinum, S. aureus C – Nitrites P- None	Yes	<i>If too much nitrite is added, it would violate additive requirements If too little nitrite is used, it may not control spore growth</i>	<i>Nitrites <156 / >120 PPM is necessary to safely prevent the chemical hazard associated with curing foods. (9 CFR 318.7)</i>	Yes: CCP #1
5. Grind Meat	B – None C – None P – Metal	No	<i>In house inspection of processing equipment will help safeguard against metal contamination</i>	SOPs	No
6. Add Cure to Ground Meat	B – None C – None P – Metal	No	<i>In house inspection of processing equipment will help safeguard against metal contamination.</i>	SOPs	No
7. Mix Ingredients	B – None C – None P – Metal	No	<i>In house inspection of processing equipment will help safeguard against metal contamination.</i>	SOPs	No

Step from food flow diagram	Identify potential biological (B), chemical (C), and physical (P) hazards introduced, controlled, or enhanced at this step	Does this step involve a hazard of sufficient risk and severity to warrant its control? (Yes/No)	Justification for decision	What preventive measure(s) can be applied for the significant hazards?	Is this step a CCP? (Yes/No)
8. Prepare and Stuff Casings	B – None C – None P – None	No	SOPs	N/A	No
9. Smoke/Cook (CCP #2)	B – Pathogens - Salmonella, E. coli O157:H7, S. aureus, Clostridium botulinum C – None P – None	Yes	Fresh meat is known to contain pathogens	Cook to proper internal temperature to eliminate pathogens (Minimum of 155° F / 15 seconds for beef and pork) *FSIS Appendix A Allowed* https://www.fsis.usda.gov/sites/default/files/import/Salmonella-Compliance-Guideline-SVSP-RTE-Appendix-A.pdf	Yes: CCP #2
10. Cooling (CCP #3)	B – Pathogens - Clostridium perfringens C – None P – None	Yes	Clostridium perfringens spores may survive the cooking process and toxin formation may occur if not cooled properly	Cooling from 135°F to 70°F in 2 hours and from 70°F to 41°F within 4 additional hours will control pathogen spore growth *FSIS Appendix B Allowed* https://www.fsis.usda.gov/sites/default/files/import/Compliance-Guideline-Stabilization-Appendix-B.pdf	Yes: CCP #3
11. Reduced Oxygen Packaging	B – Pathogens - Listeria, Clostridium botulinum C – None P – None	No	Potential growth of pathogens due to cross-contamination is likely	Time product will be in the temperature danger zone during assembly will be minimized and monitored	No

Step from food flow diagram	Identify potential biological (B), chemical (C), and physical (P) hazards introduced, controlled, or enhanced at this step	Does this step involve a hazard of sufficient risk and severity to warrant its control? (Yes/No)	Justification for decision	What preventive measure(s) can be applied for the significant hazards?	Is this step a CCP? (Yes/No)
12. Labeling	<p><i>B – Pathogens - Listeria, Clostridium botulinum</i></p> <p><i>C – Allergens</i></p> <p><i>P – None</i></p>	Yes	<p><i>Improperly date marked products will result in outdated or unsafe products</i></p> <p><i>Improperly labeled products will result in allergens risks</i></p>	<p><i>Each package will be properly labeled with shelf life of 30 days</i></p> <p><i>Each package will be properly labeled with ingredient information to include allergens (milk)</i></p>	No
12a. Cooling (If Needed)	<p><i>B – Pathogens - Listeria, Clostridium botulinum</i></p> <p><i>C – None</i></p> <p><i>P – None</i></p>	No	<p><i>Potential growth of pathogens due to temperatures above 41°F during packaging</i></p>	<p><i>Meats will not exceed temperatures above 41°F during packaging for longer than one hour</i></p> <p><i>All meats will be cooled to ≤41°F prior to storage and/or display for retail sale</i></p>	No
13. Cold Storage and/or Display of Finished Product (CCP #4)	<p><i>B – Pathogens - Listeria, Clostridium botulinum</i></p> <p><i>C – None</i></p> <p><i>P – None</i></p>	Yes	<p><i>Potential growth of pathogens due to temperatures above 41°F during storage and/or display</i></p>	<p><i>ROP packaged and labeled products will be monitored for time and temperature control</i></p>	Yes: CCP #4
14. Retail Sale	None	N/A	N/A	N/A	N/A

HACCP plan CCP chart

Complete the chart below. Identify each CCP and describe: the critical limit, method and frequency for monitoring and controlling the CCP, method and frequency for person in charge (PIC) to verify that food employees are following standard operating procedures (SOPs) and monitoring CCPs, corrective action when critical limits are not met, and how records are maintained.

Critical Control point (CCP)	Significant hazard(s)	Critical limits for each hazard	Monitoring				Corrective action(s)	Records	Verification
			What	How	Frequency	Who			
CCP #1 Weigh Cure	B – None C - Nitrites	4 oz. of 6.25% nitrite per 100 lbs. of meat for 120-156 ppm ingoing cure	Weight of cure added to mixture	Weigh cure out using digital scale	Each batch	Designated food worker	Adjust cure weight 4 oz. of nitrite cure with 6.25% nitrite per 100 lbs. of meat	Batch Record Log Digital scale will be certified annually and have stamp of certification Food Scale Accuracy Log	Batch records will be reviewed for meeting CCP, signed and dated by PIC prior to product being offered for sale Digital scale will be certified annually Scale will be checked for accuracy for each batch, and PIC will sign and date prior to product being offered for sale
CCP #2 Cook/Smoke	B – Pathogens - Salmonella, E. coli O157:H7, S. aureus, Clostridium botulinum	155°F/15 sec	Internal temperature of largest portion of meat - Temperature measurements shall be taken from multiple locations throughout the smokehouse chamber to ensure all products meet cooking temperature requirement	Calibrated digital thermometer	Each batch	Designated food worker	If CCP is not reached after completion of the smokehouse cycle, continue to cook until CCP is reached	Batch Record Log Thermometer Calibration Log	Batch records will be reviewed for meeting CCP, signed and dated by PIC prior to product being offered for sale Digital thermometer will be calibrated and recorded weekly – record will be reviewed, signed and dated by PIC monthly

Critical Control point (CCP)	Significant hazard(s)	Critical limits for each hazard	Monitoring				Corrective action(s)	Records	Verification
			What	How	Frequency	Who			
CCP #3 Cooling	B – Pathogens - C. perfringens	Step 1 135°F – 70°F within 2 hours Step 2 70°F – 41°F within 4 hours of reaching 70°F	Internal temperature of largest portion of meat – Product temperature measurements shall be taken from multiple locations throughout the batch to ensure all products meet cooling temperature requirement	Calibrated digital thermometer	Each batch	Designated food worker	If product is not cooled to 70°F within 2 hours of reaching 135°F, reheat to 165°F and try another method to rapidly cool product as required or discard product If product is not cooled to 41°F within 4 hours	Batch Record Log Thermometer Calibration Log	Batch records will be reviewed for meeting CCP, signed and dated by PIC prior to product being offered for sale Digital thermometer will be calibrated and recorded weekly – record will be reviewed, signed and dated by PIC monthly
CCP #4 Cold Storage and/or Display of Finished Product	B – Pathogens - Listeria, Clostridium botulinum C – None P – None	Refrigerated product at 41°F or less Frozen product maintained frozen in a solid state	Cooler/Freezer temps will be monitored	Use of thermometers and/or digital temperature monitoring device	Daily	Designated food worker	Immediately discard product if temperature exceeds 41°F and identify and eliminate cause of deviation	Product Storage Temperature and Labeling Log	Product Storage Temperature and Labeling Log will be reviewed daily by the PIC

Standard Operating Procedures (SOPs)

Include SOPs that describe how to conduct procedures specific to this HACCP activity. SOPs necessary for this HACCP activity may include: maintenance of specialized equipment (pH meter calibration, cleaning and sanitizing of equipment), and employee training (monitoring, corrective action, record-keeping procedures, and proper formulation of food additives).

PROCEDURE FOR SMOKING, CURING, & ROP PROCESS FOR SAUSAGES

1. **Receiving Raw Meats:** Meat will be purchased from approved supplier and received frozen or at 41°F or less. Verify products are in good condition.
 - 1a. **Receiving Dry Ingredients:** Inspect dry ingredients upon receipt to verify that they are intact and in good condition. Reject dry ingredients that are not in good condition.
 - 1b. **Receiving Packaging Materials:** Food grade packaging will be used for the ROP process. Inspect packaging upon receipt to verify that it is intact and in good condition.
2. **Cold Storage of Raw Meats:** All meats will be immediately stored in coolers at 41°F or less and/or freezers and maintained frozen in a solid state.
 - 2a. **Storage of Dry Ingredients:** Non-perishable products are stored in a clean location that is separated from any potential sources of contamination.
 - 2b. **Storage of Packaging Materials:** Non-perishable products are stored in a clean location that is separated from any potential sources of contamination.
3. **Prepare Raw Meats – Thaw (If Needed), Cut & Weigh:** All meats will be thawed in walk-in cooler at 41°F or less. Assemble materials necessary for the process in the work area. Visually inspect all equipment and utensils for foreign material and/or metal contamination prior to use. Use gloves to cut meat then weigh meat according to the recipe.
 - 3a. **Prepare Dry Ingredients (Weigh):** Review the recipe to confirm that all required ingredients are on hand. Weigh dry ingredients according to the recipe.
4. **Weigh Cure (CCP #1):** Weigh out specific curing agent identified in the recipe using a digital scale after scale has been verified as accurate.
 - **Critical Limit:** 4 oz. of 6.25% nitrite per 100 lbs. of meat for 120-156 ppm ingoing cure
 - **Monitoring:** Use digital scale to weigh amount of cure added to each batch.
 - **Corrective Action:** Add or remove cure to the scale to get the correct weight.
 - **Records:** Document the final weight of cure on Batch Record.
 - **Verification:** PIC will verify that designated employees have met the critical limit and sign off on Batch Record Log prior to product being offered for retail sale.
5. **Grind Meat:** Visually inspect meat grinder for metal contamination. Place the meat in the grinder and grind to desired consistency.
6. **Add Cure to Ground Meat:** Add curing agent to the ground meat. Use gloves to hand mix.
7. **Mix Ingredients:** Add remaining ingredients to the cure/meat mixture and place in mixer. Mix well.

8. **Prepare and Stuff Casings:** Put casings in container and rinse. Find ends of casing and put over container edges. Put casing on sausage horns of stuffer. Put meat in stuffer. Turn on to the appropriate speed and stuff casings.
9. **Smoke/Cook (CCP #2):** Place sausage on smokehouse racks. Place probe thermometer in any sausage. Set thermometer alarm to 155°F. When alarm sounds, turn racks 180 degrees. Re-probe any sausage. Set to 155°F. When alarm sounds, turn off smokehouse.
 - **Critical Limit:** 155°F for 15 seconds
 - **Monitoring:** Use digital thermometer to take the internal temperature of largest portion of meat. Temperature measurements shall be taken from multiple locations throughout the smokehouse chamber to ensure all products meet cooking temperature requirement.
 - **Corrective Action:** Continue cooking until critical limit is reached. Adjust smoker temperature if necessary. Contact repair if necessary.
 - **Records:** Document average final temperature on Batch Record Log. All temperatures shall be at least 155°F in order to document the average final temperature
 - **Verification:** PIC will verify that designated employees have met the critical limit and sign off on Batch Record prior to product being offered for retail sale.
 - *FSIS Appendix A Allowed: <https://www.fsis.usda.gov/sites/default/files/import/Salmonella-Compliance-Guideline-SVSP-RTE-Appendix-A.pdf>
10. **Cooling (CCP# 3):** Remove sausages from smokehouse and place on cooling racks in sausage preparation area. Rinse with cold water for five minutes. Move to walk-in cooler rack in cooler maintained at 41°F or less. Position product so that it is protected from raw meat products to prevent cross-contamination.
 - **Critical Limit:** Smoked/cooked product must be cooled to 70°F within 2 hours of reaching 135°F and must be cooled to 41°F within 4 hours of reaching 70°F.
 - **Monitoring:** Use digital thermometer to take the internal temperature of largest portion of meat. Temperature measurements shall be taken from multiple locations throughout the walk-in cooler to ensure all products meet cooling temperature requirement.
 - **Corrective Action:** If temperature is not cooled to 70°F within 2 hours of reaching 135°F, reheat to 165°F and try another method to rapidly cool product as required or discard product. If product is not cooled to 41°F within 4 hours of reaching 70°F, discard.
 - **Records:** Document start time and start average temperature then the average temperatures at 2 and 6 hours on Batch Record Log.
 - **Verification:** PIC will verify that designated employees have met the critical limit and sign off on Batch Record Log prior to product being offered for retail sale.
 - *FSIS Appendix B Allowed: <https://www.fsis.usda.gov/sites/default/files/import/Compliance-Guideline-Stabilization-Appendix-B.pdf>
11. **Reduced Oxygen Packaging:** Assemble materials necessary to the operation. Assemble products that are to be packaged and ensure products do not exceed temperatures above 41°F during packaging for longer than one hour. Place product in the vacuum packaging, ensuring that adequate space is provided around each package. Verify the machine is working properly and settings are appropriate for the product being packaged. Start the machine and wait for the lid to open indicating that the process is complete. Remove package(s) from the machine. Visually check the seal to ensure that it is tight and that there are no food materials in the seal. Package(s) with a faulty seal should be re-packaged. Trim excess packaging as needed.

12. **Labeling:** Properly label each package with name of product, product net weight, business name and address including zip code, allergen information, and statement indicating product must be kept refrigerated or frozen. If refrigerated, include use-by date that is 30 calendar days from date of reduced oxygen packaging. If frozen, include a statement indicating product shall be consumed within 30 days of thawing. If product is stored frozen prior to being placed in refrigeration for retail sale, product must be re-labeled with a use-by date that is 30 calendar days from date of thawing.

12a. **Cooling (If Needed)** – Meats will not exceed temperatures above 41°F during packaging for longer than one hour. All meats will be cooled to ≤41°F prior to storage and/or display for retail sale.

13. **Cold Storage and/or Display of Finished Product (CCP #4):** If storing, place ROP packages in storage coolers and/or freezers. If intended for display for retail sale, ensure product is cooled to 41°F or less prior to being placed in display cooler.

- **Critical Limit:** Refrigerated products must be at or below 41°F. Frozen products must be maintained frozen in a solid state.
- **Monitoring:** The designated employees must visually check and record temperatures of coolers containing ROP products at least daily and record temperatures on the Product Storage Temperature and Labeling Log.
- **Corrective Action:** If ambient cooler temperatures exceeds 41°F, check actual product temperatures and if above 41°F, discard the product and notify the PIC that the cooler is not properly working. Record corrective actions on the Product Storage Temperature and Labeling Log.
- **Verification:** PIC will verify that designated employees have taken the required temperatures by reviewing Product Storage Temperature and Labeling Log on a daily basis.

14. **Retail Sale:** Product is purchased by consumer.

PROCEDURE FOR CLEANING AND SANITIZING OF EQUIPMENT

Food-contact equipment and utensils are cleaned every four hours if in use. Non-food-contact surfaces are cleaned at a frequency necessary to prevent accumulation of soil residues.

1. **Pre-cleaning** – *Equipment and utensils are pre-cleaned by pre-flushing, presoaking, or scraping as necessary to eliminate excessive food debris.*
2. **Washing** – *Equipment and utensils are washed in soapy water to remove or completely loosen soils using a manual method. Only approved chemicals are to be used in this process. Mix concentration according to manufacturer's recommendations.*
3. **Rinsing** – *Washed utensils and equipment are rinsed in water to remove soapy residue prior to sanitizing.*
4. **Testing Sanitizer Solution** – *Select appropriate test strip (chlorine, quaternary ammonia, or iodine) and test sanitizing solution prior to use daily to ensure appropriate concentration.*
5. **Sanitizing** – *After being washed and rinsed, equipment and utensils are sanitized with an approved chemical by immersion. Concentration and exposure times are important to ensure effectiveness of the chemical. Refer to the manufacturer's label for concentrations and times.*
6. **Air Drying** – *Allow all cleaned and sanitized equipment and utensils to air dry before stacking or storing. Do not use towels.*

**When a mechanical ware washing machine is used, follow manufacturer's instructions for use.*

PROCEDURE FOR EMPLOYEE TRAINING

Employees will be trained on each step of the food flow chart. Particular attention will be made to critical control points and proper documentation of logs. Employee training will be documented on the Employee Training Log. Employees will not be allowed to process sausage or ROP independently until Employee Training Log has been completed.

PROCEDURE FOR THERMOMETER CALIBRATION

Thermometers will be calibrated weekly. The designated food worker must record the calibration temperature and corrective action taken each time a thermometer is calibrated on the Thermometer Calibration Log. Thermometers intended for measuring hot temperature items shall be calibrated in hot water, while those used for cold temperatures shall be calibrated in ice water. The Thermometer Calibration Log will be reviewed, signed and dated by the PIC monthly. The log shall be maintained for a minimum of one year.

PROCEDURE FOR CHECKING SCALE ACCURACY

Scales will be checked for accuracy prior to weighing the cure for each batch. The scale will be checked for accuracy using a standard weight according to manufacturer's recommendation and recorded on the Food Scale Accuracy Log. PIC will sign and date Food Scale Accuracy Log prior to product being offered for sale. The log shall be maintained for a minimum of one year. The scale will be certified annually by a third party and a stamp of certification will be displayed on the scale. The scale shall not be used if it does not display the stamp of certification.

Prerequisite programs

Describe facility-wide considerations implemented in all phases of the food operation that allow active managerial control over personal hygiene and cross-contamination. Include standard sanitation operating procedures (SSOPs) that address the following: how employees comply with ND Food Code by preventing contamination from hands, minimizing cross contamination, cleaning and sanitizing procedures, and restriction or exclusion of ill employees. Include a description of the training programs that ensure food safety in the operation.

PROCEDURE FOR EMPLOYEE HEALTH & HYGIENE

1. *Hands are to be thoroughly washed for 20 seconds in a designated hand sink with soap and water, paying particular attention to the areas underneath the fingernails and between the fingers by scrubbing thoroughly. Dry with single use towels. Hand washing is to be done at the following times:*
 - *After using the toilet, in the toilet room*
 - *After coughing, sneezing, using a tissue, using tobacco, eating or drinking*
 - *After handling soiled equipment or utensils*
 - *Immediately before engaging in food preparation activities*
 - *During food preparation activities necessary to remove soil and prevent cross contamination*
 - *When switching between raw and ready-to-eat foods*
 - *Other times as needed to maintain good sanitation*
2. *Fingernails must be kept trimmed, filed, free of nail polish, and maintained so the edges are cleanable and not rough. Artificial nails are prohibited.*
3. *Eating and drinking is prohibited in areas where contamination of exposed food, clean equipment, utensils, unwrapped single service and single use articles could occur. A food employee may drink from a closed beverage container as long as it is handled to prevent contamination. Smoking and other uses of tobacco are prohibited.*
4. *Effective hair restraints must be worn in processing areas.*
5. *Clean outer clothing must be worn each day and changed as often as necessary throughout the day (when moving from a raw food operation to a ready-to-eat food operation). Footwear is to be kept clean. Aprons used by employees are to be hung in a designated area when not in use. They are not to be worn in the toilet area, eating areas, and locker rooms.*
6. *No jewelry (except a wedding band or other plain ring) is allowed during handling of food.*
7. *Food employees shall report to the person in charge when they have a symptom caused by illness, infection, or other source that is:*
 - *Associated with diarrhea, vomiting, or other acute gastrointestinal illness*
 - *Jaundice*
 - *A boil, infected wound, or other lesion containing pus that is open or draining unless: if on the hands and wrist, unless a finger cot or other impermeable cover protects the lesion and a single use glove is worn if on exposed portions of the arms, the lesion is protected by an impermeable cover.*

The person in charge shall impose the proper restrictions and exclusions and record on the Employee Illness Log.

Record-keeping

Attach all blank record-keeping forms employees will use for the processes covered in this HACCP plan. Procedures to monitor all SOPs (daily thermometer accuracy log, pH meter calibration log) shall be included. Procedures to monitor all CCPs (temperature logs for cooking, cooling, and storage; product pH testing log; corrective action logs; etc.) shall be included. The PIC shall verify all record-keeping documents by reviewing, dating, and initialing the logs.

SAMPLE

Product Storage Temperature and Labeling Log

Temperatures and labeling will be recorded daily during hours of operation

Date & Initials	Time	Walk-In Refrigerator Temperature	Display Unit Temperature	Freezer Temperature	Package Labeling	Corrective Action	Verified by PIC (Initials)

Thermometer Calibration Log

Date & Initials	Thermometer ID	Method Used (Ice Slurry or Boiling Water)	Thermometer Reading	Accurate (Yes or No)	Corrective Action	Verified by PIC (Initials)

Food Scale Accuracy Log

Date & Initials	Scale ID	Standardized Weight Used	Scale Reading	Accurate (Yes or No)	Corrective Action	Verified by PIC (Initials)

Employee Training Log

Name of Employee: _____

Date of Hire: _____

Documentation of Employee Training		
Topic	Trainee Date & Initials	Trainer Initials
Receiving Raw Meats, Dry Ingredients, & Packaging Materials		
Cold Storage of Raw Meats		
Storage of Dry Ingredients & Packaging Materials		
Prepare Raw Meats – Thaw, Cut, & Weigh		
Weighing Dry Ingredients & Cure (CCP #1)		
Adding Cure to Meat & Grinding Meat		
Mixing Ingredients		
Prepare & Stuff Casings		
Smoke/Cook (CCP #2)		
Cooling (CCP #3)		
Reduced Oxygen Packaging		
Labeling		
Cold Storage and/or Display of Finished Product (CCP #4)		
Cooling		
Thermometer Calibration		
Scale Accuracy		
Retail Sale		
Cleaning & Sanitizing Equipment		
Employee Health & Hygiene		
Record Keeping		

I verify that I am competent to perform all duties listed above.

Employee Signature and Date: _____

I have reviewed this training document and verify that this employee is competent to perform all duties listed above.

Employee Signature and Date: _____

Batch Record Log

Date & Initials	Recipe	Cure			Smoke		Cooling				Corrective Actions	Verified By PIC (Initials)
		Type & Lot Number	Weight added to batch	CCP #1 Met?	Final Temp	CCP #2 Met?	Start Time & Temp	Temp at 2 hrs.	Temp at 6 hrs.	CCP #3 Met?		

Employee Illness Log

Instructions: This log should be used to track employee absences due to illness.

- Employees are required to notify the Person in Charge (PIC) of any of the following:
 - Symptoms of vomiting, diarrhea, jaundice, sore throat with fever, and/or infected wounds
 - Diagnosis from a health practitioner of norovirus, hepatitis A, *Shigella*, *Salmonella* Typhi, nontyphoidal *Salmonella*, or Shiga toxin-producing *E. coli*. The PIC is required to record all reports of symptoms and diagnoses and to notify the Regulatory Authority of any of the diagnoses.

Report date	Employee name	Vomiting*	Diarrhea*	Jaundice	Fever	Respiratory (cough, sore throat, runny nose)	Comments or additional symptoms	Date returned to work	Diagnosed with a pathogen? (see list above)	If diagnosed, 1-800-472-2927 or local health agency contacted?
02/20/2020	John Doe	X	X				Sent home	6/15/2019	Yes – norovirus	Yes

***Employees with diarrhea or vomiting CANNOT RETURN TO WORK for at LEAST 24 HOURS after symptoms resolve.**