JOB COMPETENCIES

for Food Manufacturing

RECRUIT • TRAIN • RETAIN





All Food Manufacturing Skills at a Glance!

Defined by Industry for Industry

Go to www.foodskillslibrary.com to learn more

STEP 1: CHOOSE EASILY WHAT YOU NEED

Use this reference guide as starting point to create your Performance Assessments, Job-based Curriculum, In-house Training, Interview Questions, Orientation Checklists, Job Analysis, Team Reorganization and Much More!

Explore over 400 tasks that food manufacturers perform in their facilities and start planning how to create your HR documents.

STEP 2: CREATE YOUR HR DOCUMENT OR CURRICULUM

Create your HR documents and tools. Go to Food Skills Library at www.foodskillslibrary.com.

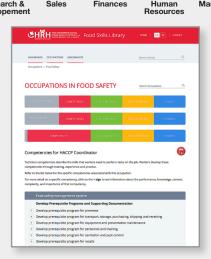
Access specific food manufacturing knowledge and skills language to create outstanding Performance Assessments, Job-based Curriculum, In-house Training, Interview Questions, Orientation Checklists, Job Analysis and Team Reorganization plans.

INSIDE THE FOOD SKILLS LIBRARY

The Food Skills Library is an online database that provides food manufacturers, workers, educators and job seekers online access to hundreds of documents, including job competency manuals, essential skills, job descriptions, skills assessment checklists, language benchmarks, and more for job positions in:













Resources can be downloadable in Word/PDF format at the Food Skills Library.

National Occupational Standards (NOS) reflect the expectations of today's food manufacturing industry and are benchmarks against what skills are required for an individual to be competent in their position. The NOS can be used to create diagnostic, formative, and summative assessment tools for hiring, training, program creation and certification. When employees meet the National Occupational Standard or NOS, they rank among the best in their profession in the country. The competencies needed for a successful career in the occupation are all carefully outlined.

Visit our website www.foodskillslibrary.com where you can enjoy a 3-month free trial going through our extensive food skills library.

FOOD SAFETY MANAGEMENT SYSTEM

Develop Prerequisite Programs and Supporting Documentation

- 1 Develop prerequisite program for premises
- Develop prerequisite program for transport, storage, purchasing, shipping and receiving
- 3 Develop prerequisite program for equipment and preventative maintenance
- 4 Develop prerequisite program for personnel and training
- 5 Develop prerequisite program for sanitation and pest control
- 6 Develop prerequisite program for recalls
- 7 Develop prerequisite program for other operational control programs

Develop Prerequisite Programs and Supporting Documentation

- 8 Assemble team
- 9 Describe product(s) and intended use(s)
- 10 Create process flow diagram and plant schematic
- 11 Verify process flow and plant schematic
- 12 Conduct hazard analysis
- 13 Determine critical control points
- 14 Establish critical limits
- 15 Establish procedures to monitor each critical control point (CCP)
- 16 Establish procedures to take corrective action
- 17 Establish verification and validation procedures
- 18 Establish record keeping and documentation control procedures

Implement Food Safety Management System

- 19 Communicate food safety management systems to management and staff
- 20 Verify programs and tasks are being completed as required
- 21 Review and validate food safety management system
- 22 Update program documentation

Comply with Food Safety Management System

23 - Comply with Food Safety Management System

Manage Audits

- 24 Develop system to manage audits
- 25 Develop tracking tools
- 26 Prepare for audits
- 27 Participate in audits

Implement Food Safety Management System

- 28 Communicate details of food safety management system to production staff
- 29 Participate in food safety incident investigations

FOOD TRACEABILITY

Manage Food Traceability

- 30 Create traceability system
- 31 Implement food traceability system
- 32 Maintain food traceability program

Comply with Food Traceability System

33 - Comply with food traceability system

RECALLS

Manage Recalls

- 34 Develop recall plan
- 35 Manage recall

Follow Recall Plan

36 - Follow recall plan

RISK MANAGEMENT

Manage Risk

- 37 Analyze risks of domestic operations
- 38 Analyze risks of international operations
- 39 Develop risk management plans
- 40 Implement risk management plan
- 41 Monitor implementation of risk management plan

ORGANIZATIONAL POLICIES AND PROCEDURES

Comply with Legislation/ Regulations

- 42 Determine applicable legislation/regulations
- 43 Assist regulatory agents/ inspectors
- 44 Interact with regulatory agents/inspectors

Comply with Organizational Policies and Procedures

- 45 Develop organizational policies
- 46 Develop Standard Operating Procedures (SOPs)
- 47 Implement organizational policies and SOPs
- 48 Comply with organizational policies and SOPs

SANITATION

Handle and Prepare Chemicals

- 49 Prepare cleaning chemical
- 50 Prepare sanitizer
- 51 Prepare chemical concentrations
- 52 Handle chemicals
- 53 Store chemicals
- 54 Manage chemical accidents
- 55 Conduct chemical risk assessment
- 56 Implement control measures
- 57 Develop chemical safety program

Clean Food Processing Equipment and Tools

- 58 Prepare for cleaning
- 59 Conduct daily cleaning for food processing equipment and tools
- 60 Deep clean food processing equipment and tools
- 61 Verify food processing equipment, tools and work surface cleanliness
- 62 Prepare for daily sanitizing of food processing equipment and tools
- 63 Perform daily sanitizing of food processing equipment and tools
- 64 Prepare for detailed sanitizing
- 65 Conduct detailed sanitizing of food processing equipment and tools

Oversee Facility Cleanliness

- 1 Develop facility cleaning processes
- 2 Verify cleaning process
- Monitor facility cleaning processes

Clean Facility

- 4 Clean facility
- 5 Operate cleaning machinery and equipment
- 6 Maintain cleaning machinery and equipment

Sanitize Facility

- 7 Develop facility sanitizing procedures
- 8 Sanitize facility
- 9 Monitor facility sanitizing processes

Implement Environmental Monitoring Process

- 10 Develop facility environmental monitoring process
- 11 Conduct organoleptic (visual, touch, smell) inspection
- 12 Conduct ATP hygiene monitoring
- 13 Conduct microbiological sampling

FOOD PRODUCTION MANAGEMENT

Plan for Equipment

- 14 Design plant equipment layout
- 15 Purchase equipment
- 16 Define process capacity

Install Equipment

- 17 Install equipment
- 18 Commission equipment

Set Strategic Direction for Food Production

- 19 Develop production plan
- 20 Develop production schedule
- 21 Review production reports

Implement Production Plan

- 22 Monitor production workflow
- 23 Monitor yield
- 24 Manage production problems
- 25 Adjust production workflow
- 26 Implement strategies to maximize personnel and equipment use
- 27 Assess availability of raw materials and packaging supplies
- 28 Prepare production reports

Monitor Cheese Making Production

29 - Monitor Cheese Making Production

Set Strategic Direction for Food Production

30 - Predict Yield for Cheese Making

FOOD PROCESSING

Prepare Raw Materials/ In-process Products

- 31 Thaw/Break-up ingredients/ products
- 32 Clean raw materials/in-process products
- 33 Prepare surfaces of raw materials/in- process products
- 34 Eviscerate fish and seafood
- 35 Debone/Fabricate fish and seafood cuts
- 36 Size raw materials/in-process products
- 37 Shape raw materials/in-process products
- 38 Crush/grind raw materials/ in-process products
- 39 Separate/filter/press raw materials/in- process products
- 40 Homogenize/emulsify raw materials/in- process products
- 41 Dry/Dehydrate raw materials/ in-process products
- 42 Re-hydrate raw materials/ in-process products
- 43 Sort/categorize/grade raw materials/in- process products
- 44 Chill/Freeze raw materials/ in-process products
- 45 Age raw materials/in-process products
- 46 Marinade/tenderize raw materials/in-process products

- 47 Temper chocolate
- 48 Sterilize/Pasteurize raw materials/in- process products

Transform Raw Materials/ In-Process Products

- 49 Batch raw materials/ in-process products
- 50 Mix/Blend raw materials/ in-process products
- 51 Knead dough
- 52 Add seasonings, flavourings or other additives
- 53 Bread/Batter/Sauce in-process products
- 54 Ferment/ Proof/Cure in-process products
- 55 Cook in-process products
- 56 Smoke in-process products
- 57 Add CO₂ to raw materials/ in-process products
- 58 Fill/stuff/encrust/wrap in-process materials
- 59 Assemble/Finish products

Operate Quality Control Monitoring Equipment

- 60 Calibrate quality control monitoring equipment
- 61 Use quality control monitoring equipment

EQUIPMENT AND TOOLS

Operate Food Processing Equipment

- 62 Conduct pre-operation check on food processing equipment
- 63 Start up food processing equipment
- 64 Monitor food processing equipment operation
- 65 Perform food processing changeovers
- 66 Perform minor maintenance on food processing equipment
- 67 Troubleshoot minor food processing equipment problems
- 68 Lock-out food processing equipment

Use Food Processing Hand and Power Tools

- 69 Use food processing hand and power tools
- 70 Use knives and saws

Operate Materials Handling Equipment

- 1 Conduct pre-operation check on materials handling equipment
- 2 Start up materials handling equipment
- 3 Monitor materials handling equipment operation
- 4 Perform minor maintenance on materials handling equipment
- 5 Troubleshoot minor materials handling equipment problems

Use Materials Handling Hand and Power Tools

6 - Use materials handling hand and power tools

Lock out Equipment

7 - Lock out equipment

Maintain Equipment

- 8 Develop preventative maintenance program
- 9 Conduct preventative maintenance
- 10 Conduct shutdown maintenance
- 11 Maintain parts inventory

Repair Equipment

- 12 Troubleshoot equipment malfunctions
- 13 Complete equipment repairs

FOOD PACKAGING

Package Product

- 14 Prepare packaging materials
- 15 Portion/weigh product
- 16 Fill and seal packages
- 17 Bottle/can in-process products
- 18 Label products
- 19 Tray/box products
- 20 Palletize products
- 21 Perform packaging change over

INSPECTIONS AND PRODUCT TESTING

Conduct Inspections

- 22 Conduct incoming inspections
- 23 Conduct pre-operational inspection
- 24 Monitor use of tools and equipment
- 25 Monitor Critical Control Points
- 26 Conduct changeover inspection

- 27 Conduct storage inspection
- 28 Conduct outgoing inspections

Conduct Product Tests

- 29 Conduct organoleptic (visual, touch, smell, taste) product testing
- 30 Conduct microbiological product sampling
- 31 Conduct analytical product testing
- 32 Conduct allergen sampling of finished products

QUALITY MANAGEMENT

Develop Quality Management Systems

- 33 Develop quality manual
- 34 Benchmark best practices
- 35 Create deviation management system
- 36 Create corrective and preventative action (CAPA) system
- 37 Create complaint and inquiry system

Implement Quality Management System

- 38 Communicate quality management systems to management and staff
- 39 Monitor quality management systems
- 40 Collaborate with product development team
- 41 Communicate details of quality management system to production staff
- 42 Liaise with production staff
- 43 Provide input into improving quality on the production line

Monitor Product Quality

- 44 Monitor quality of raw ingredients and in-process products
- 45 Monitor quality of raw meat
- 46 Grade/Inspect finished products
- 47 Inspect finished meat, game and poultry products
- 48 Monitor foreign body detection and removal equipment
- 49 Take corrective action to ensure product quality
- 50 Handle product nonconformances

Monitor Product Packaging

51 - Monitor quality of packaging

Manage Record Management

- 52 Establish record management policies and protocols
- 53 Monitor organization's record management systems
- 54 Monitor department's record management system

Complete Record Management Tasks

55 - Keep records up-to-date

RESEARCH AND DEVELOPMENT

Develop New Products

- 56 Manage new product development projects
- 57 Research consumer markets
- 58 Develop new product concepts
- 59 Develop bench-top prototypes

Conduct Experiments and Tests

- 60 Conduct shelf-life studies
- 61 Conduct microbiological challenge tests
- 62 Conduct nutritional analyses
- 63 Experiment with new food additives
- 64 Conduct sensory analyses

Conduct Trials

- 65 Complete product scale-ups
- 66 Analyze trial results

Commercialize Products

- 67 Provide input for equipment scoping and processes
- 68 Provide input into nutritional labeling
- 69 Provide input into product packaging

Improve Existing Products and Processes

- 70 Develop value-added products and processes
- 71 Provide input into innovative uses for excess raw materials and by-products
- 72 Provide input into cost optimization
- 73 Provide input into Improving manufacturing processes
- 74 Provide input into product development and improvement

FACILITY MAINTENANCE AND REPAIRS

Maintain Heating, Ventilation, Air Conditioning and Refrigeration System (HVAC-R)

- 1 Design facility HVAC-R system
- 2 Install facility HVAC-R system
- 3 Monitor facility HVAC-R system
- 4 Maintain facility HVAC-R system
- 5 Repair facility HVAC-R system

Maintain Electrical System

- 6 Design facility electrical system
- 7 Install electrical system equipment and components
- 8 Maintain electrical system
- 9 Service electrical system
- 10 Repair lighting systems
- 11 Evaluate potential to conserve electricity
- 12 Conserve electrical energy
- 13 Design facility plumbing system
- 14 Install plumbing equipment and components
- 15 Maintain plumbing system
- 16 Service plumbing system

Maintain Water System

- 17 Design facility water flows
- 18 Install water purification system
- 19 Maintain water purification system
- 20 Evaluate potential to conserve water
- 21 Conserve water
- 22 Monitor water flows

Maintain Wastewater System

- 23 Design facility wastewater management system
- 24 Install process facility wastewater system
- 25 Monitor facility wastewater management system
- 26 Repair facility wastewater management system

Maintain Piping System

- 27 Design piping system
- 28 Install process piping system
- 29 Maintain piping system
- 30 Repair piping system
- 31 Design steam system
- 32 Install steam system
- 33 Maintain steam system
- 34 Repair steam system
- 35 Evaluate potential to conserve steam
- 36 Conserve steam

Maintain Compressed Air/ Gas System

- 37 Design compressed air and gas system
- 38 Install compressed air and gas system
- 39 Maintain compressed air and gas system
- 40 Repair compressed air and gas system
- 41 Evaluate potential to conserve compressed air/gas
- 42 Conserve compressed air/gas

PEST CONTROL

Manage Facility Pest Control Program

- 43 Develop pest control program
- 44 Implement facility pest control program
- 45 Monitor facility pest control program

Comply with Facility Pest Control Program

46 - Comply with facility pest control program

WASTE MANAGEMENT

Manage Recycling Activities

- 47 Develop facility-wide recycling program
- 48 Implement recyclable collection program
- 49 Manage recycling program

Comply with Recycling Program

50 - Comply with recycling program

Manage Facility Waste (Solid and Liquid)

- 51 Develop facility waste management program
- 52 Monitor facility waste management activities

Comply with Facility Waste Management Program

- 53 Comply with facility waste management program
- 54 Complete facility waste collection activities
- 55 Handle hazardous waste

LOGISTICS

Manage Inventory

- 56 Establish inventory system
- 57 Maintain inventory system
- 58 Manage problem inventory
- 59 Complete cycle counts

Handle Inventory

- 60 Pick and pack orders
- 61 Prepare product for shipping
- 62 Receive product
- 63 Unload product
- 64 Provide inventory to production
- 65 Follow storage procedures

Manage Warehouse

- 66 Plan warehouse operations
- 67 Develop warehouse plan
- 68 Oversee warehouse operations

Manage Transportation

- 69 Design transportation network
- 70 Determine carrier requirements
- 71 Select carrier
- 72 Obtain transportation insurance

PURCHASING

Manage Purchasing

- 73 Research suppliers and prices
- 74 Choose suppliers
- 75 Oversee purchasing process
- 76 Issue claims to suppliers

Complete Purchasing Tasks

77 - Complete purchasing tasks

FINANCIAL MANAGEMENT

Manage Finances

- 78 Develop budget
- 79 Monitor budget performance
- 80 Develop product costing
- 81 Manage cash flow
- 82 Generate financial reports
- 83 Obtain alternative sources of funds

Complete Financial Tasks

- 84 Process payroll
- 85 Administer benefits
- 86 Process receivables
- 87 Process payables

WORKFORCE MANAGEMENT

Hire Staff

1 - Hire employees

Train Staff

- 2 Develop employee resources
- 3 Provide orientation to new staff
- 4 Plan training
- 5 Conduct training

Monitor Staff Performance

- 6 Maintain positive work environment
- 7 Motivate staff
- 8 Schedule staff
- 9 Conduct performance reviews
- 10 Address performance issues
- 11 Promote staff

Facilitate Staff Departures

- 12 Dismiss staff
- 13 Lay off staff
- 14 Process Resignations

Manage within a Union Environment

- 15 Comply with collective agreement
- 16 Respond to grievances
- 17 Maintain professional relationship with union
- 18 Participate in collective bargaining

HEALTH AND SAFETY

Comply with Occupational Health and Safety Program

- 19 Follow occupational health and safety program
- 20 Participate in emergency preparation
- 21 Direct accident/incident investigations
- 22 Participate in accident/incident investigations

Manage Facility Security

- 23 Develop facility security system
- 24 Conduct security exercises and drills
- 25 Monitor adherence to facility security program

Comply with Facility Security Program

- 26 Follow facility security program
- 27 Participate in security exercises and drills

Manage Worker's Compensation

- 28 Administer Worker's Compensation account
- 29 Manage Worker's Compensation claims

Set Strategic Direction for Workforce

- 30 Develop HR Plan
- 31 Develop succession plan
- 32 Allocate human resources
- 33 Develop compensation packages
- 34 Monitor implementation of HR Plan
- 35 Manage diversity in the workplace

Hire Staff

- 36 Provide input for job descriptions
- 37 Develop job descriptions
- 38 Assist with staff recruitment
- 39 Recruit staff
- 40 Screen candidates
- 41 Interview candidates

MANAGEMENT

Communicate Effectively

- 42 Use active listening skills
- 43 Use speaking skills
- 44 Use hand signals
- 45 Use writing skills
- 46 Conduct meetings and presentations
- 47 Manage internal and external communication

LEADERSHIP

Provide Leadership

- 48 Develop strategic vision
- 49 Develop organizational sustainability plan
- 50 Develop action plans
- 51 Implement action plans
- 52 Delegate tasks

Manage Organizational Change

- 53 Promote continuous improvement
- 54 Develop change management plan
- 55 Implement organizational change
- 56 Support organizational change

Demonstrate Professionalism

- 57 Collaborate with others
- 58 Develop professionally
- 59 Exhibit professional and ethical conduct
- 60 Mentor/coach others
- 61 Manage stress
- 62 Manage time

MARKETING

Set Strategic Direction for Marketing

- 63 Conduct situational analysis
- 64 Develop integrated marketing strategy
- 65 Develop branding
- 66 Develop pricing strategy
- 67 Monitor implementation of marketing strategy

Execute Marketing, Public Relations and Media Relations Strategies

- 68 Provide information about products and services
- 69 Advertise products and services
- 70 Produce marketing/ promotional materials
- 71 Distribute marketing/ promotional materials
- 72 Develop marketing/ promotional events
- 73 Oversee promotional events
- 74 Develop online presence
- 75 Develop contests
- 76 Develop trade sales promotions
- 77 Participate in industry shows
- 78 Conduct public relations activities
- 79 Manage crises and controversies

Manage Occupational Health and Safety Program

- 1 Develop occupational health and safety program
- 2 Lead emergency preparation
- 3 Conduct safety inspections
- 4 Evaluate occupational health and safety program

SALES AND CLIENT RELATIONS

Manage Sales and Client Relations

- 5 Provide customer service
- 6 Handle customer concerns or complaints

Maintain Client Relationships

- 7 Provide customer service
- 8 Handle customer concerns or complaints

Sell Products and Services

- 9 Qualify customer
- 10 Conduct sales calls and presentations
- 11 Overcome customer objections
- 12 Develop quotes
- 13 Close sales
- 14 Process sales
- 15 Follow up on sales

SALES

Information Technology (IT) Systems

- 16 Develop IT plan for production systems
- 17 Develop IT policies and procedures

SPECIFIC SKILLS FOR INDUSTRIAL CHEESE MAKING

CHEESE MAKING

Prepare Milk

- 18 Receive Milk
- 19 Remove Micro-organisms from Milk
- 20 Pasteurize/Heat Treat Milk
- 21 Homogenize Milk
- 22 Batch Milk

Use Cheese Making Technique

- 23 Add Coagulating Agents and Other Additives
- 24 Process Coagulum
- 25 Form Cheese Products
- 26 Salt In-Process Cheese
- 27 Prepare Ingredients to Add to Cheese
- 28 Complete Post-Production Cheese Making Tasks
- 29 Age In-Process Cheese Products
- 30 Prepare Whey-Based Cheese Products

Evaluate Cheese

- 31 Perform Sensory Evaluation of Cheese
- 32 Perform Tests on Cheese

MEAT CUTTING

Use Meat Cutting Techniques

33 - Use required cutting method

SPECIFIC SKILLS FOR

INDUSTRIAL MEAT CUTTER

- 34 Size meat cuts
- 35 Shape meat cuts
- 36 Produce ground meat

Fabricate Meat Cuts for Beef/Veal

- 37 Breakdown beef/veal carcass into primal cuts
- 38 Cut beef/veal sub-primal cuts
- 39 Cut beef/veal retail cuts

Fabricate Meat Cuts for Pork

- 40 Breakdown pork carcass into primal cuts
- 41 Cut pork sub-primal cuts
- 42 Cut pork retail cuts

Fabricate Meat Cuts for Lamb

- 43 Breakdown lamb carcass into primal cuts
- 44 Cut lamb retail cuts

Fabricate Meat Cuts for Farmed Game Animals

- 45 Breakdown farmed game carcass into primal cuts
- 46 Cut farmed game into retail cuts

Fabricate Cuts for Poultry and Game Birds

47 - Fabricate retail & specialty cuts for poultry /game birds

SLAUGHTERING

Prepare Animals for Dressing and Evisceration

- 48 Receive animals
- 49 Slaughter animals

Dress and Eviscerate Animals

- 50 Prepare surfaces of slaughtered animals
- 51 Eviscerate slaughtered beef/veal
- 52 Eviscerate slaughtered pork
- 53 Eviscerate slaughtered lamb and other small ruminants
- 54 Eviscerate slaughtered poultry and game birds
- 55 Eviscerate slaughtered farmed game animals
- 56 Clean carcasses

Visit www.foodskillslibrary.com to see the knowledge and skills required to perform each of the food manufacturing task.