

The Safer Food In Schools Project

Food Safety Unit Plan + Provincially Approved Safe Food Handler Certificate Curriculum Support Resource

This resource is intended to support teachers teaching food safety curriculum content as part of food and nutrition, hospitality tech, childcare, careers and other relevant school courses and programs. Content aligns well with expectations in various courses. Course integration will vary depending on province, country, locale. Course curriculum and content has been developed by a Certified Public Health Inspector and Certified Teacher to bring you the best in Food Safety content in a succinct way. An all-in-one program that can be used as your food safety unit or as an add-on, while adding a real life and valuable certification onto your course. It provides reliable and credible curriculum content that will enable you to teach the various expectations related to food safety in a fun and engaging way. Contact us for more info/resources.

LEARNING CHART TOPIC: RESEARCH & INQUIRY SKILLS

| Topics Included | Teacher Background Information & Activities/Links for Students |
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| 1. Food Safety Legislation & Important Regs | <ul style="list-style-type: none">• Ontario Regs• Legislation Game• Federal, Provincial and Municipal Responsibilities• Roles of Workers in Food Safety• Role of Health Inspectors• Day in the Life of an Inspector - and Inspector Detective Activity• Cartoon Health Inspector Video |

Contamination & Foodborne Illness

- Gordon Ramsey - Funny "Kitchen Nightmare" clips to illustrate food hazards and how contamination can happen in a kitchen.
- Food Borne Illness & Vulnerable Populations
- Symptoms of Food Borne Illness
- Food Contamination: direct vs. indirect, types of contamination (i.e. physical, chemical, microbiological), examples of each, and checklists for preventing them when working with food.
- Types of microbial contaminants (I.e., virus, bacteria, parasites etc..), and checklist/key tips for preventing them.
- Mid Module Anagrams Game – (Real life scenarios are presented and students think critically to unscramble words into the correct answer). A fun way to test and learn key concepts.
- Good microorganisms and some of their uses in food production and health (i.e. bread making, yogurt, probiotics), along with an educational video.
- Spoilage Organisms - Apples rotting? What causes it and why? Signs of spoilage organisms in food and what workers/students should do if they spot spoilage at home, at work, and at school, whether in inventory or personal supplies.
- Pathogens (What are they, types, concerns).
- Infection vs Intoxication - (What is the difference, how to spot each, and how they can happen).
- Carl Winters - Pathogen song/sing-along music (ha, ha) (Suggested add-on in-class activity – For a great add-on lesson/activity, have students form groups and make their own rap/music song/video/performance.
- Specific types of pathogens and contaminants of concern in food and food safety. The material goes through each one specifically, and includes type, symptoms, incubation period, cause, prevention strategies. (Salmonella, Staph. aureus, E.coli, Bacillus Cereus, Virus, Parasites, Fungi, Mold, Yeast, Allergies, Chemicals).
 - "Who Am I Detective Game" Pathogen section culminates in a "Who Am I game", where students can use the previous pages or download a reference chart to help them solve riddles. (Based on the information provided students must figure out who/what the organism/substance is). A great way to encourage critical thinking and a fun way to get your students learning about different organisms and substances of concern in food safety. Take it to a level higher than rote memorization! Activity Suggestions: For in - person courses we play this game by giving students a copy of our manual and/or dedicated pages as reference charts. Each group gets one/a few cards (depending on numbers) with the riddle on it and "Who Am I" on the flip side. Each group reviews their riddle and attempts to figure it out. Once the class has figured out their specific cards, one person from each group read the card and the rest of the class (non-group members) must call out who/what it is. This is a great activity to encourage the whole class to learn

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| | <p>microorganisms of concern, without just needing to memorize. Turning it into a guessing/detective game makes it fun.</p> <ul style="list-style-type: none"> • "Hitch" movie scene – kick off food allergies & intolerances with some comedy – your students will love it! • Common food allergies and intolerances w/ signs of each. • Allergy: Tips for prevention while working with/handling food. • Allergy vs Intolerance Game - Place it • Review |
| <h3>3. Growth of Microorganisms</h3> | <ul style="list-style-type: none"> • Bacterial Growth Requirements (FATTOM) • Food, Acid/Alkaline, Time, Temperature, Oxygen, Moisture/Water • How FATTOM components work together to impact whether pathogens can grow and how your students can manipulate them to prevent pathogens from growing and spreading around your classroom while working with food. • Holding/Storage Temperatures (fridge, freezer, hot holding, room temp policies for risk reduction). • “Will You Survive” – Bacterial Growth Game. A Pac-Man-like game where students must run their player through the maze to the correct answer without being eaten by enemies. A fun way to learn and test knowledge of growth requirements and concepts. • Hazardous foods, types and high vs low risk foods • Hazardous Foods Game – Order it. • Review – Hangman Game – Great way to learn and review important key concepts. |
| <h3>4. Safe Food Handling</h3> | <ul style="list-style-type: none"> • Gordon Ramsey Video – “Kitchen Nightmares” - What can go wrong: Exposing students to real life hazards when working with food. Get them thinking about how they would feel if they were the customer and how they could prevent those hazards as the food handler. • Food Safety Sequence – Freezing, Thawing, Refrigeration, Cooking, Room Temperature Holding (i.e. display/dry storage), Hot and Cold Holding, Cooling, Reheating. All food goes through each stage, so what can your students do at each stage to ensure food remains safe for themselves, your school and their peers). • Checklists & Tips for each stage – helps students understand best practice for each process so they can reduce risks in the classroom, at home, or on the job. |

- Hot Holding – Educational video demonstrates how it is done
- Storage “Match It” Game
- Cooking – Thermometer types, how to use, and how to calibrate a probe to ensure accuracy.
- “Use A Digital Thermometer” Video to show how it is done correctly.
- Internal Cooking Temperatures for Various Hazardous Foods – Great for students to learn and know for cooking in school, at home, as well as at work.
- Cross Contamination with “Good Chef, Bad Chef”. A great way for students to identify what practices are good and which are potentially hazardous.
Suggested Add-On Activity: Beet/Cucumber Show - Get two students to help you demonstrate what cross contamination is by using a beet and cucumber or piece of celery. Have both students pull a piece of beet out of a container that is filled with water. Tell the class the beet is raw meat, and the liquid is the blood of the meat. Pour some of the liquid over the beet, as the students place it on the cutting board. (Ensure students take the beet out with their bare hands). Tell them to begin chopping/slicing. Next, have each student grab a piece of the cucumber or celery. Have them place the cucumber/celery on same cutting board and tell them to chop. The knife likely had red from the beet on it, the juice of beet perhaps touched cucumber/celery, and the hands also touched the beet and then celery/cucumber demonstrating perfectly the 3 most common means of cross-contamination. Inform them they have just demonstrated cross contamination. Now you can use the activity to ask them how it happens and based on experiment how they can prevent it. We love this activity!! Gets them teaching themselves, rather than you teaching them.
- Storage – Correct placement of food in the Fridge to prevent cross contamination.
- Get Into The Groove with Carl Winters – Handwashing Jingle
- The ABC’S of Handwashing: When to? The Before and After
- Handwashing Procedure – Instructions and paint video for effective handwashing.
- Handwashing Game – Order it.
- Review – Maze Chase – PacMan Game

5. Personal Hygiene

- Kitchen Scandal Video – Having students identify all the hard NO’s is a great way to kick off the personal hygiene section and get students thinking about what NOT to do in a kitchen. Have them watch the video and identify some of the NO’s and alternate practices that may be more beneficial. Great way to encourage learning and risk reduction in the classroom, at home, and on the job.
- Handwashing Revisited
- Glove Use
- Clothing and Aprons
- Hair Covers
- Illness
- Smoking
- Personal Hygiene – Educational Video
- Review – Airplane Flight Game – Questions appear on the bottom of the screen and students fly into the correct answers as answers move across the page. Great for students to learn and remember important concepts.

6. Sanitation & Maintenance

- Gordon Ramsey – “Kitchen Nightmares” – What a Pest Video.
- Cleaning vs Sanitizing – What is the difference.
- Approved sanitizers and how to use each safely and effectively (heat vs. chemicals).
- Dishwashing: Manual/Mechanical dishwashing and procedures.
- Find The Match – Game Review.
- Pest Control and Checklist for Prevention.
- Pest Management – Airplane Game Review.
- Waste Disposal – Proper Protocol and Checklist & Tips.
- Review.

7. HACCP

- “The Office” – Fun video clip to demonstrate effective vs non-effective planning.
- HACCP – What it is and how it works as a holistic system.
- HACCP Principles:
 - ***Principle 1*** - Conducting a Hazard Analysis
 - ***Principle 2*** - Identifying the Critical Control Points (CCP's)
 - ***Principle 3*** - Establishing Critical Limits
 - ***Principle 4***- Monitoring CCP's
 - ***Principle 5*** - Establishing Corrective Action(s)
 - ***Principle 6*** - Verification
 - ***Principle 7*** – Recordkeeping
- Review

Note: This is an overview. You are free to include/exclude what you feel useful as part of your course. You will have authorized access to our exam, if you will be certifying students as part of your food safety unit. Hence, you can cater your instruction to the most important and key points. A Poetic Health is always coming up with new resources and content. As new instructional materials and lesson ideas become available, they will be added to your folder of available resources, for which you may utilize during the duration of your membership.

We hope to bring you onboard. In the meantime - Keep on Sizzlin'!!