



STAGE 05: Designing a Healthy Recipe

Students will learn about grains as part of a healthy diet; they provide carbohydrates, protein, fat, and several minerals important for good health. Grains are versatile and used in many ways. They combine well with other flavours to create imaginative and tasty food.

Students will also learn which grains are grown in Ontario: barley, corn, oats, soybeans, and wheat.

Lesson 1: Grains in our Diet

Lesson 2: Market Research

Lesson 3: Designing a Healthy Recipe

LESSON 3 – Designing a Healthy Recipe

Overview:

Students will learn how to create and follow a recipe. They will begin by understanding the parts of a recipe and why they provide steps to follow. Using a basic granola bar recipe as an example, students will create their own recipes, incorporating their flavour profiles.

A list of educator-recommended recipes follows the Teaching Notes.

Learning Goals

- Understand the parts of a recipe.
- Know how to follow the steps of a recipe.
- Apply all the things we have learned so far in STEMterprise.



Materials Needed

- Lesson Slides
- Recipes: a cookbook, recipes on cards, or Internet access to online recipes
- Copies of the Recipe Planning Template (download with this lesson) for each student or business group
- Measuring cups (dry and wet) and measuring spoons

Time Frame: 40min

Curriculum Expectations

Health and Physical Education Curriculum

Strand D Healthy Living

- D1.1 Understand food origins, nutritional value, and environmental impact
- D3.1 Make connections for healthy living through local and cultural foods, eating choices

Mathematics Curriculum

Strand E Spatial Sense

- E2.3 Use non-standard units appropriately to estimate, measure, and compare capacity, and explain the effect that overfilling or underfilling, and gaps between units, have on accuracy
- E2.4 Compare, estimate, and measure the mass of various objects, using a pan balance and non-standard units
- E2.5 Use various units of different sizes to measure the same attribute of a given item, and demonstrate that even though using different-sized units produces a different count, the size of the attribute remains the same
- E2.6 Use analog and digital clocks and timers to tell time in hours, minutes, and seconds



Language

Strand D Expressing Ideas and Creating Texts

- D1.1 Identify the topic, purpose, and audience for various texts they plan to create, and describe how the chosen text form and genre will help communicate their intended meaning
- D1.2 Generate and develop ideas about given and chosen topics, using various strategies, and drawing on various resources, including their own lived experiences, and learning from other subject areas
- D1.3 Gather information and content relevant to a topic, using three or more sources
- D1.4 Sort and sequence ideas and information, using appropriate strategies and tools, taking into account the text form and genre to be used

Agriculture/Agri-Foods Themes

- Grains are important ingredients in many healthy foods. They combine well with other flavours to create imaginative and tasty food.

Media Links

Embedded in the slides

- Needing a recipe <https://www.tiktok.com/@kyleistook/video/7335496005284154667?q=making%20pizza%20at%20home&t=1724851652916>
- Granola Bar Base Recipe <https://cookieandkate.com/best-granola-bars-recipe/print/36145/>

In teaching notes only

- Whole Grains <https://www.youtube.com/watch?v=whwkeG9msLM>



Teaching Notes

Slide 6: Minds ON!

Show students this Tik Tok video and ask them to pay close attention.

<https://www.tiktok.com/@kyleistook/video/7335496005284154667?q=making%20pizza%20at%20home&t=1724851652916>

After they view it, ask students if they would be able to make the pizza? Or is it pizza sandwich?

Would they know:

- How to make the dough?
- How much cheese they'd need? Or what kind?
- How long to bake to bake them?
- How much sauce to put on?

Ask students to consider what they'd need to be able to replicate this yummy looking pizza sandwich? Perhaps some instructions? What would they call that?



<p>Slide 7: Basic Parts of a Recipe</p>	<p>Note for teachers: bring in a recipe book or let students look at granola bar recipes online.</p> <p>This could be done as a whole-class group or in business groups.</p>
<p>Slide 8: Basic Parts of a Recipe</p>	<p>Note for teachers: bring in a recipe book or let students look at granola bar recipes online.</p> <p>This could be done as a whole-class group or in business groups.</p>
<p>Slide 9: Write Your Recipe</p>	<p>Show students the recipe on the next slide. You may wish to print it and provide copies to each student or business group.</p> <p>The Recipe Planning Template is provided as a separate download.</p>
<p>Slide 10: Granola Bar Base Recipe</p>	<p>Whether or not you'll be making the granola bars, show students the measuring cups and explain the difference between measuring wet and dry ingredients (e.g., $\frac{3}{4}$ cup in dry measuring cups and $\frac{1}{2}$ cup of liquid in a glass measuring cup). Show them the measuring spoons and which measuring spoon is 1 full teaspoon and which is $\frac{1}{2}$.</p> <p>If your class is nut free, try using soy butter in place of the peanut or almond butter.</p>



<p>Slide 11: Recipe Planner</p>	<p>Lead students through the parts of the planner and ask them to describe how each part helps a baker create the recipe.</p> <p>Remind students to incorporate their flavour profile.</p>
<p>Slide 12: Wrap up</p>	<p>If you have added material to or removed material from the various steps to this point, confirm that students have completed the work to ensure their success.</p>

Educator-Recommended Recipes

<https://sunbutter.com/recipe/harvest-granola-bars/>

<https://www.pamperedchef.ca/pws/crystaldillon/recipe/Appetizers+%26+Snacks/Baked+Granola+Bars/1409319>

<https://www.eatingbirdfood.com/nut-free-granola-bars/#wprm-recipe-container-109525>

<https://www.cookspiration.com/recipe.aspx?perma=KiWeDjW7ioQ&q=20>

<https://cookieandkate.com/best-granola-bars-recipe/>

<https://www.youtube.com/watch?v=zqspUDzr6Xk>

Assessment Resources. Coming soon!

Please check the STEMterprise webpage at <https://goodineverygrain.ca/ontario-farming-stemterprise/>

Granola Bar Recipe Planner



Granola Bar Name	
Ingredients	<hr/> <hr/> <hr/> <hr/> <hr/>
Materials/Equipment	<hr/> <hr/> <hr/> <hr/>
Yield	<hr/> <hr/>
Temperature	
Preparation Time	

Granola Bar Recipe Planner



Steps

1.

2.

3.

4.

5.

6.