



# SCIENCE

# 7

# Food Value Chain

**SUBJECT AREA:** SCIENCE

**GRADE:** 7



## GENERAL LEARNER OUTCOMES

### Unit A: Interactions and Ecosystems

#### Students will:

Become aware of the intended and unintended consequences of human activity and recognize the need for responsible decision making and action.



## SPECIFIC LEARNER OUTCOMES

#### Students will:

- 2. Trace and interpret the flow of energy and materials within an ecosystem.
- 4. Describe the relationships among knowledge, decisions and actions in maintaining life-supporting environments.





## ASSESSMENT

**Students will provide evidence of learning by:**

Creating a (group) Google Slide presentation that presents an Alberta agricultural example of how a producer has become aware of the intended and unintended consequences of human activity. As well as how it recognizes the need for responsible decision making and action in their contributions to the food value chain.



## MATERIALS

**The Food Supply Chain - Americold (3:02 min)**

**Free Range Alberta Pork Farm (3:53 min)**

**Alberta Farm Fresh Producers Association**



## LEARNING RESOURCES

Alberta Education Programs of Study



# TEACHER INSTRUCTIONS

## Food Value Chain

We must increase awareness of the intended and unintended consequences of human activity through the use of various agricultural practices, and recognize the need for responsible decision making and action. Agricultural producers in Alberta are demonstrating their ability to move away from practices that can harm the environment through degradation of the land, control of pest problems, and the disposal of agricultural waste. This student assignment will allow students to showcase some Alberta producers. Students will describe how producers' efforts to support growth and health of products in their farming environment have led to successes in their participation in the food value chain.

### View and Discuss

#### The Food Supply Chain - Americold (3:02 min)

Alberta Producer example:

Bear and the Flower: A free-range pork farm near Irricana, Alberta is helping redefine the way we think of small hands-on farming. They are enhancing the food value chain by "setting the highest standards for ethical treatment, nutrition, genetics, and food safety."

#### Free Range Alberta Pork Farm (3:53 min)

Discuss what this pork producer has done to initiate an enhanced food value chain:

- Why do farmers work with other stakeholders of the food value chain to enhance their product?
- How are Bear and the Flower enhancing their product? Is it for the money that comes from following consumer trends? Is it to benefit the environment/animals' welfare? Or both?
- Often companies working together in a value chain hold the same values. What values do the pork producer and the restaurant share?
- How are they showing consumers that these values are important to them?
- Why are these sustainable practices important to the future of their value chain?

**If students are challenged with finding an Alberta producer, the following link provides links to producers in a variety of commodity types:**

[Alberta Farm Fresh Producers Association](#)





# STUDENT ASSIGNMENT

## Food Value Chain

In order to be successful as part of a food value chain, agricultural producers in Alberta, like farmers and ranchers, find it beneficial to work together with their food value chain partners. What do these producers do to make responsible decisions and actions as they participate in activities as members of a food value chain?



Your assignment is to present the “Farm to Fork” experiences of an Alberta agriculture commodity producer as they work together with their food value chain partners. With a group of 2–3 students you will follow the outline to complete your research on Google Slides.



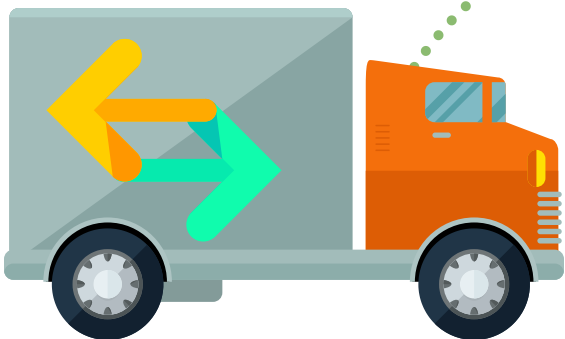
# STUDENT ASSIGNMENT

## Food Value Chain

### SLIDE OUTLINE:

1. Title slide that fully captures audience's attention (include group names).
2. Describe your producer's involvement in agricultural production.
3. What decisions has the producer made to enhance the growth, health, and sustainability of their product in their farming environment?
4. What does the producer do to interact with other members of their food value chain?
5. How have the producer's decisions helped their role in the food value chain?
6. Can you suggest other things the producer can do to be more successful in their food value chain?
7. Bibliography.

In a 7–10 minute presentation, using your slides, you will explain your research on the “Farm to Fork” experience of an Alberta agriculture-commodity producer as they work together with their food value chain partners. Be prepared to answer accurately any questions related to the facts presented on the slides. Each student in your group must have a speaking role. If you are unable to present live, insert audio your group members have recorded to further explain the slide content.



Objectives	Excellent	Proficient	Satisfactory	Limited
<b>Title Slide</b>  Slide includes your group names and an eye-catching image.	Fully captures the attention of the audience. Topic has a clear focus.	Captures the attention of the audience. Topic is focused.	Few audience members seem interested. Topic focus is vague.	Audience is not captured. No topic focus.
<b>Preparation</b>	Students created a clear plan and carefully chose roles and tasks for each team member. They managed their time well and worked together to share the workload.	Students had a rough plan and tasks for each team member. They generally managed their time and worked together to share the workload.	Students would have benefitted from more defined roles and task assignments as well as overall better time management.	Students did not create a clear plan or assign roles and did not manage their time well.
<b>Organization</b>  Introduction (title slide), body content and bibliography.	Presented findings in an organized manner and interesting sequences that were easy to follow.	Presented findings with some degree of organization and a logical sequence that the audience could follow.	Information and graphics are placed haphazardly throughout.	Audience cannot understand the presentation because there is no sequence and information is disorganized.
<b>Information</b>	Students showed a comprehensive understanding of the topic. Their information was accurate and well researched and their assignment was well supported by facts.	Students showed an understanding of the topic. Their information was accurate and their assignment was supported by facts.	Students showed some understanding of the topic, but their research was incomplete and/or their assignment was not supported by facts.	Students demonstrated little or no understanding of the topic. They did not appear to have done much research and their assignment was not supported by facts.
<b>Presentation</b>	Presentation included 8–10 slides. Information on slides was kept short and students expanded on information.	Presentation included 7 slides. Information on slides contained many sentences and the group had some difficulty explaining ideas beyond the information in the slides .	Presentation included 6 slides. Information on slides contained many sentences and the group had difficulty explaining ideas beyond the information in the slides.	Presentation included less than 6 slides. Information on slides contained many sentences, and group did not expand on information presented in the slides .