

# Celebrating Liberation with a Promise



# Introduction

Welcome to Celebrating Liberation with a Promise.

This program was created to celebrate the 75<sup>th</sup> anniversary of the Canadian Forces' role in the Liberation of Europe at the end of World War II. Our goal is to raise awareness, pay respect and honour the men, women and families that contributed. The 'Canadian Liberator' tulips will create a striking visual display in the Spring of 2020.

Program development partners:

- BC Agriculture in the Classroom Foundation
- Van Noort Bulb Co. Ltd.
- Florissa
- Dutch Liberation Canadian Society 2020

Written by:  
Gail Chan



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# Teacher Background

When we think of tulips, World War II and the Netherlands, we may ask the question: what are their common threads and what can we learn from how they are associated?

Building upon the knowledge and skills from the Planting a Promise Unit, we can extend and engage students' learning through tulips. By integrating historical events like World War II with skills such as farming and survival off the land, students will be taught to remember and learn from the past in order that they can work towards a positive future.

Students will have the opportunity to explore, observe and examine tulip bulbs. They will then identify various locations in their school yard that are suitable to plant their bulbs based on various criteria. The students will select growing locations in their schoolyard to represent different growing conditions. By monitoring and collecting data from these locations during the plant's growth cycle, the student's understanding of the tulip cycle will be enhanced.





# Tulip History

Tulip bulbs have a very interesting and diverse history. The name “Tulip” comes from the word Tulipa. This Latin word means “the flower that looks like a turban”. Historically tulips were sold and traded in Turkey during the Middle Ages. Turkish men often wore turbans which looked a lot like the flower bulb.

In 1550, tulips were given as gifts to special guests by the leader of Turkey, the Sultan. Eventually, some of these tulip bulbs arrived in the Netherlands through a person named Carolus Clusius. Tulips were bought and sold as a valued commodity, particularly between the period 1634-1637 known as Tulipomania.

Over time, Dutch farmers developed a good sense of the conditions needed to cultivate flower bulbs. Through tulips, Dutch people have developed a strong connection with their culture and their land. The Netherlands is the world's largest commercial producer of tulips, with around three billion exported yearly. Every year, the Dutch people celebrate the tulip flower through festivals, and parades . The tulip has even become the unofficial flower for the Netherlands.



## World War II (1939-1945)

Fast forward to the fall of 1944 when Nazi Germany occupied Holland. The Dutch people were starving because their food and often livestock were taken by their German oppressors. As the land and the people of Holland were under seige, a desperate mindset existed. The Nazis had taken all food sources so many of the Dutch people outside of the cities were forced to eat the bulbs they cultivated. During these times of famine, eating bulbs was their only means of surviving.

(For more detailed information, please visit the Veterans Affairs Canada website at [www.vac-acc.gc.ca](http://www.vac-acc.gc.ca))



# Spring of 1945

During the war, the Royal Family of the Netherlands had escaped capture and found refuge in Canada. In 1943, Princess Margriet was born in Ottawa. An Ottawa hospital room was hastily made a territory of the Netherlands, so that she could be born on Dutch soil. In the spring of 1945, the Canadian Army joined with other Allied countries in their final push to liberate the Netherlands from Nazi occupation. Allied forces recaptured canals, farmland and cities through hard fought battles. The Royal Canadian Air Force made air-drops of food to provide some relief to the starving Dutch population. Many Canadian troops lost their lives fighting to free the Dutch people. Liberation of the Netherlands was marked by the surrender of German forces on May 5, 1945.

Since that time, a strong friendship has existed between Canada and the Netherlands. This connection of affection and respect continues to be expressed each spring in Ottawa, our nation's capital, through a gift of tulips from the Netherlands. Furthermore, a great deal of attention is paid to the burial places of Canadian war dead in Holland by Dutch school children. Canadians played a significant role in the liberation of Holland from Nazi oppression and they will forever be honoured for their sacrifice by the Dutch people.

Between 1947-1954, about 94,000 Dutch immigrants came to Canada. Many of these families had an agricultural background and they settled on farmland across the southern regions of Ontario, Alberta and to a lesser extent other provinces.



# Curriculum Connections

Grade	Subject	Big Ideas	Curricular Competencies	Content Connections
Kindergarten	Science	<ul style="list-style-type: none"> <li>Plants and animals have observable features.</li> <li>Daily and seasonal changes affect all living things.</li> </ul>	<ul style="list-style-type: none"> <li>Demonstrate curiosity and sense of wonder about the world.</li> <li>Observe/ask simple questions about objects and events in familiar contexts.</li> <li>Experience and interpret the local environment.</li> <li>Represent observation and ideas by drawing charts and simple pictographs.</li> </ul>	<ul style="list-style-type: none"> <li>Basic needs of plants and animals.</li> <li>Living things make changes to accommodate daily and seasonal changes.</li> </ul>
	Social Studies	<ul style="list-style-type: none"> <li>Stories and traditions about ourselves and our families reflect who we are and where we are from.</li> <li>Our communities are diverse and made of individuals who have a lot in common.</li> </ul>	<ul style="list-style-type: none"> <li>Use Social Studies inquiry processes and skills to ask questions; gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>Explain the significance of personal or local events, objects, people or places.</li> <li>Recognize causes and consequences of events, decisions, or developments in their lives.</li> </ul>	<ul style="list-style-type: none"> <li>Relationship between the community and environment.</li> </ul>
Grade 1	Science	<ul style="list-style-type: none"> <li>Living things have features and behaviours that help them survive in their environment.</li> </ul>	<ul style="list-style-type: none"> <li>Demonstrate curiosity and sense of wonder about the world.</li> <li>Observe/ask simple questions about objects and events in familiar contexts.</li> <li>Experience and interpret the local environment.</li> <li>Sort and classify data and information using drawings, pictographs and provided tables.</li> <li>Compare observations with predictions through discussion.</li> </ul>	<ul style="list-style-type: none"> <li>Names of local plants and animals. Behavioural adaptations of animals in the local environment.</li> </ul>
	Social Studies	<ul style="list-style-type: none"> <li>Healthy communities recognize and respect the diversity of individuals and care for the local environment.</li> </ul>	<ul style="list-style-type: none"> <li>Use Social Studies inquiry processes and skills to ask questions; gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>Ask questions, make inferences, and draw conclusions about the content and features of different types of sources.</li> </ul>	<ul style="list-style-type: none"> <li>Relationship between the community and environment.</li> </ul>



Grade	Subject	Big Ideas	Curricular Competencies	Content Connections
Grade 2	Science	<ul style="list-style-type: none"> <li>• Living things have life cycles adapted to their environment.</li> <li>• Water is essential to all living things, and it cycles through the environment.</li> </ul>	<ul style="list-style-type: none"> <li>• Demonstrate curiosity and sense of wonder about the world.</li> <li>• Observe/ask simple questions about objects and events in familiar contexts.</li> <li>• Experience and interpret the local environment.</li> <li>• Sort and classify data and information using drawings, pictographs and provided tables.</li> <li>• Express and reflect on personal experiences of place.</li> </ul>	<ul style="list-style-type: none"> <li>• Similarities and differences between offspring and parent.</li> <li>• Water sources including local watersheds.</li> <li>• Water conservation and the water cycle.</li> </ul>
	Social Studies	<ul style="list-style-type: none"> <li>• Local actions have global consequences, and global actions have local consequences.</li> <li>• Canada is made up of many diverse regions and communities.</li> </ul>	<ul style="list-style-type: none"> <li>• Ask questions; gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>• Explain why people, events, or places are significant to various individuals and groups.</li> <li>• Recognize the causes and consequences of events, decisions, or developments.</li> <li>• Explain why people's beliefs, values, worldviews, experiences, and roles give them different perspectives on people, places, issues, or events.</li> <li>• Make value judgments about events, decisions, or actions, and suggest lessons that can be learned.</li> </ul>	<ul style="list-style-type: none"> <li>• Diverse features of the environment:</li> <li>• Relationship between the community and environment.</li> <li>• Aspects of life shared across cultures (family, holidays, food, etc.)</li> </ul>
Grade 3	Science	<ul style="list-style-type: none"> <li>• Living things are diverse, can be grouped, and interact in their ecosystems.</li> </ul>	<ul style="list-style-type: none"> <li>• Demonstrate curiosity about the natural world.</li> <li>• Observe objects and events in familiar contexts.</li> <li>• Identify questions about familiar objects and events that can be investigated scientifically.</li> <li>• Make predictions based on prior knowledge.</li> </ul>	<ul style="list-style-type: none"> <li>• Biodiversity in the local environment.</li> </ul>

Grade	Subject	Big Ideas	Curricular Competencies	Content Connections
Grade 3	Social Studies	<ul style="list-style-type: none"> <li>• People from diverse cultures and societies share some common experiences and aspects of life.</li> </ul>	<ul style="list-style-type: none"> <li>• Gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>• Explain why people, events, or places are significant to various individuals and groups.</li> <li>• Recognize the causes and consequences of events, decisions, or developments.</li> <li>• Explain why people's beliefs, values, worldviews, experiences, and roles give them different perspectives on people, places, issues, or events.</li> <li>• Make value judgments about events, decisions, or actions, and suggest lessons that can be learned.</li> </ul>	<ul style="list-style-type: none"> <li>• Connections to the community.</li> </ul>
Grade 4	Science	<ul style="list-style-type: none"> <li>• All living things sense and respond to their environment.</li> </ul>	<ul style="list-style-type: none"> <li>• Demonstrate curiosity about the natural world.</li> <li>• Observe objects and events in familiar contexts.</li> <li>• Identify questions about familiar objects and events that can be investigated scientifically.</li> <li>• Make predictions based on prior knowledge.</li> <li>• Experience and interpret the local environment.</li> <li>• Use tables, simple bar graphs, or other formats to represent data and show simple patterns and trends.</li> <li>• Compare results with predictions, suggesting possible reasons for findings.</li> </ul>	<ul style="list-style-type: none"> <li>• Sensing and responding to humans, environment, and animals.</li> </ul>
	Social Studies	<ul style="list-style-type: none"> <li>• Demographic changes in North America created shifts in economic and political power.</li> </ul>	<ul style="list-style-type: none"> <li>• Gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>• Sequence objects, images, or events, and determine continuities and changes between different time periods or places.</li> <li>• Differentiate between intended and unintended consequences of events, decisions, or developments, and speculate about alternative outcomes.</li> <li>• Construct narratives that capture the attitudes, values, and worldviews commonly held by people at different times or places.</li> <li>• Make ethical judgments about events, decisions, or actions that consider the conditions of a particular time and place.</li> </ul>	<ul style="list-style-type: none"> <li>• Physiographic features and natural resources of Canada.</li> </ul>

Grade	Subject	Big Ideas	Curricular Competencies	Content Connections
Grade 5	Science	<ul style="list-style-type: none"> <li>Earth materials change as they move through the rock cycle and can be used as natural resources.</li> </ul>	<ul style="list-style-type: none"> <li>Demonstrate curiosity about the natural world.</li> <li>Observe objects and events in familiar contexts.</li> <li>Identify questions about familiar objects and events that can be investigated scientifically.</li> <li>Make predictions based on prior knowledge.</li> <li>Experience and interpret the local environment.</li> <li>Use tables, simple bar graphs, or other formats to represent data and show simple patterns and trends.</li> <li>Compare results with predictions, suggesting possible reasons for findings.</li> </ul>	<ul style="list-style-type: none"> <li>The rock cycle; local types of earth materials including soil type.</li> </ul>
	Social Studies	<ul style="list-style-type: none"> <li>Canada's policies and treatment of minority peoples have negative and positive legacies.</li> <li>Natural resources continue to shape the economy and identity of different regions of Canada.</li> </ul>	<ul style="list-style-type: none"> <li>Use Social Studies inquiry processes and skills to ask questions; gather, interpret, and analyze ideas; and communicate findings and decisions.</li> <li>Take stakeholders' perspectives on issues, developments, or events by making inferences about their beliefs, values, and motivations.</li> <li>Make ethical judgements about events, decisions, or actions that consider the conditions of a particular time and place, and assess appropriate ways to respond.</li> </ul>	<ul style="list-style-type: none"> <li>The development and evolution of Canadian identity over time.</li> <li>The changing nature of Canadian immigration over time.</li> <li>Resources and economic development in different regions of Canada.</li> </ul>

## Teaching Timeline

October - November	Activity #1	Planting bulbs in the schoolyard
November	Activity #2	Fall in the Netherlands 1944
January	Activity #3	Force growing bulbs (optional)
April - May	Activity #4	Spring tulips in the schoolyard (weather dependent)
May	Activity #5	Spring in the Netherlands 1945
May - June	Activity #6	The Gift of Hope
		Extension Activities (if time permits)

# Activity 1 - Planting Bulbs

**When:** October-November

**Materials:** Teacher should survey playground to determine planting locations with different soil types and other possible variables: eg. under deciduous / coniferous trees, raised beds, etc. Divide the students into growing (working) groups or have them work with a partner. Have the number of groups match the number of physical sites students will be planting their bulbs within the playground. Collect tulip bulbs, hula-hoops, thermometer, 4 litre jug for water, graphs, tulip cycle handout, K-W-L- chart, and magnifying glasses. Canadian Liberator is a red mid-season flowering Triumph tulip. It will bloom for 2-3 weeks from April to May. It grows 55cm (22") tall.

## Procedure:

1. Hand out bulbs, tulip cycle chart, magnifying glasses. Ask the students to list their ideas in a K-W-L (Know-Wonder-Learn) chart.
2. Identify the life cycle of a tulip bulb, plant parts and what plants need to grow. Have students complete illustrate / label their own tulip cycle.
3. Have the students imagine that they are Dutch farmers and that they are responsible for selecting a location in their school yard that would be the best suited for growing tulips. Discuss / predict in their growing groups what type of location / soil that would be best. You should have predetermined locations from school administration as to where tulip bulbs may be planted. Try choosing a site where tulips have not been grown in recent years.
4. In their growing groups, have the students use a hula-hoop to identify a standard size planting plot in the playground. The students will journal their observations and record data of different variables over a week period: e.g. Why this is the best spot to plant tulips? How tall will our tulips grow here? How much sunlight does your planting area get? How fast will 4 litres of water drain? How does the soil feel? Soil PH? Weather / temperature conditions? What is their role in their growing group?
5. After a week of observations, loosen the soil with trowels, shovels or rakes so that the roots have space to grow and have the students plant the bulbs. Plant the bulbs 15 cm (6") deep and 10 cm (4") apart. Drop the bulb with the pointy tip up. Cover the hole with soil and water well. In very cold areas add 5-8 cm (2-3") of mulch on top of the soil.
6. Journal monthly observations of their planting site.



# Activity 2 - History in the Netherlands during the autumn of 1944

**When:** November

**Materials:** Think-Pair-Share chart, students working with growing partners or in growing groups.

Teachers will need to be sensitive to their student's emotional needs and present material at the appropriate level (see Veterans Affairs Canada [www.vac-acc.gc.ca](http://www.vac-acc.gc.ca) for details of the Liberation of the Netherlands).

**Classroom setting - Optional:** Teacher will open windows, turn off the lights so that the classroom has natural lighting only and do activity just before the lunch break. Display a picture of the Nazis invading the farmlands of Holland. Have ready a heavy book to drop on the floor or 'bomb drop' sound effect. (Bomb dropping sound effect: <https://www.youtube.com/watch?v=FLvV4NegF0o>)

## Procedure:

1. Have the students imagine being a Dutch farmer looking after their lands for many years. Describe how these farmers spend long hours tending to their bulbs to achieve a high quality product. Explain how their knowledge of bulbs and their lands is very valuable as well as how the farmers have developed a good sense as to how to cultivate crops in order to sustain the lives of their families. Students will begin doing a Think-Pair-Share chart. Explore different questions, allowing students time to go through the different steps of this task; students will be able to engage in meaningful conversation with other students such as: What resources have you used to cultivate your tulip bulbs? How are you a successful farmer? What type of soil do your bulbs thrive in?
2. Using the sound effect option above (book dropping / bomb dropping sound effects) to awaken student's senses to the turmoil the Dutch population faced during the war. Tell them to take cover under their desks, just like in an earthquake drill. Teacher counts to 10, then tells students to take their seats again. This multi-sensory approach will give students a little appreciation of the harsh conditions Dutch farmers faced under Nazi occupation.
3. Give students some facts about the autumn of 1944.





# Activity 2 Continued...

Continue to do the Think-Pair-Share sheet with questions:

## **From a Dutch Farmer's Perspective:**

- How would you feel, physically / emotionally?
- How would you keep warm?
- How are they going to survive with no bulb crops?
- How would you feel not knowing when the war was going to end?
- What would you think about eating after the tulip bulbs ran out?
- How will they stay safe?
- How could you help other farmers?
- Using a present day example, ask the students: If you only had one order of french fries to eat a day, would you eat them all yourself or would you share them with your classmates?
- What would you say to others in order to keep their spirits up during these harsh times?



### **From a Canadian Soldier's Perspective:**

- What would you think if you had to fight in another country, so far away from home?
  - How do you feel when you are homesick?
  - How would you feel not knowing when or if you would ever see your family or home again?
  - What would you remember of home / family to keep you happy and motivated?
  - How would your background training help you survive a dangerous situation: eg. fire drill, earthquake drill?
  - Where would you hide if you were shot down in a plane over the Netherlands to avoid being captured by the Nazi soldiers?
4. Debrief the students about this historical event so that they have a full understanding of the past events. (This should help alleviate any fear or concerns from students and their parents).



# Activity 3 - Force Growing Bulbs (Optional Activity )

**When:** Winter

**Materials:** glass vase style containers (Mason style jars work great), rocks or glass beads for the bottom of the vase, a spot near natural lighting, bulbs.

Force growing of bulbs in the classroom is a good way of giving students an accelerated view of the steps bulbs take as they grow outside. Through their observations, students can make connections between the forced bulb's growth and their bulbs outside. These activities will keep them engaged and curious about their learning.

How to Force Tulip Bulbs in Water: 11 Steps (with pictures):

<https://www.wikihow.com/Force-Tulip-Bulbs-in-Water>

Gardening Know How: Growing Tulips In Water – How To Grow Tulips In Water:

<https://www.gardeningknowhow.com/ornamental/bulbs/tulips/growing-tulips-in-water.htm>

## **Procedure:**

1. Have the students fill their glass vase with small rocks. Add water so that it is 1 cm below the top of the rocks. Place the bulbs in the vase so that the top of the bulb is pointing up and their bottom, where the roots will grow, are above the water line. Remember bulbs could swell, so make sure they do not touch other bulbs.
2. Place vase in a natural well lit spot in the classroom . Remember to add water as it is absorbed or evaporates to 1 cm below the bulb base.
3. Have the students do daily journals and record physical features (individually or as a class) of their observations.
4. Students could also make predictions and comparisons to their bulbs outside.



# Activity 4 - Spring Bulbs Growing

**When:** Spring

Monitor the weather and observe when the first signs of green shoots from the soil appear. As the weather warms, the bulbs will accelerate in their rate of growth.

**Materials:** Students will be in their growing groups, rulers, magnifying glasses, hula-hoops, thermometer, tulip cycle handout, graphs and recordings sheets.

## **Procedure:**

1. Have students return to their original group spot in the playground to make observations of their bulbs.
2. In the fall, they looked at a chart of the tulip cycle. In winter, they forced bulbs to grow in the classroom. In their journals, have them explain everything they know about the tulip cycle and variables that can affect the growth of their tulips. Ask them to answer these questions:

- How will these variables affect your tulip's growth cycle?
- What trends do you notice?
- What conclusion can you infer from the graphs of different locations in the schoolyard?
- How did you contribute to the group's data collection?
- Did everyone help in the process?
- Why is it important to work as a group and what can you learn from this experience?
- How do you feel about your learning?

**Optional:** Do KAHOOT on same topic, "what do you know about growing tulips?"



# Activity 5 - Spring in the Netherlands, 1945

**When:** Spring

Teachers will need to be sensitive to their student's emotional needs and present material at the appropriate level.

**Material:** Videos:

Remembrance Moments: Canada and the Liberation of the Netherlands:  
<https://www.youtube.com/watch?v=Ph7AD3EVZn0>

VE-Day 2015: Canadian veterans honoured in the Netherlands:  
<https://www.youtube.com/watch?v=akZ-Qx2Pmzk>

Dutch Liberation:  
[https://www.youtube.com/watch?v=\\_35miSuK83c](https://www.youtube.com/watch?v=_35miSuK83c)

See Veterans Affairs Canada [www.vac-acc.gc.ca](http://www.vac-acc.gc.ca) for more details - The Liberation of the Netherlands

**Procedure:**

1. Give students some facts about the Spring of 1945.
2. Do Flowers of Friendship activity (Grade 1 - 2) or Handmade Gift of Love activity (Grade 3 - 6) on the Veterans Affairs website.
3. Debrief the students about this historical event so that they have a full understanding. This should help alleviate any fears or concerns from students and parents.





# Activity 6 -The Gift of Hope

**When:** June

**Material:** Teacher will wrap up one tulip bulb in a box with fancy paper, student's completed Rubric.

**Procedure:** How to play the game:

1. Self Assessment - List the important ideas that you have learned from this unit in Rubric
2. Divide the class into 2 groups. Dutch Farmers and Canadian Soldiers.
  - Students will randomly pass around a wrapped gift from a Dutch Farmer to a Canadian Soldier; back and forth, one at a time, so that everyone in the class has an opportunity to participate if they wish.
  - As each player receives the gift, they will say "thank you" to the player who has given them the gift. The player will then state what they are thankful for. Students can refer to their rubric for ideas. Students will say: "I am thankful for ..."
  - That player will then pass the gift to someone in the other group
  - When everyone has had a chance to share, the gift is then passed back to the teacher.
  - Teacher then responds by saying: "Thank you, this gift I hold remembers the past, so that we may improve the future and have a lasting peace for all!"
  - The teacher then opens the gift to find a tulip bulb. The teacher can explain that at the end of the tulip cycle (when the blooms have been removed (dead-heading) and the foliage turns yellow), the tulip bulb can be lifted from the ground. Students can then take home a bulb to plant in their garden. As their tulips continue to bloom each year, the students will have a reminder of "HOPE AND PEACE FOR ALL".



# Extension Activities:

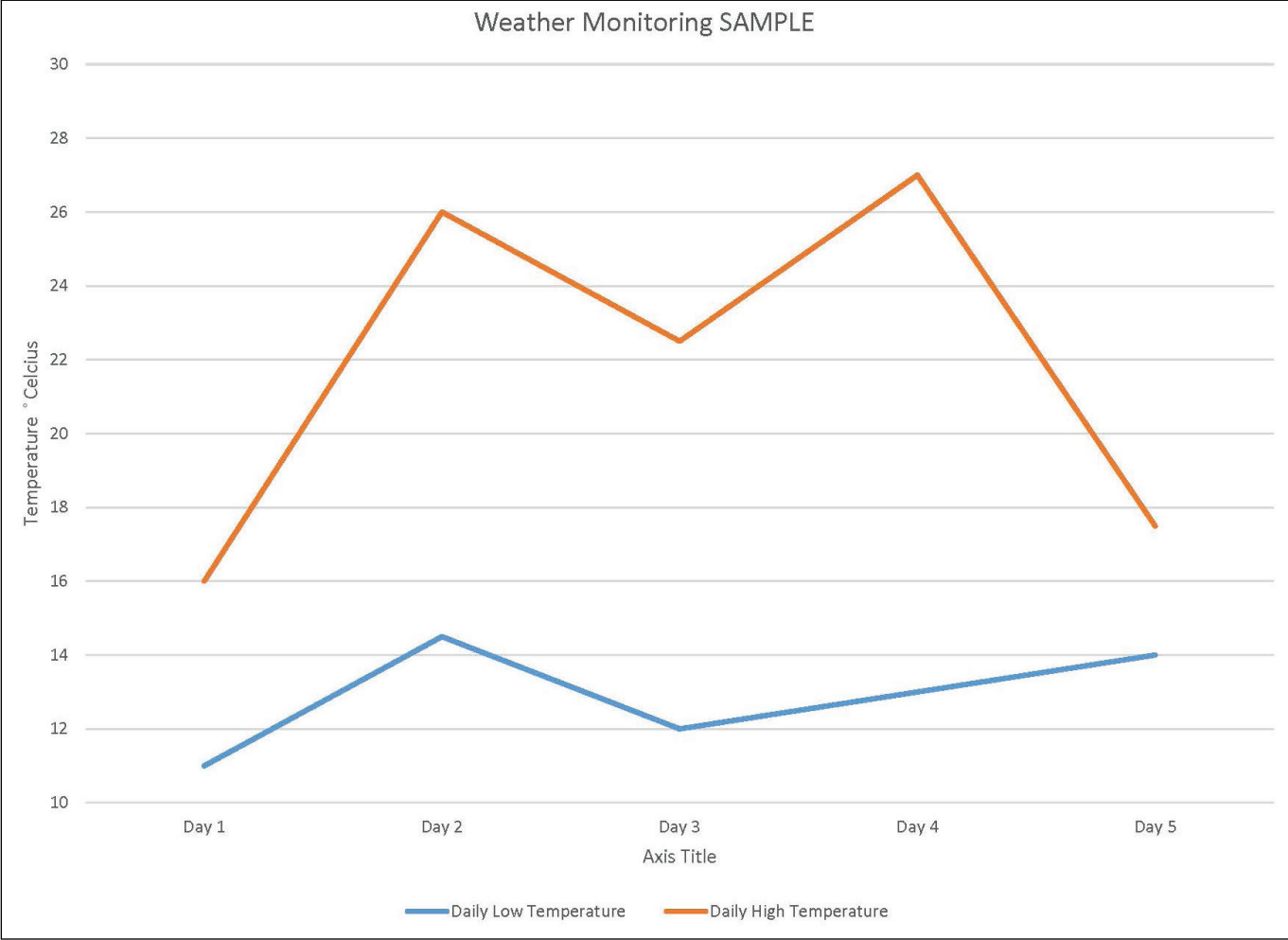
- Investigate how tulip bulbs are similar / different to bulbs Indigenous peoples in your area of the province use. This could be a good chance to connect to elders or others for information.
- Create a list of welcoming activities for a new immigrant student to your class.
- Outline ways to solve disagreements between peers.
- Determine how the Liberation Tulips could be shared with your local legion on VE Day (May 5, 2020).
- Write a letter / postcard to a veteran explaining how you are humbled by their actions and thankful for the key role they played in liberating the people of the Netherlands (see Veterans Affairs Canada Web site for details [www.vac-acc.gc.ca](http://www.vac-acc.gc.ca)).
  - How would you express your appreciation to someone / group who showed an act of kindness towards you?
  - Define what the Liberation Tulip means to you.



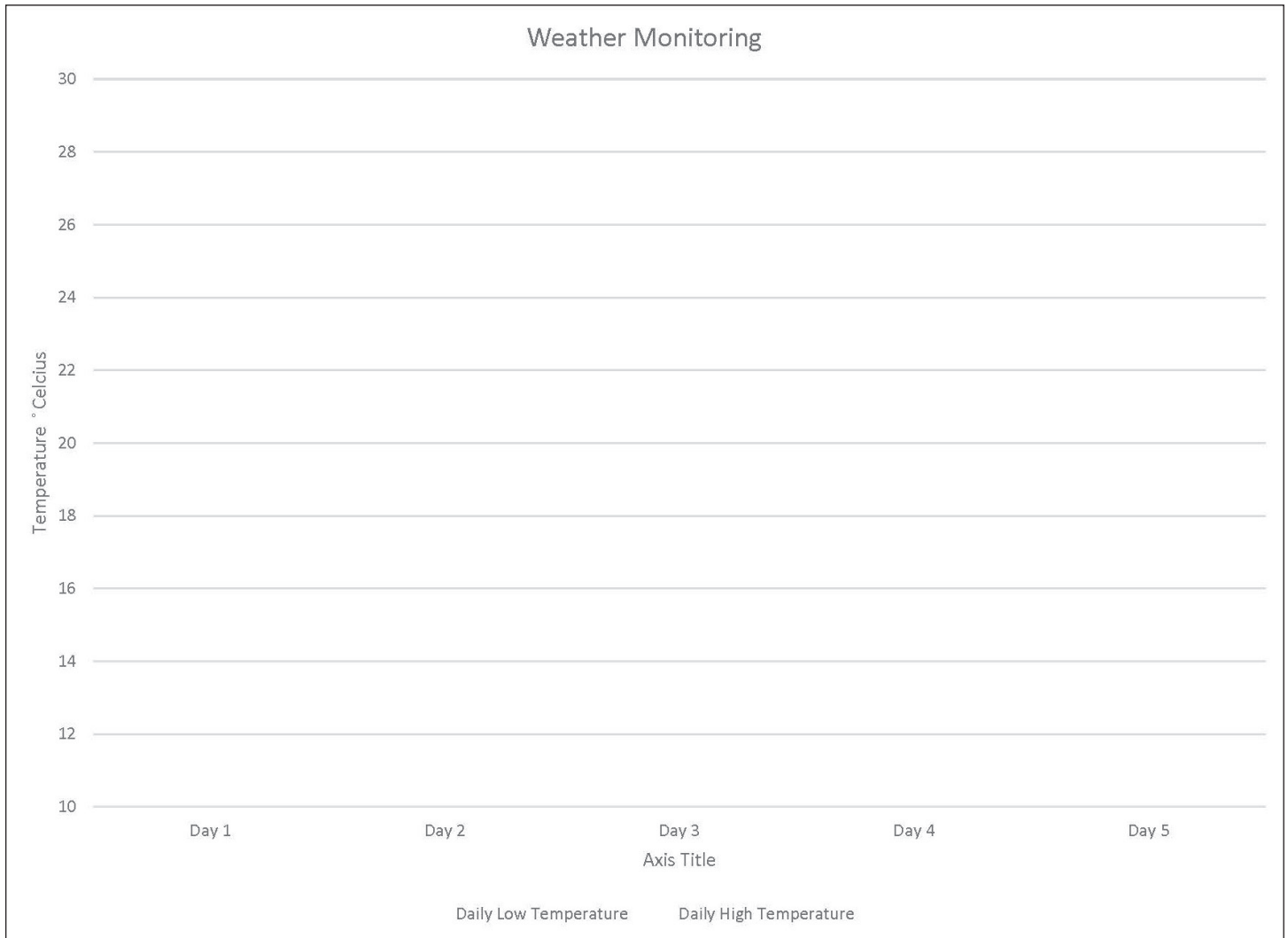
# Activity 1

<b>What I Know...</b>	<b>What I Wonder....</b>	<b>What I Learned...</b>

# Activity 1

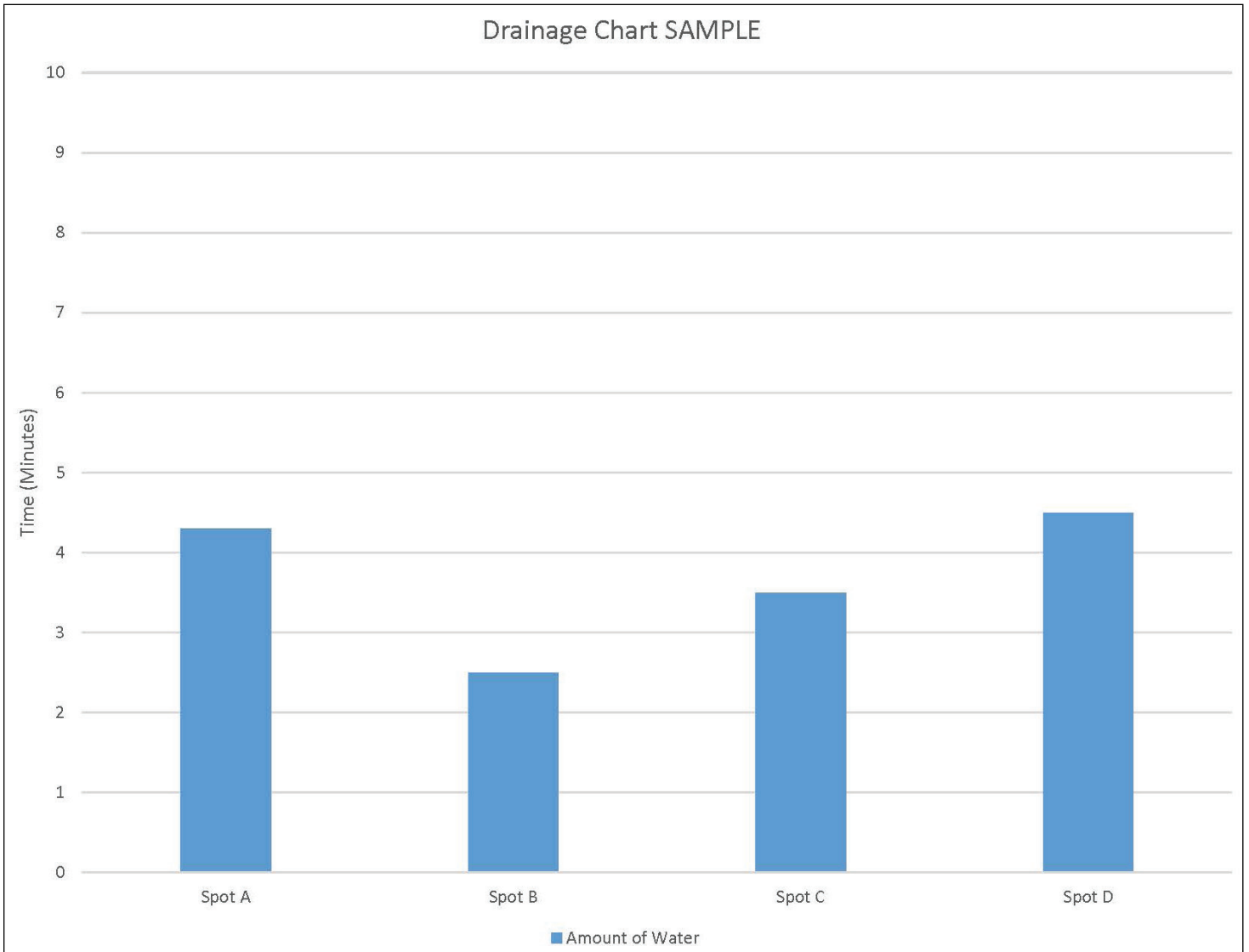


# Activity 1

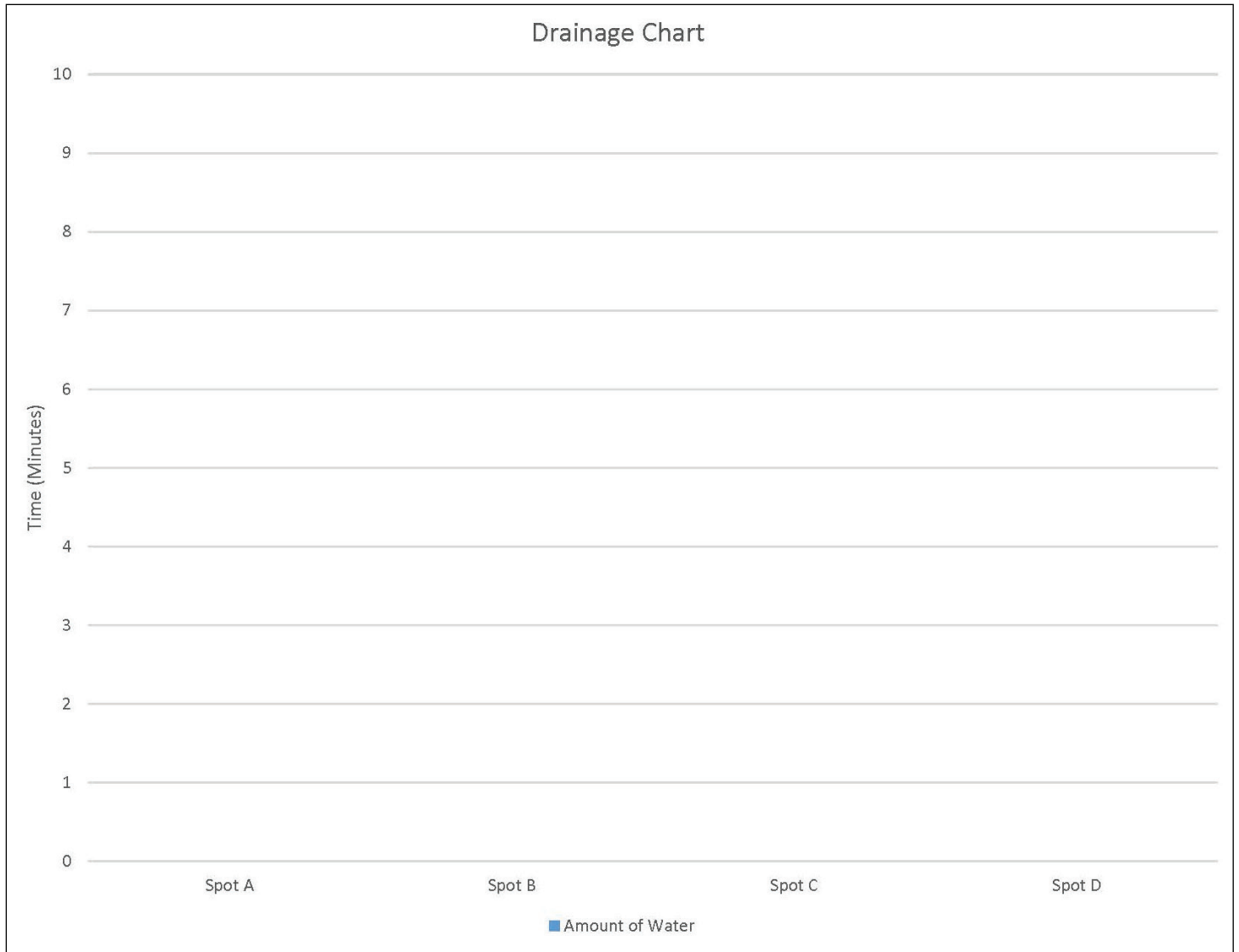




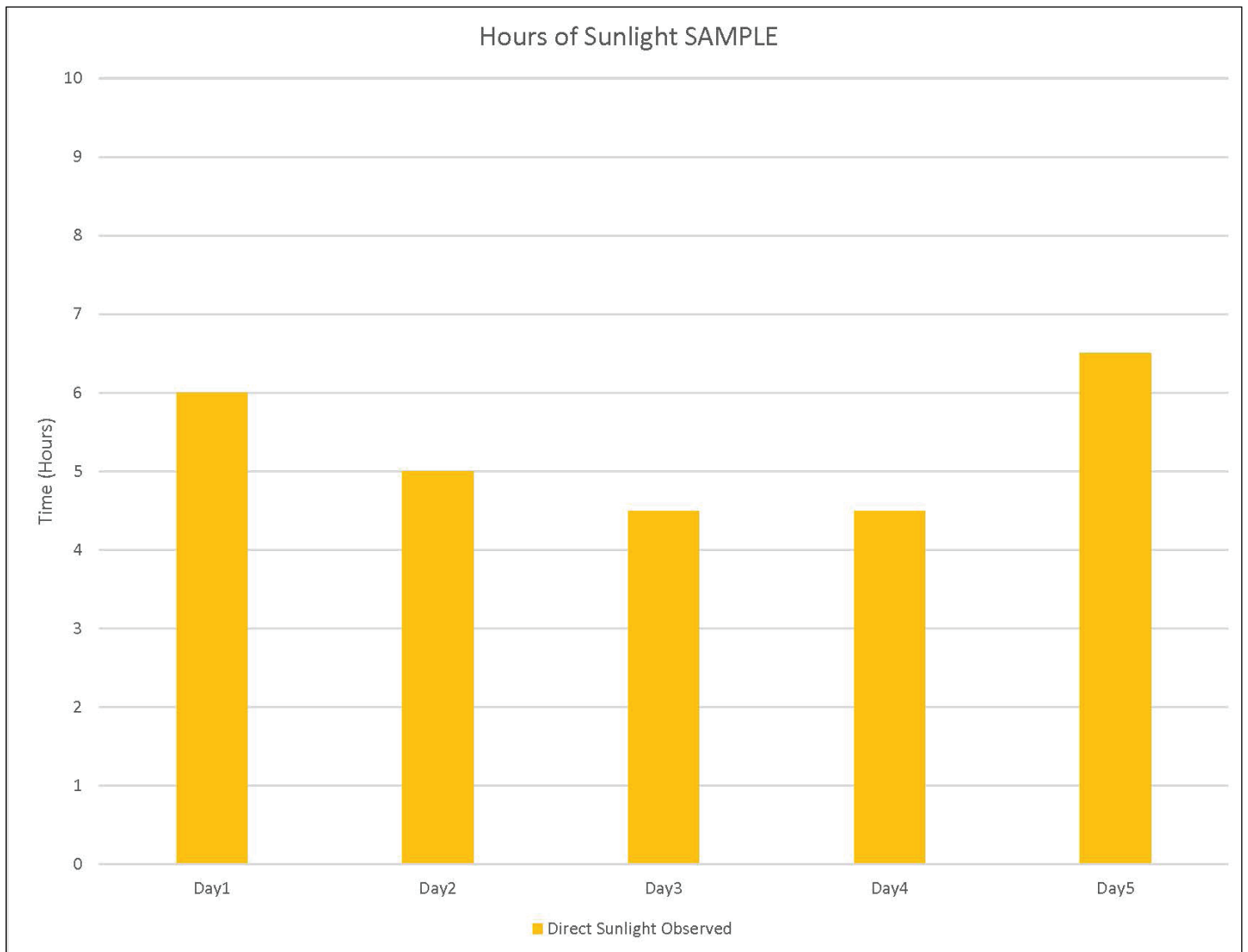
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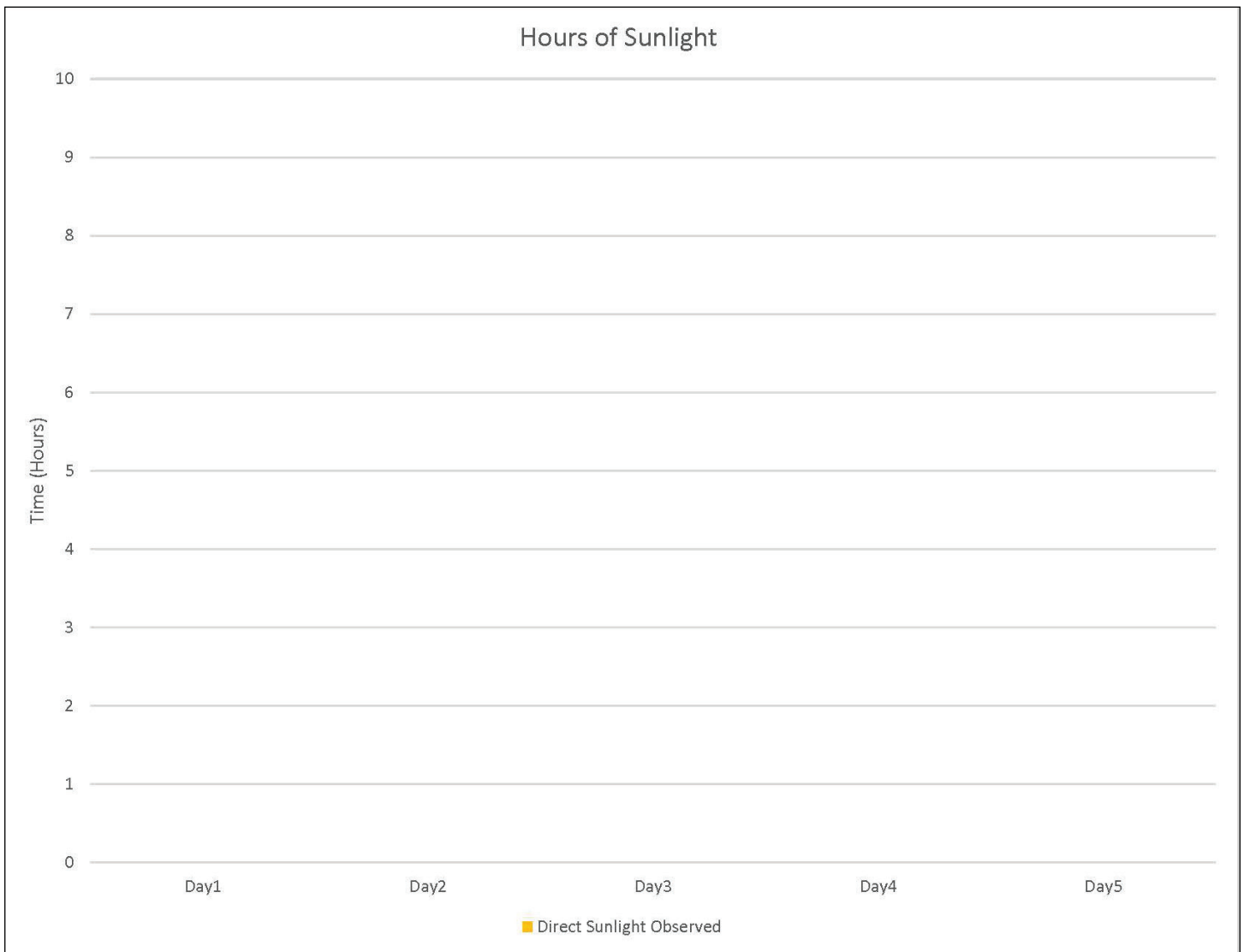
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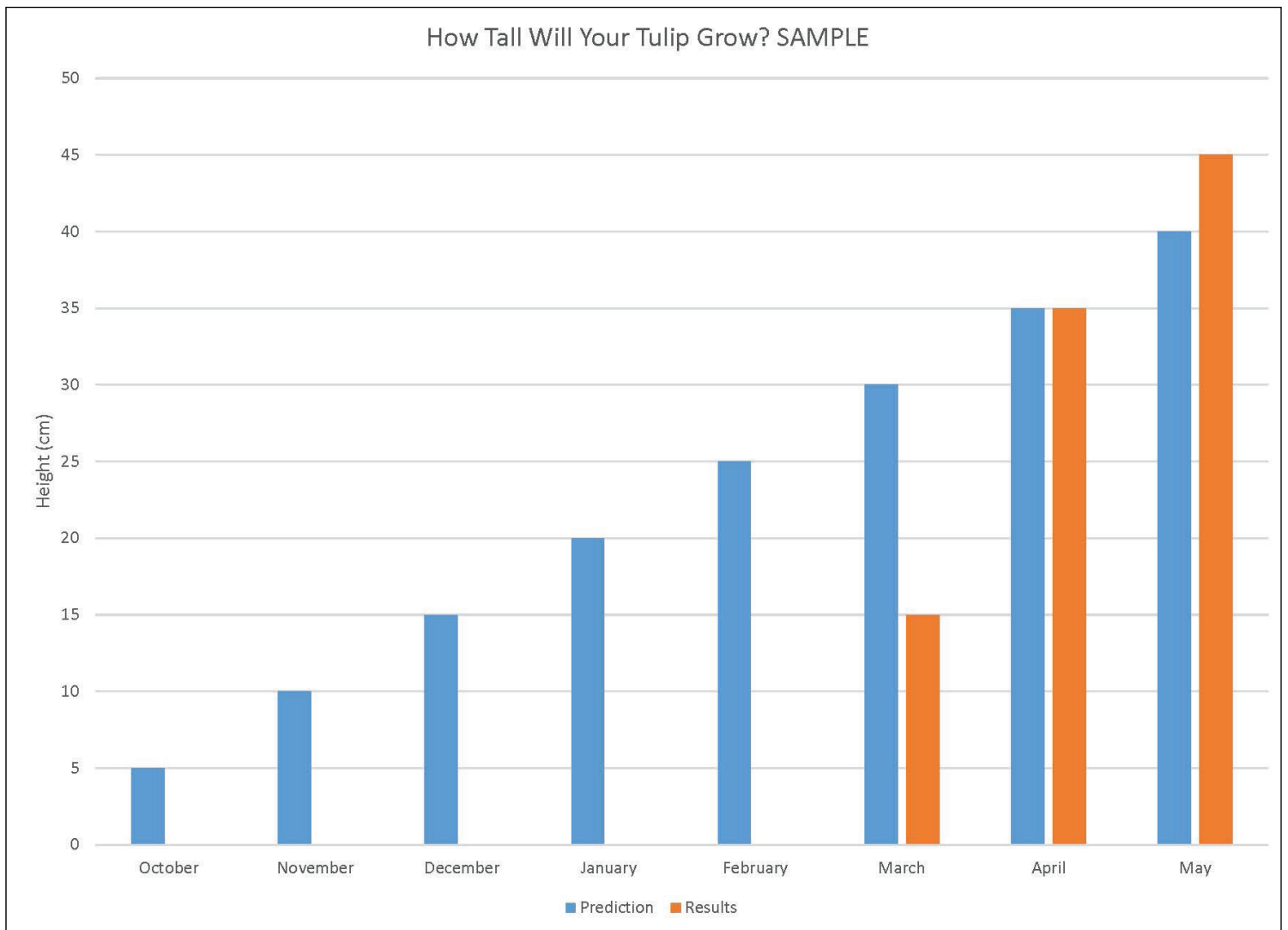
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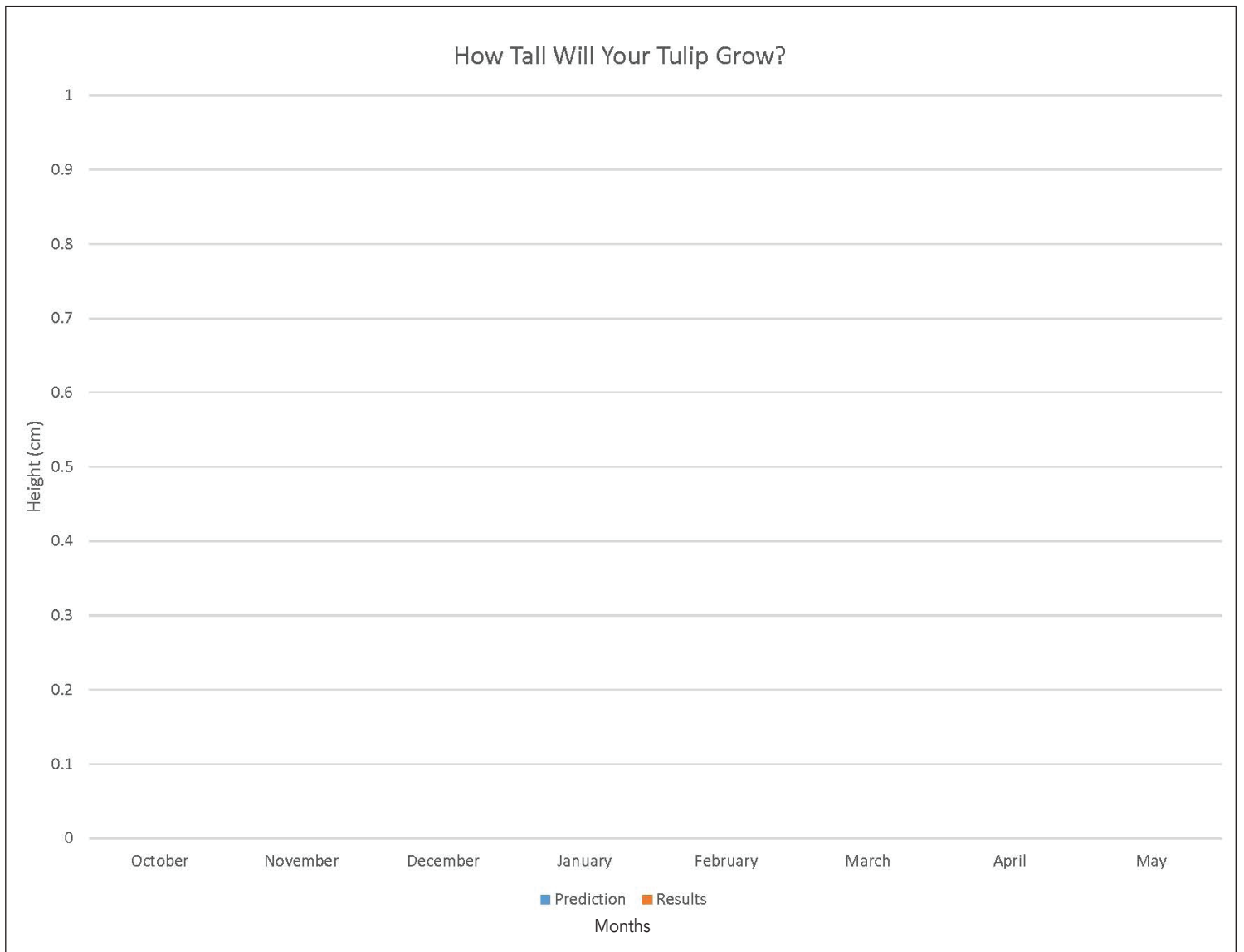
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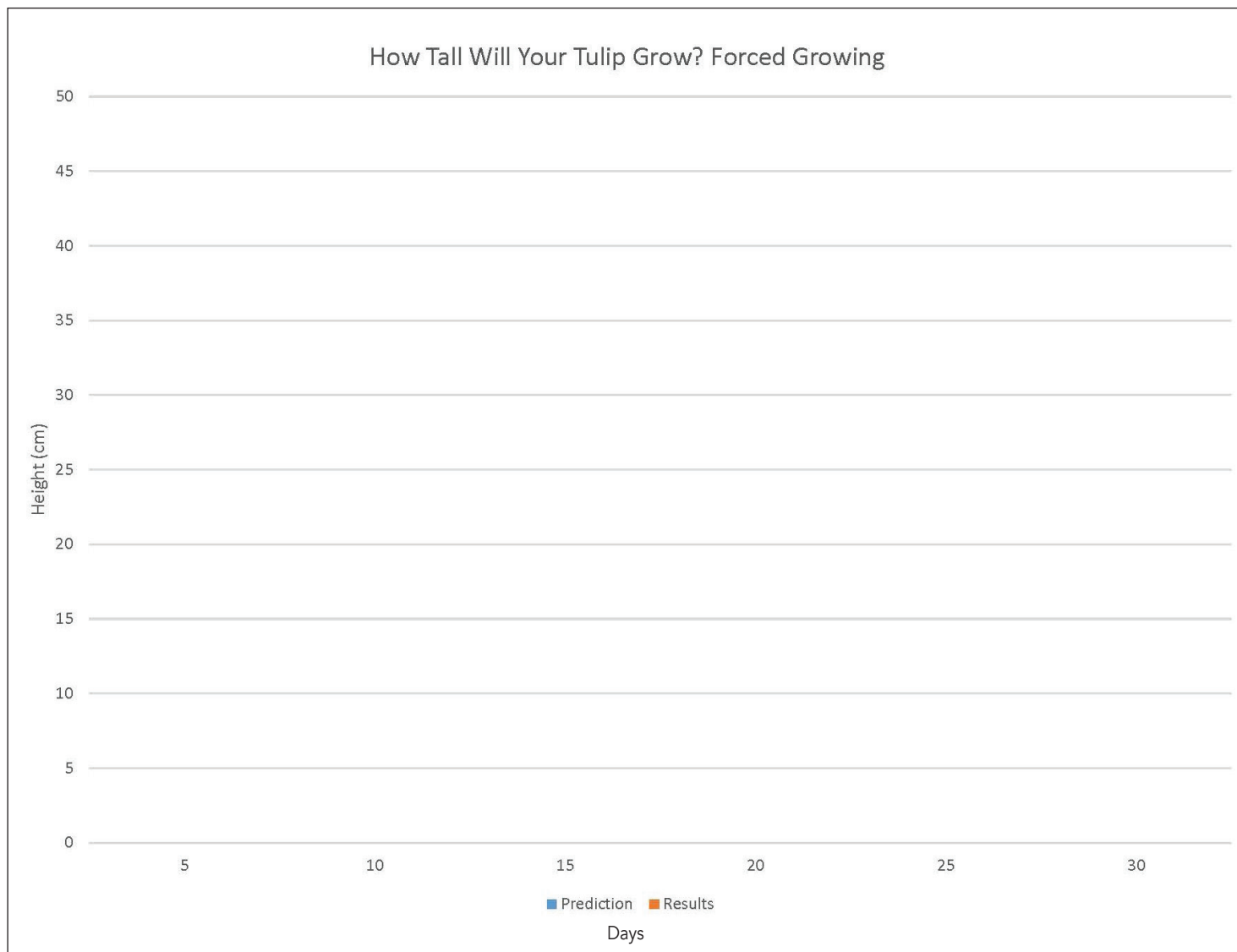


# Activity 1





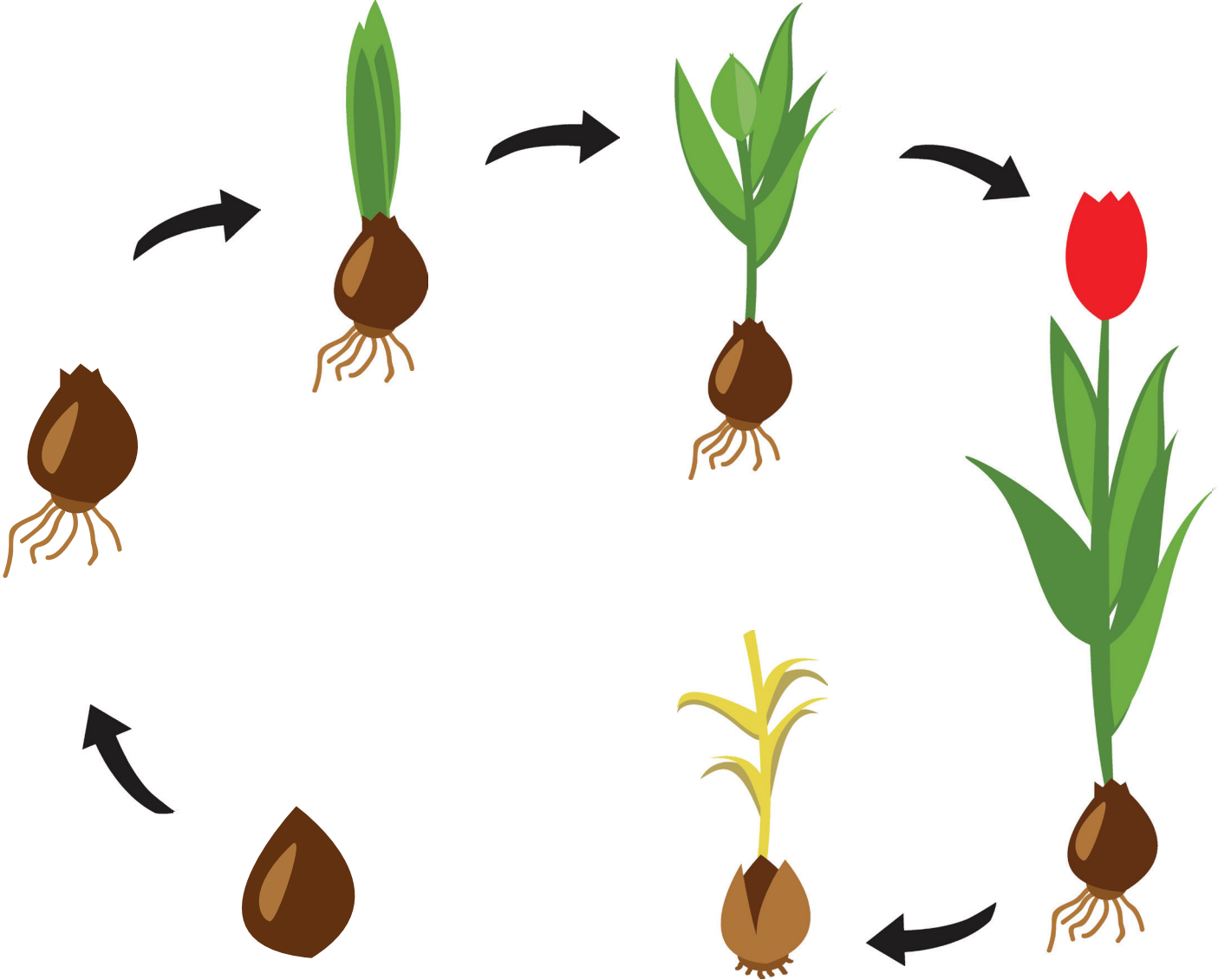
# Activity 1



# Activity 2

<b>THINK * PAIR * SHARE</b>			
<b>Question</b>	<b>What I Think</b>	<b>What My Partner Thinks</b>	<b>What We Would Share</b>

# Activity 1 & 4: Lifecycle of a Tulip



1. September - October: **Planting Time** - Once the ground has cooled, plant the dormant bulbs in well-draining soil about 15 cm (6") deep and 10 cm (4") apart. Water thoroughly.
2. October - November: **Making Roots** - Once the bulbs are planted, they start to grow roots out of the base of the bulb to anchor them in for winter.
3. December - January: **Cooling Period** - Now starts the rest period. For the bulbs to bloom properly in the spring, they need 14-17 weeks of at least 9°C or 48°F. A layer of snow does not harm the bulbs – in fact it acts as a protective barrier from extreme cold and dry winds.
4. February - March: **Growing Period** - Once the ground starts to warm, the bulbs are triggered to start growing.
5. April - May: **Blooming Time** - The tulips are In full bloom – Enjoy!
6. May - June: **Regeneration** - Once the blooms have finished, disbud the stems and allow the foliage to continue to grow. The bulb once planted in the fall is now used up and the nutrients generated in the leaves will form the bulbs for next year's blooms. Once the foliage turns yellow you can trim it to soil level, this is a signal that the cycle is complete and new bulblets have been formed.
7. July - August: **Multiplying** - Bulbs rest during the heat of summer and now is when they are dug and sorted by growers. Home gardeners can leave the bulbs in the soil to grow and bloom for many years.

# Activity 6

<b>The Gift of Hope</b>	Emerging – recall knowledge and definitions	Developing – gathering basic information	Proficient – interpreting information	Extending – solving unfamiliar problems
The connection between the Liberation Tulip and the Dutch Farmer				
The connection between the Liberation Tulip and the Canadian Soldier				
The connection between the Liberation Tulip and the Student (myself)				

# Fun Facts About Tulips

- Tulips are part of the lily (Liliaceae) family, as well as onions and asparagus.
- For tulips to bloom in hot areas (near the equator) they need to be kept in a fridge to mimic cold winters, then planted.
- Tulip bulbs are living organisms - they need to be planted in the fall while they are dormant. This makes them different than seeds which can be stored for a couple of years then planted.
- Tulip bulbs have everything they need for their first years flowers and stems. If you cut a cross-section of the bulb in the fall, you will be able to see the beginning of the bloom and leaves. Seeds need moisture, heat and light to germinate and get growing.
- Tulips are perennials, meaning plants that come back year after year.
- There are about 15 different classes of tulips, based on bloom time, bloom shape and even colour (Fosteriana, Greigii, Kaufmaniana, Species, Single Early, Double Early, Triumph, Darwin Hybrid, Single Late, Lily-flowered, Fringed, Viridiflora, Rembrandt, Double Late (Peony-flowering) and Parrot).
- Tulip bulb growers, don't grow them for the flowers – they mow them once they start to flower and leave the leaves and stems to grow and produce more nutrients that will be stored in the bulbs.
- Each spring Holland has a flower parade “Bloemencorso Bollenstreek” where the huge floats are fully decorated with blooms, it first started in 1947 just after WWII.
- Tulips were once the most expensive flower – during height of Tulipmania (February 1937) one bulb tulip “Viceroy” was allegedly sold for : two lasts of wheat (8,000 lbs), four lasts of rye (16,000 lbs), four fat oxen, eight fat swine, twelve fat sheep, two hogsheds of wine (150 gallons), four tons of beer, two tons of butter, 1,000 lb. of cheese, one complete bed, one suit of clothes, and one silver drinking cup = approx. \$1 million Canadian.
- At one point in time, tulips were the fourth largest export from Holland after cheese and herring. Today more than 60% of the total surface of the country is used for agriculture and horticulture, including tulips.
- Some tulips have been named for famous people or characters: Mickey Mouse, Red Riding Hood, Antoinette, Van Gough, Abba and Sacajawea.



