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The Great Realisation

Information for students

- You are going to look at two versions, video and print, of a poem entitled “The Great Realisation” by Tomos Roberts.
- Watch the video first. Scroll down until you find it: http://www.probablytomfoolery.com/
- Write down what you think the poem is about.
- Now read the print version of the poem, which you can find in the appendix. Reading the poem allows you to slow down so that you can pause and reflect. Make annotations on the text as you read.
- Write a short paragraph about you think is the poem’s main idea. The following questions may guide your thinking.
  - Why do you think Tomos Roberts wrote the poem?
  - Why do you think he chose to share it as a video?
  - Did the video make the poem’s impact stronger? Why or why not?
  - Did you have a preference?

Materials required

- Device with Internet access
- Paper, writing and drawing materials

Information for parents

Parents should:

- share your own reactions to the print and video version
- discuss with your child why you think this video has gone viral

Appendix: The Great Realisation

The Great Realisation

by Tomos Roberts

"Tell me the one about the virus again, then I'll go to bed."

"But, my boy, you're growing weary, sleepy thoughts about your head."

"That one's my favourite. Please, I promise, just once more."

"Okay, snuggle down, my boy, but I know you all too well.

This story starts before then in a world I once would dwell."

It was a world of waste and wonder, of poverty and plenty,

Back before we understood why hindsight's 2020

You see, the people came up with companies to trade across all lands

But they swelled and got much bigger than we ever could have planned

We always had our wants, but now, it got so quick

You could have anything you dreamed of, in a day and with a click

We noticed families had stopped talking, that's not to say they never spoke

But the meaning must have melted and the work life balance broke

And the children's eyes grew squarer and every toddler had a phone

They filtered out the imperfections, but amidst the noise, they felt alone.

And every day the skies grew thicker, 'till you couldn't see the stars,

So, we flew in planes to find them, while down below we filled our cars.

We drove around all day in circles, we'd forgotten how to run

We swopped the grass for tarmac, shrunk the parks 'till there were none

We filled the sea with plastic because our waste was never capped

Until, each day when you went fishing, you'd pull them out already wrapped

And while we drank and smoked and gambled, our leaders taught us why

It's best to not upset the lobbies, more convenient to die

But then in 2020, a new virus came our way,

The governments reacted and told us all to hide away

But while we were all hidden, amidst the fear and all the while,

The people dusted off their instincts, they remembered how to smile

They started clapping to say thank you and calling up their mums

And while the car keys gathered dust, they would look forward to their runs

And with the skies less full of voyagers, the earth began to breathe

And the beaches bore new wildlife that scuttled off into the seas

Some people started dancing, some were singing, some were baking

We'd grown so used to bad news, but some good news was in the making

And so, when we found the cure and were allowed to go outside,

We all preferred the world we found to the one we'd left behind

Old habits became extinct and they made way for the new

And every simple act of kindness was now given its due."

"But why did it take us so long to bring the people back together?"

“Well, sometimes you’ve got to get sick, my boy, before you start feeling better.

Now, lie down and dream of tomorrow and all the things that we can do

And, who knows, if you dream hard enough, maybe some of them will come true

We now call it The Great Realisation and yes, since then, there have been many

But that’s the story of how it started and why hindsight’s 2020.”

#Mission FLS : Qu'est-ce qu'on mange?

Information for students

Cette activité t'aidera à accomplir la mission FLS suivante : « Je prépare et j'écris en français la liste d'épicerie avec mes parents ».

Qu'est-ce qu'on mange? Une question que tes parents entendent probablement très souvent! Cette semaine, on t'invite à choisir avec tes parents des recettes et à écrire la liste d'épicerie en français.

Voici comment tu peux le faire :

- Discute avec tes parents des repas que vous allez manger cette semaine.
- Trouve des recettes et lis la liste les ingrédients.
- Vérifie si tu as les ingrédients ou non chez toi.
- Écris la liste des ingrédients que tes parents devront acheter à l'épicerie.
- Ajoute une petite douceur, une surprise.

Pour aller plus loin

- As-tu appris un nouveau mot lié aux aliments? Partage-le sur #MissionFLS.

Materials required

- Feuille de papier ou application en ligne telle que Google Keep
- Missions FLS

Information for parents

Children should:

- learn vocabulary related to food in French
- write a shopping list in French

Parents could:

- write a shopping list in French with their children

Modes of Representation

Information for students

To move forward in mathematics, you need to be able to use different mathematical representations to represent a situation. By using stories, tables of values, algebraic equations and graphs to create different representations of real-life situations, you develop a more complete understanding of the relationship between these representations.

Instructions

Examine the situation presented in Appendix A, Question #1. You will notice that the situation is presented as a story. Use this information to create these other representations: a table of values, an algebraic equation and a graph.

What connections can you make? Is some information easier to find in some representations than in others?

Think about the meaning of the initial value in the situation, and discuss this with someone if possible. How is it represented in the story, the graph, the table of values and the equation?

Think about the meaning of the rate of change, and discuss this with someone if possible. How is it represented in the story, the graph, the table of values and the equation?

Extension: Try Question #2. In this challenge, you are given an equation and asked to come up with a corresponding story, table of values and graph. Using the blank template found in Appendix A, you can also create your own problem complete with a story, equation, table of values and graph.

Materials required

- Writing tools
- Calculator, ruler
- Appendix A and B

Information for parents

About the activity

Children could:

- complete one or both of the questions in Appendix A.
- make a note of any questions, challenges and successes they might want to discuss with their parents or teachers.
- create their own problem with the four different representations. They could discuss it with their teacher or a peer to get feedback.

- if they wish, students can use the interactive site Desmos at https://www.desmos.com/calculator to check their solutions.

Parents should:

- help their child organize the necessary materials, if needed.
- read the instructions together with their child and, if needed, help them create the different representations.
- encourage their child to discuss the representations they found easiest or hardest to complete.
- encourage them to seek help or feedback from their teacher or their peers for any representations they found difficult to create.
- discuss the problems together with their child and/or ask their child to describe how they determined the answers to the questions. A possible answer is found in Appendix B.

Appendix A – Questions 1 & 2

Information for students

- Here are questions 1 and 2. There is also a blank template if you want to create your own question to challenge a peer. You can print these pages or do the work on a piece of paper.

Question 1

The Fair

Context:

Tickets to enter a local fair cost $9.00. Rides cost $1.50 each. How much will someone spend for the day at the fair if they:

a) Ride 2 rides

b) Ride 5 rides

c) Ride any number of rides

Equation:

What is the Initial Value?

What is the meaning of the Initial Value in this Context?

What is the Rate of Change?

What is the meaning of the Rate of Change in this Context?

Graph:

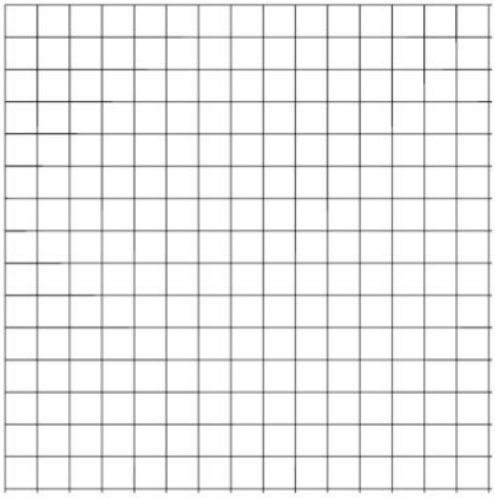


Table of Values:

x	y

Question 2

The_____

Context:

Equation:

$y = 10x + 25$

What is the Initial Value?

What is the meaning of the Initial Value in this Context?

What is the Rate of Change?

What is the meaning of the Rate of Change in this Context?

Graph:

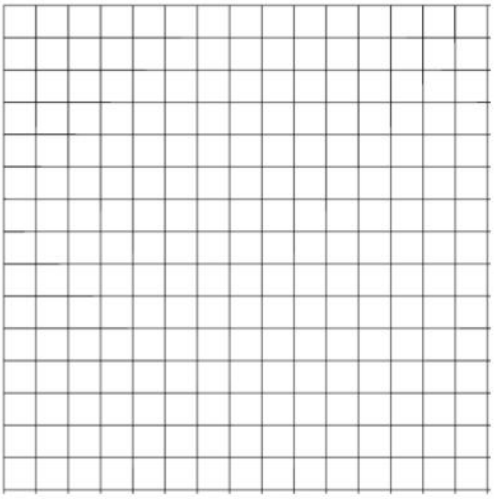


Table of Values:

x	y

Blank Template

The_____

Context:

Equation:

What is the Initial Value?

What is the meaning of the Initial Value in this Context?

What is the Rate of Change?

What is the meaning of the Rate of Change in this Context?

Graph:

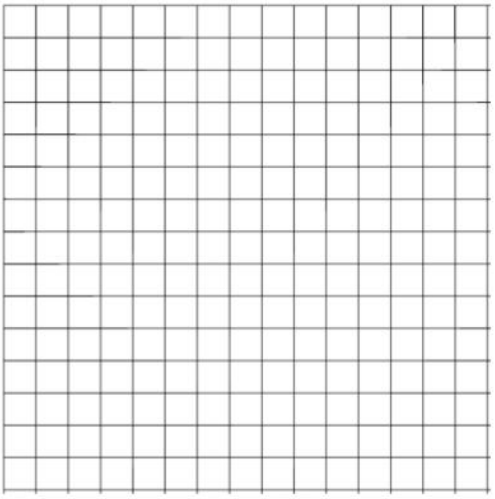


Table of Values:

x	y

Appendix B – Answers to Questions 1 & 2

Question 1: Possible Answer

The Fair

Context:

Tickets to enter a local fair cost $9.00. Rides cost $1.50 each. How much will someone spend for the day at the fair if they:

a) Ride 2 rides $12.00

b) Ride 5 rides $16.50

c) Ride any number of rides 1.50x +9

Equation:

Y= 1.50x + 9

What is the Initial Value?
$9.00

What is the meaning of the Initial Value in this Context?
The entry fee to get in the fair

What is the Rate of Change?
1.5

What is the meaning of the Rate of Change in this Context? $1.50 per ride

Graph:

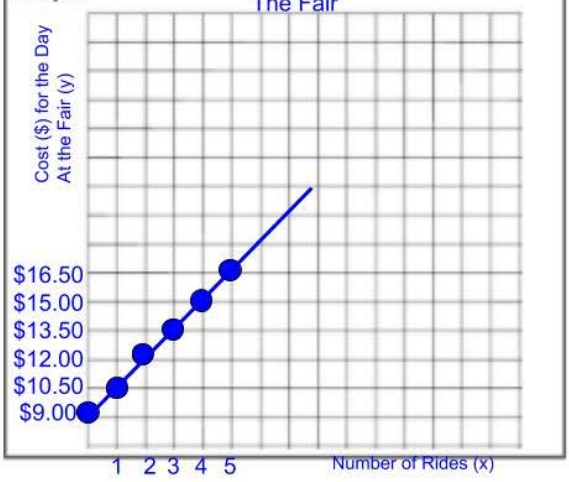


Table of Values:

x	*y*
0	9.00
1	10.50
2	12.00
3	13.50
4	15.00
5	16.50

Question 2: Possible Answer. The story will vary

The _____

Context:

Evan will be mowing lawns as a summer job this year. He charges $25.00 for the visit and then $10 per hour to mow the lawn.

Equation:

Y= 10x +25

What is the Initial Value?

$25.00

What is the meaning of the Initial Value in this Context?

The fee for the visit

What is the Rate of Change?

What is the meaning of the Rate of Change in this Context?

The charge per hour

Graph:

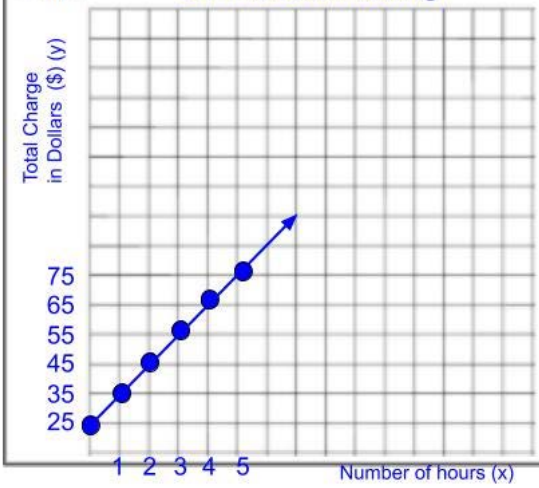


Table of Values:

x	y
0	$25.00
1	$35.00
2	$45.00
3	$55.00
4	$65.00
5	$75.00

The Many Degrees of Science[1]

Information for students

Liquid-filled thermometers have been used for centuries to measure temperature. Different liquids can fill the reservoir of a thermometer. But how do thermometers work?

This week, we will make a simple thermometer using rubbing alcohol, water, and some household items, and explore how thermometers work.

Instructions on how to build your thermometer as well as some extension questions can be found in Appendix A.

Materials required

- 1 plastic water bottle (empty)
- 1 clear plastic straw
- Modelling clay (e.g. plasticine, playdough or fun-tak)
- Ruler
- Marker (waterproof is preferable)
- Heat-resistant mitts
- Kettle (or pot) to heat water (you may also use a microwave)
- Water
- Ice cubes
- Rubbing alcohol
- Food colouring (any colour)

[1] Adapted from "Measure Up with a Homemade Thermometer," Science Buddies, n.d. https://www.sciencebuddies.org/stem-activities/homemade-thermometer#summary

Information for parents

About the activity

Children should:

- work in a well-ventilated room and remember to put the cap back on the bottle of rubbing alcohol when it is not being used
- use heat-resistant mitts
- dispose of the solution in the thermometer by pouring it down the sink while using plenty of running water to flush any remaining alcohol out of the drain pipe

Parents could:

- go over the safety rules with their children before they start the activity
- review the examples of appropriate answers found in Appendix B with their children

Appendix A – The Many Degrees of Science

Part A: Building a Water-bottle Thermometer

1. Measure out equal portions (approximately 45 mL each or a little less than a ¼ cup) of water and rubbing alcohol. Fill the water bottle ¼ of the way up.
   - Make sure to put the cap back on the bottle of rubbing alcohol after use.
2. Add a few drops of food colouring to the solution in the water bottle. Swirl the liquids in the bottle to mix them well.

   What does the addition of food colouring enable you to do?
3. Using a ruler and waterproof marker, make small marks on the straw at ½ cm intervals.
4. Insert the straw into the water bottle. It must not touch the bottom of the bottle.
5. Seal the top of the bottle with the modelling clay so that it is airtight.
   - Make sure the straw is securely in place
   - Make sure that the end of the straw in the bottle is immersed in the solution, but does not touch the bottom of the bottle.
   - Do not seal the opening of the straw.
6. Mark the level of the liquid on the straw.

   What does this "mark" indicate?

Now, we are ready to test the water-bottle thermometer.

7. Using a kettle, heat 2 cups of water. Pour warm water into a pitcher that is large enough to hold your water-bottle thermometer.
   - Be careful when handling the hot pitcher. Use heat-resistant mitts to work safely.
8. Predict what will happen to the fluid inside the straw.
9. Place the water-bottle thermometer into the pitcher. Wait approximately 20 seconds. Observe.

   Using scientific concepts and terms, explain what happened.
10. Add 2 cups of cold water and 3 or 4 ice cubes to another pitcher. Let it rest 3 – 4 minutes.
11. Predict what will happen to the fluid inside the straw.
12. Place the water-bottle thermometer into the pitcher. Wait approximately 20 seconds. Observe.

    Using scientific concepts and terms, explain what happened.

Part B: Building a Water-bottle Thermometer

Extension Activities/Questions

1. How would you go about “scaling” a thermometer? (Hint: Characteristic properties)
2. Take your thermometer on a tour of your home or yard. Remember to give the thermometer time to respond to each new environment.
   - How did you collect your data? Did you use a data table? Graph?
   - Which areas are warmer? Which areas are the coolest?
3. How could you get a more accurate reading?

Appendix B – Answer Key

Answers to This Week's Activity

Part A – Building a Water-bottle Thermometer

Step 2 – *What does the addition of food colouring enable you to do?*

Adding food colouring makes it easier for you to read the thermometer and to observe how the fluid level moves up or down. Although the thermometer would work without the food colouring, it might make it more difficult for you to see the fluid level.

Step 6 – *What does this "mark" indicate?*

The mark to which the fluid level rises right after the thermometer is built indicates room temperature. Each mark on the straw (or any narrow tube) corresponds to a specific volume of fluid, and therefore, to a specific temperature. This allows you to gauge to which degree the temperature is changing.

Step 9 & 12 – *Using scientific concepts and terms, explain what happened.*

The ability of matter to change volume as a result of a temperature change is called "Thermal Expansion and Contraction".

- Gases can expand and contract significantly.
- Liquids do not expand and contract as much.
- Solids also change volume when they are heated or chilled. However, the change is so small that it cannot be measured using an everyday thermometer.

Step 9

When the water-bottle thermometer is placed in the pitcher with the hot water, the heat energy from the hot water is transmitted to the fluid inside the thermometer. As the temperature of the fluid in the reservoir increases, the fluid expands, and the only place for it to go is up the narrow tube.

Step 12

When the water-bottle thermometer is placed in the pitcher with the ice cubes, the heat energy from the fluid inside the thermometer is transmitted to the pitcher with the ice-cubes. Since the temperature of the fluid decreases, it contracts, thereby allowing more fluid to collect in the reservoir. The level in the narrow tube then falls to a lower level.

Part B – Extension Activities/Questions

Question 1

An easy way to provide a rudimentary scale to a thermometer is to use the information we have about characteristic properties. For example, we know that the boiling point of water is 100°C and that the freezing point of water is 0°C. We can therefore experiment with water at different “temperatures” and mark off our straws to indicate those temperatures. Then, we can mark off regular intervals between O°C and 100°C.

Question 2

Various data values could be collected. A great way to present data in an orderly fashion, so that one can identify whether a pattern exists, is by placing the data in a table and then graphing it. Draw a bar graph, line graph, or pie chart to see if one provides more information than the others.

Question 3

A narrower tube results in a more accurate thermometer because the same expansion or contraction of fluid will cause a rise or fall over a longer distance.

What's the Dilemma?

Information for students

We see ethical dilemmas in movies and in everyday life: taking credit for someone else's work, buying something and selling it for more, telling someone to do one thing and doing the opposite yourself, and many others.

- Think of an ethical dilemma you have heard or seen.
- Use the graphic organizer from Brain Pop to find a solution to the dilemma.

Materials required

- Device with Internet access
- Printer (if available)
- Paper
- Writing tool

Information for parents

About the activity

Students could:

- Ask you what an ethical dilemma is
- Need help finding solutions
- Work independently

Parents should:

- Discuss ethical dilemmas
- Help the student understand how a solution could be possible
- Give real-life examples

Urban and Rural Regions

Information for students

Geography is not just about maps. It is also about exploring the differences between rural and urban areas and the resources and industries that can be found there. Try to take note of the **similarities** and **differences** between regions as you do this task.

Instructions

Look at the map provided in the Appendix and think about the different regions and locations.

Read the description of urban and regional territories in the “Types of territories” document in the Appendix.

Choose ONE of the locations from the map and think about some of the concepts you’ve discussed in class, such as industries, tourism, sources of energy, natural resources and transportation.

In the chart, **give an example** that relates to your chosen location for each of the concepts mentioned above. An example has been provided to help you organize your ideas.

Read the information on your chosen location in the Appendix to help you complete the chart, or do some research on your own.

Materials required

Useful resources, depending on personal preferences and availability:

- Device with Internet access
- Writing materials (paper, pencil, etc.)

Information for parents

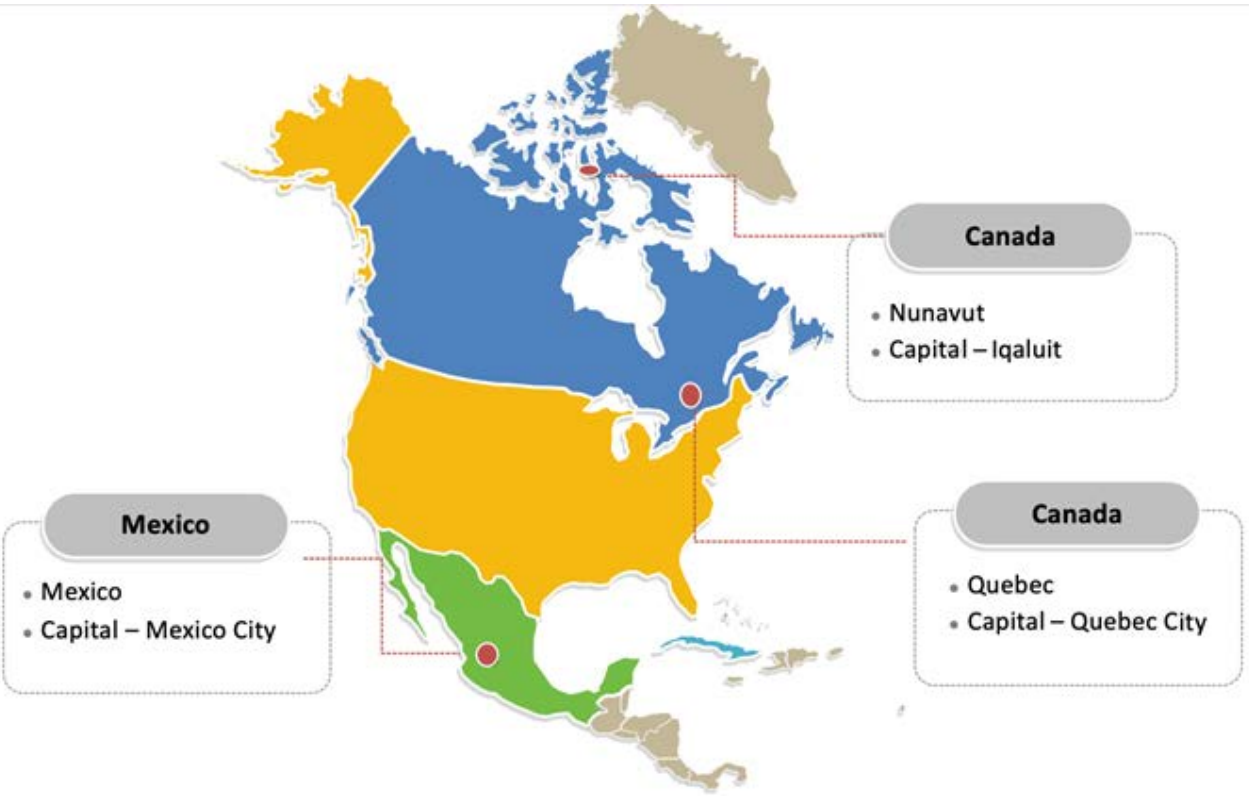
students could:

- research different regions that interest them and compare the differences and similarities

Parents should:

- help their child think about how natural resources are often linked to industries and the differences and similarities between regions

Appendix – Urban and Rural Regions



Types of territories

Based on what you already know:

- What is a territory?
- How can you recognize an urban territory? An agricultural territory? A protected territory? A regional territory?

A good way of learning is to organize the knowledge you have now. This will make it easier for you to make connections between what you already know and what you will be learning this year. Before you carry on with your learnings in Secondary 2, why not review what you have already learned and familiarize yourself with the territories that you will be exploring over the new school year?

1 What is a territory?

The agricultural territory

Space that human beings develop in which farming activities dominate (e.g. growing crops, raising livestock). Agricultural territory is characterized by dispersed habitats and the presence of buildings related to agricultural activities (farms, agri-food processing plants, pig farms, etc.).

- National agricultural space
- An agricultural environment at risk

The urban territory

Space developed by human beings, having a dense concentration of population, buildings, streets, etc. Urban territory includes both the centre of a city and its suburbs. Diverse activities are carried out there (trade, industry, education, ect.).

- The city in an environment at risk
- The heritage city
- The metropolis

TERRITORY

A territory is an inhabited space that human beings have organized, developed and modified over time to meet their needs. The development of a territory can evolve over time. The landscapes in a territory reveal traces of past and present human activity.

The regional territory

Space developed by human beings and whose organization is mainly related to economic activities such as tourism, the development of forests and energy resources, and industry.

- The tourism territory
- The industrial territory
- The energy-producing territory
- The forest territory

The protected territory

Natural space whose access and use are controlled. Protected territory is organized to ensure the protection of natural heritage. Human activity in a protected territory must respect nature.

The Native territory

Space occupied by Native peoples, that is, the descendants of the first inhabitants of a region. Native peoples claim, or have obtained, autonomy over their territories. The organization of these lands reflects their culture and their identity.

Landscape: A part of a territory as perceived by the people who observe it.

Source: Nathalie Boudrias, Danielle Marcheterre, and Mélanie Langlais, *Issues and Territories*, Geography, Secondary Cycle One (Montréal: Chenelière Éducation, 2006), Textbook B, 10.

Concepts	Cavendish, PEI (example)	(Your chosen location)
Urban or rural	Rural	
Agricultural or industrial	Agricultural – potato farming	
Transportation networks	Roads, bridges, buses, boats	
Industries	Tourism, potato farming, fisheries	
Sources of energy	Wind energy and solar power	
Natural resources	Rich soil for agriculture, forestry, fisheries	

The following information is from the textbook *Issues and Territories* and other sources.

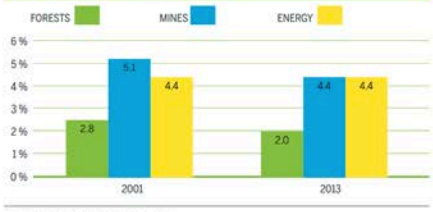
Every day, approximately 230 city buses, 1000 trucks and 24000 cars drive through Vieux-Québec, in addition to tour buses. Vieux-Québec's **topography** and its winter snowstorms create traffic flow problems, making it very difficult for city and tour buses to pass through its narrow, winding streets, some of which are inaccessible.

Quebec forests cover more than 760,000 square kilometres, and over 90% of this area is public land. In 2014, the Quebec forest sector featured approximately 130 sawmills, about 30 pulp, paper and paperboard mills and some 20 panel plants.

3E Inuit art

Every year, over 4 million tourists visit Vieux-Québec, or the equivalent of over 800 tourists for every resident. In the summer, an average of 300 tour buses travel through Vieux-Québec daily. During September's cruise ship season, this number jumps to 700!

CHART 2A: IMPORTANCE OF NATURAL RESOURCE SUBSECTORS TO THE QUEBEC ECONOMY (% OF GDP)



Source: CANSIM table 379-0030. Compiled by the authors.

Quebec City

Quebec boasts 25% of North America's hydroelectricity, 3% of the world's freshwater reserves and numerous and diverse mineral deposits, and 45% of its territory is covered by forest.

An eco-friendly minibus service would be available, free of charge, mainly for tourists and local residents. These hybrid (diesel-electric) minibuses are smaller and pollute less than conventional buses, and will be able to easily navigate the area's narrow, winding streets.

ENERGY

Electricity is by far the leading type of energy produced in Quebec.[6]

Sources: https://www.cpq.qc.ca/wp-content/uploads/2015/07/01927_etude_2_prospérité_ANGLAIS.pdf

Organization of space in Mexico City

Development of the central part of Mexico City was subject to urban **planning**. The streets there are straight and cross some very long thoroughfares, including the Paseo de la Reforma and Insurgentes Avenue. However, since urban growth is very rapid, the sprawl of the city takes place in a disorderly fashion: new shantytowns therefore are erected without any development plan.

Urban sprawl has been so fast and so great that Mexico City's airport, originally built outside the city, is now surrounded by houses. This situation obviously prevents any expansion of this airport as new needs arise.

In 1980, Mexico City's metropolitan area covered an area of about 1000 km². It now spreads out over more than 3000 km².

Mexico has had difficulty creating an integrated transportation network because of the country's diverse landscape and developing economy. As a result, several parts of Mexico lack good rail and road connections, especially from east to west across the northern part of the country. Although Mexico was one of the first countries in Latin America to promote railway development, the extensive formerly state-owned railway system remains inefficient

Drawing power and surrounding regions

Mexico's economic activity is heavily concentrated in Mexico City: refineries, thermal power plants, assembly plants, etc. Over 80% of the factories and one quarter of the jobs in the country are clustered in the capital.

Farmers, who often lead difficult lives in rural communities, are attracted by the **concentration** of economic activity in the **metropolis**. Living in the city is also a sign of success for Mexicans.

Mexico City

Thermal power plants, fired mainly by oil and natural gas, generate about three-fourths of Mexico's electricity. Both nuclear power and renewable resources (wind, solar, and biomass) combined account for about one-tenth of the country's electric power, and hydroelectric complexes provide about one-sixth of the country's needs.

Tourism is a major contributor to the economy. Because of its cultural diversity, tropical settings, relatively low prices, and easy accessibility, Mexico exerts a strong attraction on U.S. tourists, who constitute the majority of visitors to the country.

Sources: https://www.britannica.com/place/Mexico/Trade#ref27400

Resources and power

Minerals have been an important part of the economy throughout Mexico's history. Mexico is the world's leading producer of silver, which has long been the most valuable metal extracted there. The major mining area during the colonial period was the so-called Silver Belt, a region that extended from Guanajuato and Zacatecas in the Mesa Central to Chihuahua in the Mesa del Norte, with outposts such as San Luis Potosí farther east.

Continuity and Change in History

Information for students

An important skill to develop in History class is the ability to make comparisons between the past and the present. It is important to be able to recognize what has remained the same, or continued, and what has changed (*continuity and change*). In this task, you will look at elements of continuity and change.

Instructions

Read the excerpts in the Appendix and determine what elements still remain in today's society and what elements have changed. You can also use your textbook *From Yesterday to Tomorrow* (pages 160-165).

A **chart has been provided** to help you to organize your ideas and to think about various elements and concepts such as laws, industries, individual rights and transportation.

Materials required

Useful resources, depending on personal preferences and availability:

- Device with Internet access
- Writing materials (paper, pencil, etc.)
- Textbook

Information for parents

Students could:

- choose any time or place in history to compare and identify elements of continuity and change

Parents should:

- help their child recognize elements that still remain in today's society

Continuity and Change in History

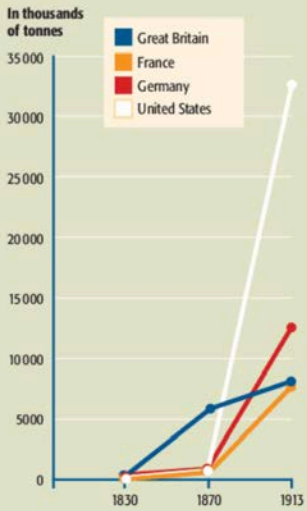
Information for students

Chart to help you organize your ideas:

Elements and concepts	Continues today	What has changed
Laws		
Industries		
Individual rights		
Transportation		

Ocean.

38 IRON AND STEEL PRODUCTION FROM 1830 TO 1913

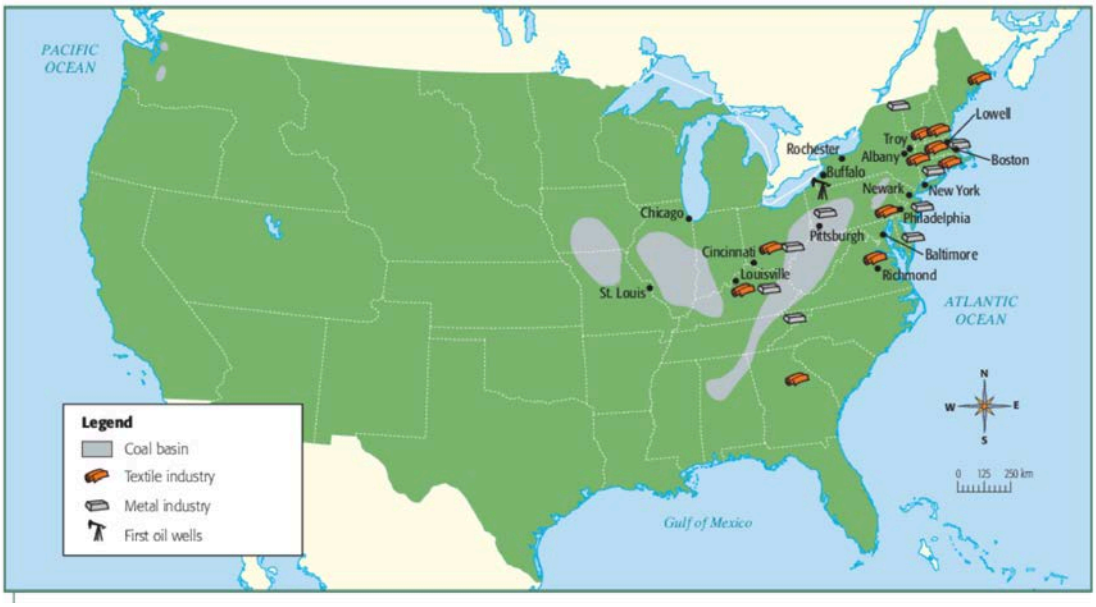


INDUSTRIAL EXPANSION IN THE UNITED STATES

At the end of the 18th century, the US economy was based mainly on agricultural production. In the South, the main crops were cotton, tobacco, rice and sugar cane. In other parts of the country, agriculture and livestock formed the basis of the economy.

Industrialization began around 1850, growing by leaps and bounds under the influence of territorial expansion and heavy immigration. The vast territory provided an enormous market that was opened up by an extensive railway network with 4000 km of track. Immigration provided a substantial workforce. In addition, the country abounded in natural resources; the textile industry fed on the huge output of the cotton plantations and the new steel industry began to grow in 1870, in the northeast. By the end of the 19th century, the United States was the leading industrial power in the world.

39 THE INDUSTRIALIZED UNITED STATES AROUND 1870

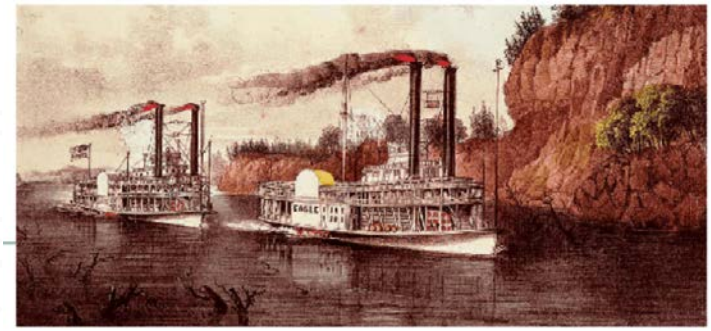


40 **A RAILWAY AQUEDUCT**

The country's extensive railway system contributed to industrial development. This aqueduct was built in the late 1870s.

41 **PADDLE WHEELERS ON THE MISSISSIPPI**

People and goods were transported also by boat.



43 **THE EMIGRANTS**

This painting shows European emigrants admitted into the United States in 1884. In the final decades of the 19th century, between 800 000 and 1 million people fled the poverty of their homelands every year.

A GROWING POPULATION

The population of the United States grew substantially between the end of the 18th century and the end of the 19th century; it numbered only 4 million in 1789, but reached over 23 million in 1850 and almost 70 million by the close of the 19th century. Immigration was one of the main causes of this demographic growth. Every year between 1820 and 1850, about 200 000 emigrants arrived in the United States. From 1830 to 1860, 4.6 million Europeans came to the US.

Industrialization took a large number of these people to the cities, thus hastening urbanization.

Living and working conditions

The industrialization of the United States was largely dependant on child labour. At the beginning of the 19th century, children between seven and 12 made up one third of the workforce. By the end of the century, one child in five between the ages of 10 and 16 was employed in a factory. For children, as for adults, working conditions were appalling, resembling in every way the conditions in Great Britain and the other industrial countries. Labourers' living conditions were equally miserable. Cities were constructed too hastily to provide adequate accommodation for the rapidly expanding population, leaving masses of American labourers living in unsanitary slums during the Industrial Revolution.

Workers protest

American workers formed unions to fight for better living and working conditions. These unions were particularly active and called frequent strikes. In one year, from 1886 to 1887, there were about 3 000 strikes. They were often violent and sometimes bloody because of opposition from employers and public authorities. From 1902 to 1904, for example, work conflicts accounted for 198 deaths and 2000 injuries.

Social policies

After many strikes, demonstrations and legal decisions, workers obtained better living and working conditions.

Here are some examples of social policies adopted in the United States in the 19th century:

- 1842: The Supreme Court of the State of Massachusetts recognized that unions were not illegal associations.
- 1842: Connecticut and Massachusetts passed a law forbidding children to work more than 10 hours a day.
- 1847: New Hampshire prohibited children from working more than 10 hours a day without their parents' consent.
- 1848: Pennsylvania passed legislation forbidding children under 12 to work in mills.
- 1850: Public education became universal.

Unhealthy working conditions

Here is an eyewitness report on working conditions in a Pennsylvania textile mill, around 1850:

At this time of year, our employers make us work from five in the morning until sunset. That makes 14 hours of work with a half-hour break for breakfast and an hour for lunch. This means 12.5 hours of hard labour at an unhealthy task, without a breath of fresh air to cool us when we are choking and suffocating. We cannot see a ray of sunshine through a window, and the air is thick with dust and fluff from the cotton. That is what we breathe. It destroys our health, ruins our appetites and wears down our physical resistance. . . . The brief rest we have at night is insufficient to restore our spent energy, and we return to work in the morning as exhausted as we were when we left the day before.

Source: Christian Laville, *From Yesterday to Tomorrow*, History and Citizenship Education, Secondary Cycle One (Montréal: Chenelière Éducation, 2008), Textbook B, 160-165.