

Unit Title: Environmentalism and Land Use Conflict in *My Neighbourhood*

Time Frame: 5 lessons (60 minutes each)

Unit Developer(s): Ryan Harper

Developed for Course Name and Course Code: Geography of Canada, Grade 9, Academic, CGC1D

Strand(s) and Curriculum Learning Expectations Addressed:

Geographic Foundations: Space and Systems Strand

SSV.01 • describe the components and patterns of Canada's spatial organization

Human-Environment Interactions Strand

HEV.02 • analyse the ways in which natural systems interact with human systems and make predictions about the outcomes of these interactions

Understanding and Managing Change Strand

UMV.01 • explain how natural and human systems change over time and from place to place;

UMV.02 • predict how current or anticipated changes in the geography of Canada will affect the country's future economic, social, and environmental well-being;

UMV.03 • explain how global economic and environmental factors affect individual choices.

Methods of Geographic Inquiry and Communication Strand

MIV.01 • use the methods and tools of geographic inquiry to locate, gather, evaluate, and organize information about Canada's natural and human systems;

MIV.02 • analyse and interpret data gathered in inquiries into the geography of Canada, using a variety of methods and geotechnologies;

MIV.03 • communicate the results of geographic inquiries, using appropriate terms and concepts and a variety of forms and techniques.

Desired Results

Unit Description:

The unit begins with a multimedia powerpoint lesson outlining the different types of urban land use that we find in cities, such as Mississauga. With this background information, students are then encouraged to work together to think about possible land use conflicts that may arise when different types of land use (i.e. industrial and residential) are located in close proximity to one another. To emphasize the importance of natural space in our local environment, students spend the third lesson visiting a preserved woodlot near our school. While there, students take responsibility as environmental stewards by cleaning up the woodlot. At the end of the cleanup, we discuss the importance of the woodlot in our community. For the fourth and fifth lesson of this unit, students return to the classroom and are assigned roles representing local interest groups.

The unit concludes with a town hall discussion about whether or not the woodlot should be cut down and replaced by more residential development where students represent "Local Residents", "Environmentalists", "Local Business Owners" and "Property Developers".

Enduring Understandings/Learning:

The social, environmental, and urban development issues covered in this unit allow students to gain an appreciation of how local and regional geographic issues can affect Canada's natural and human systems. Students are also given the opportunity to demonstrate geographic inquiry results through interaction and debate. A combination of multimedia education, debate, and hands-on learning promotes understanding for students with diverse learning styles.

Assessment Tasks**Performance Tasks and Other Evidence That Will Demonstrate the Knowledge and Skills Acquired:**

Students are required to participate in a town hall debate in class. Individuals are evenly and randomly divided into four groups, representing conflicting points of view. Students are evaluated based on their ability to communicate and represent their assigned point of view.

Assessment Criteria:

Students are assessed individually using the criteria outlined in the assessment rubric in **Appendix A**

Unit Planning Notes**Prior Learning Necessary:**

Students should have some knowledge on the processes involved in developing a supported opinion argument.

Preparation Notes:**Prior to Lesson #1:**

- Prior to Lesson #1 of this unit, the teacher should send home permission forms, as appropriate to the school's and/or board's policies for field trips, with each student to gain parental authorization to take the students on a field trip to the nearest woodlot or natural area. Permission forms should be returned

by Lesson #1 at the latest.

- The unit refers to the textbook *Making Connections: Canada's Geography*. If this is not the textbook in use at your school, then appropriate pages regarding land use patterns in the course textbook that is used need to be determined and should be assigned for reading as homework for Lesson #1 to enhance students' understanding of that lesson.
- The powerpoint also refers to the textbook and homework questions on slide 14. If you are using a different text book, this slide will need to be adjusted.

Lesson #1:

- All required A/V equipment (computer, LCD projector) should be set up to facilitate delivery of the powerpoint presentation.

Lesson #2:

- A class list should be printed off and then each student's name cut out individually for the group draw. The teacher will also require some chart paper and green and red markers to distribute to the class.

Lesson #3:

- The teacher should visit the woodlot ahead of time to make sure it is accessible and not too wet or dangerous for the class to visit.
- I also contacted the local community television station a few weeks prior to our visit to ask if they'd like to do a story on our woodlot cleanup, and they were happy to come out and film our students giving back to their community.
- The teacher should also make sure that there are enough garbage bags (I usually bring 3 or 4), and non-latex rubber gloves for students to each have one (we are trying to clean up the environment, rather than create waste, so minimizing the use of items is important).

Lesson #4 and 5:

- The teacher may wish to arrange desks in a formation that is conducive to a town hall debate. A horseshoe shape or parallel rows (facing one another) tend to work well for this.

Learning Plan

Lesson 1

1. This class begins with a brief class brainstorming session where students are requested to raise their hands and share any examples that come to mind when they think of the types of land use that can be found in their city. (5 minutes)
2. The instructional component of this lesson involves students taking a few notes and participating in an interactive powerpoint lesson. See attached powerpoint on urban land uses. (40 minutes)

3. Students are assigned to read pages 247 – 264 in the textbook *Making Connections: Canada's Geography*. They are also assigned questions #1, 2, 3, 6, 7, 15, and 17 on pages 264 and 265. This should be completed for tomorrow's class. Students are given 15 minutes at the end of today's class to get started on their homework. (15 minutes) Appropriate substitutions can be made at the teacher's discretion in the event that your class uses a different textbook, or to meet the learning abilities of your class.

Lesson 2

1. This class begins with a homework check to verify completion of yesterday's assigned reading and questions. As a class, take up the assigned questions. (10 minutes)
2. The teacher then conducts a draw by placing each student's name into a hat and pulling them out one at a time. When a student's name is chosen, they select which of the four groups they wish to join: ("Local Residents", "Environmentalists", "Local Business Owners" and "Property Developers"). Once a group is full (i.e. it has $\frac{1}{4}$ of your total class in it), students may no longer join that group. (15 minutes)
3. The teacher should record student names and the group to which they belong on a master list. This can be found in **Appendix B**
4. Students are then instructed to sit with their new groups. The four groups are each assigned a corner of the room (by the teacher). Each group receives a piece of chart paper and the students instructed to write one word in each corner of the page. On the top left quarter, students write "Residential". On the top right quarter, students write "Industrial". On the bottom left, students write "Commercial", and on the bottom right, students write "Institutional". In between each word (representing different urban land uses), students record (in green marker), the benefits of having these two types of land use side-by-side. Students are also to record (in red marker) any conflicts that exist between neighbouring land uses. (15 minutes)
5. After students have brainstormed their ideas, each group is encouraged to share their findings with the class. In a teacher-led group discussion, students can be encouraged to elaborate on their claims of benefits or conflicts. (15 minutes)
6. This class should finish with a brief preview of tomorrow's class. The teacher review all expectations associated with off-site field studies, and remind students to dress appropriately for an outdoor class (i.e. bring their jackets or boots if it's cold or rainy/snowy). Students should also be made aware of any changes in meeting place. I usually instruct my class to meet just inside the front doors of the school for attendance at the start of tomorrow's class. This makes it easier to head over to the woodlot. (5 minutes)

Lesson 3

1. The teacher should leave a note on the classroom door reminding students that they should meet at the front doors of the school. Students should meet the teacher at the main entrance to the school.
2. The teacher must take attendance and verify that all students present have submitted permission forms before leaving school property.
3. Once attendance has been taken, the teacher should give a copy of the attendance to the office so that

- they are aware of who will be out of the building for this period. (5 minutes – steps 1-3)
4. The teacher should lead the class as they walk down the street to the local woodlot. Students may need to be reminded to walk on sidewalks and to obey all traffic signals at intersections. Looking both ways before crossing streets is another piece of advice that high school students may forget from time to time, so I like to remind them of this too. (10 minutes)
 5. Once at the woodlot (or prior to departing the school, depending on your preference), distribute non-latex rubber gloves and garbage bags to the students. It can be challenging finding volunteers to carry the garbage bags, but once the students know that these people are not required to pick up any trash, there will usually be a few volunteers. (5 minutes)
 6. Students are reminded to be careful not to touch anything that looks dangerous (sharp objects, heavy objects, contaminated objects, or living objects...including one another).
 7. Students are given time (in groups) to explore a small area of the woodlot, and should be instructed to do their part and pick up litter that they find along the way. The teacher should accompany the whole group, but monitor individuals to ensure participation. (25 minutes)
 8. The group reconvenes at a predetermined time and location. The teacher again takes attendance to ensure that the entire group has reconvened.
 9. The teacher can lead a brief discussion of what the class noticed about the woodlot. Was there a lot of litter? Did we see any wildlife? Why is this a valuable part of our neighbourhood? These are all examples of informal questions that can be posed. (5 minutes)
 10. Once all students have been accounted for, the teacher should lead the class back to the school. The bell signaling the end of class should ring at the precise moment that you and your class walk in the front doors. (10 minutes)

Lesson 4

1. The teacher should instruct students to sit with their group members. This works best if the teacher assigns the four groups to a specific corner of the classroom.
2. Class begins with a brief summary of yesterday's events and responses to any lingering questions that students may have regarding their responsibilities for today's class. (5 minutes)
3. The teacher should briefly go over the format for tomorrow's debate with the class. See "Lesson 5" (below) for a detailed breakdown. I would recommend writing the format on the board so that students can better visualize the process. (10 minutes)
4. Students have the entire period today to prepare for tomorrow's debate. They must represent their assigned point of view and address the question: "Should the local woodlot be torn down and replaced by more residential properties?" (45 minutes)

Lesson 5

1. Today is debate day! The class should begin with the "Local Residents" and "Environmentalists" sitting on one side of the room, and the "Local Business Owners" and "Property Developers" sitting on the opposite side of the room, facing each other.
2. Each group will be allocated 3 minutes for an introduction and for sharing their main arguments in

support of their point of view. *(15 minutes)*

3. Each group will then have a 3 minute rebuttal, during which time they are to respond to claims made by the other groups. *(15 minutes)*
4. If one of the other groups mentions your group in their rebuttal, you may have a 1 minute response to their rebuttal, once it is over. I usually do this immediately following each individual 3 minute rebuttal. *(up to 15 minutes)*
5. To conclude the debate, each group will have 3 minutes to make a concluding statement. *(15 minutes)*
6. If any time remains after the debate is over, the teacher can lead the class in a debriefing of the different points of view that were presented in the debate. Otherwise, this can take place at the start of tomorrow's class.

Appendices

Appendix A – Rubric for evaluating the woodlot debate

Appendix B – Groups for the woodlot debate

Appendix C – Powerpoint – See attached powerpoint for introductory lesson on land uses.

Other Possible Course Applications

This unit of study could be easily adapted to the Grade 9 Applied “Geography of Canada” course (CGC1P).