

Stewardship 35: IMMERSION Instructor Package

The following plans and activities are to be completed in the immersion program at the Palisades Centre. Module 1, 3 and 4 are designed to take a half day each approximately. On the other hand, Module 2 will be an all day session at Marmot Basin in combination with Marmot Education Centre and Parks Canada. Some assignments may require extra time during the week of programming at the Palisades Centre – some time should be devoted to the student’s completion of these mostly reflective assignments. Students are encouraged to document their experiences through written, video or still digital photography. Such documentation will help the students in current and future assignments in this course.

Technology (and sometimes anti-technology!)

- Use of the Barn’s SmartBoard and other computers
- Tough-books for GIS activities
- Digital maps
- Cameras
- Adobe 9 Map Viewer
- ArcMap GIS Software and Data sets from Carol Doering (carol.doering@pc.gc.ca)
- Outdoor stations

Course Materials

- Student’s notebook/journal
- Cameras
- David Suzuki’s book, **The Big Picture** (2009)

Assignments

Any reflection assignments or notes are to be kept in the student’s notebook and can be used to evaluate the student in the course. Some handouts will be collected by the course administrator or teacher to be used in the student’s evaluation.

Outline

Module	Module Outline (Location, and Materials Needed)
1 – Introduction to decision-making data collection – determining conflict areas and how to analyze/collect data.	Students will work with Parks Canada Communications Officer, Jasper Trails Project – Marci DeWandel. Students will answer: How do we analyze the impacts of various activities in the Park. (Could have students travel to areas affected by Jasper Trails Project).
2 – Case Study: Marmot Basin	Students will answer: How does Marmot Basin live up to the Parks Canada mandate and the recreation activities framework? Is a ski hill sustainable in Jasper National Park?
3 – Case Study (Videoconference):	Students will compare the management strategies of ski hills outside of national park boundaries. Students will answer: How does stewardship look in different, but similar areas?
4 – Applied technology – Marmot Basin GIS study	Students will use GIS technology to analyze the Marmot Basin area (wildlife impacts, ecological integrity, fire occurrence)

Module 1 – Instructor’s Notes

- Note that each activity/module scheduled in the Immersion component are built towards the completion of the summative assessment project – evaluation of Marmot Basin
 - It would be helpful for the students to go over this project before beginning the modules – they should know what they should be recording and taking note of.
 - Note that this final project is a group collaboration (groups could be chosen at the outset of the week)
 - Note that there are various components to this group project – adjust according to numbers (leave components out if there are certain students missing)
 - The Summative project is in ‘**Appendix A**’
1. As stated above, go over the summative project with the students. Explain to them that in this project (as opposed to the 200 level), students will be:
 - Determining the scope and type of potential problems having to do with the management of the ski hill
 - Determining other possibilities and strategies for evaluating the ski hill’s viability in a national park
 - Gathering data both through interviews and through GIS that they will apply to their final project.
 2. Introduce Marci DeWandel: (Marcia.dewandel@pc.gc.ca) Be sure to give ample notice of her participation. She will come out to the Palisades if needed – she may also request that the students spend some time on the Jasper Trails – get to understand the Jasper Trails Project firsthand.
 3. Questions that should be asked or answered with Marci’s presentation:
 - How do you/Parks analyze the impacts of specific activities?
 - What is the line between acceptable forms of activities and unacceptable?
 - What tools do you use in order to make such decisions?
 - What has been done in the past to alleviate overused areas or activities that weren't fitting into the Parks mandate?
 4. Give students ‘**Appendix B**’ that they will fill out while working with Marci.

Module 2 – Visit Marmot Basin

1. Students will be visiting Marmot Basin to have a guided tour of the facilities. Contact Colin Borrow cborrow@skimarmot.com in order to set up the tour. The tour should consist of:
 - Detailed information about amount of visitors, type of visitors, running season, etc...
 - Detailed information about collaboration with Parks Canada
 - Detailed information about education initiatives
 - Detailed information about opening of new chair lift (and what was required to do so)
 - Detailed information about pertinent stakeholders
 - Detailed information of other environmental initiatives
 - Detailed information about future projects and how they hope to include youth
 - Detailed information about what separates them from other ski hills both within and outside of national parks
 - Detailed information of why the ski hill is vital to the preservation of Jasper National Park
2. They should bring notebooks, cameras, etc... as the entire trip pertains to their project. Students should be encouraged to ask questions in their specific groups
3. Ultimately – how can a ski hill be sustainable in Jasper National Park?

Module 3 (optional) – Videoconference to Education Centre near Mont Tremblant, Quebec

Note – at the time this project was put together, representatives from Mont Tremblant ski hill had yet to get back to course organizer. Thus, there may be a slight change in the programming; however, the content and message will be similar.

1. Contact the Palisades Educational Partner – Michael Quinn for the appropriate connection (if not him): mquinn@swlauriersb.qc.ca.
2. In Michael’s presentation, the following topics should be covered:
 - Contemporary management concerns at Tremblant – specific to environmental preservation and land stewardship
 - Nearby protected areas and to what degree is stewardship important
 - Differences in management between Tremblant and Marmot
 - Stakeholders in decisions made at Tremblant
3. Remind students about the component in their major projects that deal with the issues being discussed here.

Module 4 – GIS Component

Contact Carol Doering (carol.doering@pc.gc.ca) for the data sets relevant to the study of Marmot Basin.

- The onus here should be on the students to ask Carol for the appropriate data (and possibly for hints on how to manipulate and present the data).
- Carol should be given advanced warning in terms of being prepared and available to help the students in their projects.
- As an alternative – organizers may wish to have all students involved in the GIS component.

Appendix A

Stewardship 35 – Summative Project

Case Study: Marmot Basin in Jasper National Park

- Project to be completed in Groups (size of groups to be determined by teacher)
- Note that there are 4 different components to this project – make sure the work for the project is distributed evenly (different components require different skills)
- Be prepared to present your findings and project at the end of your time at the Palisades
- Be sure to keep track of where your material comes from (Reference Page). Copy and Paste is not permitted.

ULTIMATELY... Your group must satisfactorily answer the following question:

- ***Is Marmot Basin sustainable in Jasper National Park?***
(According to the Parks Canada Mandate – Education, Experience, Protection)

In order to fully answer this question, your group must complete the following components:

Component	Format	Skill Set or Interest	Topics
1 – Background & Setting Research Problem or Thesis	- Visual presentation (Slideshow with text)	- History - Analysis of past ideas - Ability to critically analyze current practices and strategies	- History of downhill skiing in J.N.P. - Analysis of current strategies and management plans - Analysis of current use and possible problems or concerns
2 – Defining Relevant Concerns & Sustainability Issues	- Written or Poster or Photo Essay	- Excellent written or visual text creation skills - Be able to demonstrate complexity of this issue	- Wildlife impacts - Ecological preservation - Education - Experience
3 – Defining Parameters & Gathering Data	- Surveys, interviews, graphing - Presentation of key findings	- Data Analysis - Use of spreadsheets - Use of graphing tools - Statistics and Interviews	- Parks Mandate – properly surveying a variety of people to gather the range in perspective on this issue
4 – GIS Mapping Component	- GIS with relevant text - Maps	- GPS and GIS software knowledge	- Wildlife impact - Ecological impact - Education/Experience
5 – Conclusions – in terms of the Parks Canada Mandate – is Marmot Basin sustainable?	- Your Choice	- All (whole group component)	- Wrapping up the gathered information - Defending your conclusion(s)

Part 1 Instructions: Background & Setting the Research Problem and Thesis

1. Your job is to visually provide all of the relevant background information about Marmot Basin's relationship with Jasper National Park.
2. At the heart of your visual presentation will be the basis for your defining question(s) that you hope to answer in this project (you'll need to collaborate with your group to achieve this).
3. Analyze the past management plans and systems to determine your course of study for this project.
4. Give an understanding of the numbers involved with visitor experience at Marmot. Look at the number and type of visitors – look at how these visitors have rated this experience, etc...
5. Linking to conclusion – from a historical/mountain culture perspective, how is Marmot Basin sustainable or unsustainable?

Part 2 Instructions: Defining Relevant Concerns and Sustainability Issues

1. Whereas the job in Part 1 was to analyze past management concerns, your job is to analyze the ski hill from a current perspective to determine what the contemporary issues are facing Marmot Basin (in relation to the Parks Canada Mandate).
2. You may choose to do this portion as a written essay, poster or photo essay that insightfully demonstrates the current issues Marmot management are dealing with.
3. What is Marmot Basin currently doing in terms of Education, Experience and Protection?
 - Propose how you could rate Marmot's performance in regards to each one of the components of the Parks Mandate
 - Speak with people that are currently working on the management issues for and with Marmot Basin.
4. Ultimately, you will help to determine what areas require more focus from managers at the ski hill and/or what areas are sufficiently being dealt with.

Part 3 Instructions: Defining Parameters and Gathering Data

1. The main focus of this component is to gauge opinions on the questions relevant to this project.
2. You must create and distribute a survey with questions that will gauge people's opinions on Marmot's ability to be sustainable.
3. Create survey questions and attach number values to the answers so that you have measurable outcomes.
4. You must lay out the specifics of your survey – how many people, ages, professions, etc...
5. You may also want to interview who you consider to be the 'key' stakeholders in this debate – what are their considerations on this topic? Who are the key stakeholders?
6. Present your data to demonstrate how you collected the data and how your group was able to analyze the data in relation to your project.

Part 4 Instructions: GIS Mapping Component

1. Through an analysis of data sets involving the operation of the ski hill, you will determine the following:
 - Possible conflict areas
 - Visitor experience ratings
 - Public safety incidents
 - Areas where the ski hill could expand
 - Areas where the ski hill should contract
2. Relevant data sets will be available from your teacher and from Parks Canada GIS expert, Carol Doering.
3. Present your findings in an interesting way with the rest of the project – including at least one map that you have created.

Part 5 Instructions: Conclusions and Recommendations

1. After each person has completed their portion of the project, you must all work together to determine if Marmot Basin is sustainable in Jasper National Park.\
2. Demonstrate how you came up with your final answer.
3. Explain your recommendations – should be a minimum of 5 recommendations directed towards either the management at the ski hill or to the Parks Canada land use managers.
4. Choose a format that will best accentuate the hard work you have put into your project.
5. Include a reference page – indicate where the information came from that was used in this study.

Appendix B

**Presentation by Marci DeWandel
Communications Officer
Jasper Trails Project**

Share the Valley
JASPER NATIONAL PARK



Jasper Trails Project

Fill out notes from Marci's presentation in relation to the following questions:

1. How do you/Parks analyze the impacts of specific activities?
What is the process?

2. How do you determine the line between acceptable forms of activities and unacceptable forms in Jasper National Park? What are examples of each?

3. What tools do you use in order to make such decisions? What are some other possible examples?

4. What has been done in the past to alleviate overused areas or unacceptable forms of activities (ones that weren't fitting into the scope of the Parks Canada Mandate)?
