

NORD 857: Northern Resource Economics and Policy

UNIVERSITY OF SASKATCHEWAN CAMPUS	
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ROOM:	N/A
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LAND ACKNOWLEDGEMENT

The University of Saskatchewan campus of the Johnson Shoyama Graduate School of Public Policy is situated on Treaty 6 Territory and the Homeland of the Métis, while the University of Regina campus is situated on Treaty 4 Territory and the Homeland of the Métis. We pay our respect to the First Nation and Métis ancestors of this place and reaffirm our relationship with one another. As we engage in Remote Teaching and Learning, we would also like to recognize that some may be attending this course from other traditional Indigenous lands. I ask that you take a moment to make your own Land Acknowledgement to the peoples of those lands. In doing so, we are actively participating in reconciliation as we navigate our time in this course, learning and supporting each other.

HONOUR CODE

At the Johnson Shoyama Graduate School of Public Policy (JSGS), we believe honesty and integrity are fundamental in a community dedicated to learning, personal development, and a search for understanding. We revere these values and hold them essential in promoting personal responsibility, moral and intellectual leadership, and pride in ourselves and our University.

As JSGS students, we will represent ourselves truthfully, claim only work that is our own, and engage honestly in all academic assignments.

Since articulated standards and expectations can influence attitudes, and because each of us shares the responsibility for maintaining academic integrity (see below for details on academic integrity at the JSGS), we are committed to upholding the Academic Honor Code.

Academic Honour Pledge

As a member of the JSGS community, I pledge to live by and to support the letter and spirit of JSGS's Academic Honour Code.

REMOTE LEARNING CONTEXT

We acknowledge the complex circumstances – i.e., a worldwide pandemic – in which this course is taking place. Since remote teaching and learning context is new to both instructors and students, all participations should interact with empathy, patience and care. Links to online learning resources are provided below.

CALENDAR DESCRIPTION

This course explores the economic concepts related to the management of renewable and non-renewable resources in the northern world. Students will examine competing theories and learn to apply analytic models and policies that enhance their understanding of how resources are distributed and managed. This course will have a field school component that will involve international travel.

LEARNING OBJECTIVES

Course Learning Outcomes

Core Abilities

- A. Communicate effectively through written work and oral presentation.
- B. Apply economic theory to northern resource development issues.
- C. Criticize environmental and resource development policy in the North.

COURSE CONTENT AND APPROACH

This course is presented in modular fashion. Each module contains readings and video recordings as well as assignments and discussions. You are expected to complete each and post your work by the due date and time in your time zone. Modules and learning objectives include the following:

Articulate the facets of sustainability and sustainable development in the North using an economic perspective

- Differentiate among social, environmental and economic sustainability.
- Discuss trade-offs in the pursuit of sustainability goals.
- Describe how time affects sustainability
- Compare ecological views of resources

Characterize the importance of property rights for sustainable resource use.

- Discuss the six key components of property rights.
- Relate property rights to land tenure.
- Explain resource use rates under different property rights regimes.

- Articulate how property rights can affect sustainability

Examine sustainable production models for renewable and non-renewable resources.

- Compare production models of renewable and non-renewable resources.
- Identify biological and economic sustained yields
- Consider economic factors that affect long-term sustainable production

Explain natural resource allocation and production using market principles

- Summarize the reasons markets fail
- Relate market failure to property rights
- Discuss policy responses to market failure.
- Assess the effect of market failure on social welfare.

Assess the causes of market failure and solutions

- Summarize the reasons markets fail
- Relate market failure to property rights
- Discuss policy responses to market failure
- Assess the effect of market failure on social welfare

Demonstrate approaches to valuing non-market goods and services

- Characterize the difference between market and non-market goods
- Articulate the difference between eco-centric and anthropocentric values.
- List the strengths of using a revealed preference approach to value non-market goods
- Compare the key aspects of using the travel cost method, contingent valuation, the hedonic approach and choice experiments to value goods and services.

Investigate the cost/benefit approach to evaluating resources.

- Discuss the importance of time in evaluating alternatives
- Explain the role of risk in valuing resources.
- Determine the effect of time on Net Present Value.
- Compare the pros and cons of evaluation criteria methods including: Net Present Value, Internal Rate of Return, Cost Effectiveness Analysis and the Cost/Benefit ratio.

Research the economic role of resources in the economy

- Evaluate sustainability.
- Discuss policy options
- Compare management across jurisdictions
- Determine the costs and benefits of resource development.

Textbook

Taylor, Timothy and Greenlaw, Steven A. Principles of Economics. OpenStax College. Available online at <https://open.umn.edu/opentextbooks/textbooks/principles-of-economics-191>

The textbook is **FREE** and should be considered an additional reference for you to look up economic concepts.

REQUIRED READINGS

Ackerman, F. and Heinzerling, L., 2002. Pricing the priceless: Cost-benefit analysis of environmental protection. *University of Pennsylvania Law Review*, 150(5), pp.1553-1584.

Anderson T., & Huggins, L.E., 2003. The property rights path to sustainable development, in "Proceedings, Federal Reserve Bank of Dallas," issue Oct, pages 57-71. Retrieved from: <https://ideas.repec.org/a/fip/feddpr/y2003ioctp57-71.html>

Ayres, R.U., 2008. Sustainability economics: Where do we stand? *Ecological economics*, 67(2), pp.281-310.

Colby, Michael E. "Environmental management in development: the evolution of paradigms." *Ecological Economics* 3.3 (1991): 193-213.

Elliott, S.R., 2005. Sustainability: an economic perspective. *Resources, Conservation and Recycling*, 44(3), pp.263-277.

Haley, D. and Nelson, H. 2007. Has the time come to rethink Canada's crown forest tenure systems? *The Forestry Chronicle*, 83(5):630-641.

Hanemann, W.M. 2006. The economic conception of water. *Water Crisis: myth or reality*, 61, pp.74-76.

Hesseln, H. 2019. Boreal forests of the circumpolar world. In *The Global Arctic Handbook*, Springer, Cham. Pp. 101-123.

Khalilian, S., Froese, R., Proelss, A. and Requate, T., 2010. Designed for failure: a critique of the Common Fisheries Policy of the European Union. *Marine Policy*, 34(6), pp.1178-1182.

Koppisch, J. 2012. Why are Indian reservations so poor? *PERC Reports*, 30(2) Fall, 6-13pp. Retrieved from: <https://www.perc.org/2012/09/14/why-are-indian-reservations-so-poor-2/>

Kuhlman, T. and Farrington, J., 2010. What is sustainability? *Sustainability*, 2(11), pp.3436-3448.

Parks, S. and Gowdy, J., 2013. What have economists learned about valuing nature? A review essay, *Ecosystem Services*, 3, pp. e1-e10.

Pearce, D., 2002. An intellectual history of environmental economics. *Annual review of energy and the environment*, 27(1), pp.57-81.

Pearse, P.H., 1988. Property rights and the development of natural resource policies in Canada. *Canadian Public Policy/Analyse De Politiques*, pp.307-320.

Peter Larkin (1978, p. 57) in *Fisheries Management – An Essay for Ecologists*.

Rideout, D. and Hesseln, H. 2001. Chapter 11: Benefit Cost Analysis. *Principles of Forest and Environmental Economics*. 2nd Edition. Colorado: Resource & Environmental Management, LLC.

Wright, R. 2013. The Nisga'a experiment. PERC Reports, 32(2) Fall/Winter, 8-17pp. Retrieved from: <https://www.perc.org/2013/12/04/the-nisgaa-experiment/>

WWF. 2015. Living Blue Planet Report. Species, habitats and human well-being. Tanzer, J., Phua, C., Lawrence, A., Gonzales, A., Roxburgh, T. and P. Gamblin (Eds). WWF, Gland, Switzerland. Retrieved from: <https://www.worldwildlife.org/publications/living-blue-planet-report-2015>

WWF. 2018. Living Planet Report - 2018: Aiming Higher. Grooten, M. and Almond, R.E.A.(Eds). WWF, Gland, Switzerland.

ASSIGNMENTS & EVALUATION

Assignments will be posted on Canvas with due dates, instructions, and rubrics. You will also be able to see your due dates through the calendar app in Canvas.

You will complete a total of five performance assessments plus a final reflection essay as well as participating in online commentary. Each assessment will be evaluated using a rubric provided to you with marking guidelines. You will have a choice of assessments and may choose the format and topic in which you are most interested.

20 points – Participation in online class discussion (you must take part in the dialogue to get the points and provide substantive comments)

20 points – Individual debate

20 points – Three-minute thesis **or** micro-lecture

20 points – Interview **or** editorial

20 points – Group debate

20 points – Blog/Peer review

50 points – Policy brief or proposal

ATTENDANCE AND PARTICIPATION EXPECTATIONS

Students are expected to participate in discussion sessions online – this will be strictly asynchronous.

LATE ASSIGNMENTS

Late assignment will be assigned a penalty of 5%; assignments more than a week late will lose a full grade of 10%; special circumstances will be considered upon application by the student.

ADDITIONAL EVALUATION INFORMATION

More information on the Academic Courses Policy on course delivery, examinations and assessment of student learning can be found at: <http://policies.usask.ca/policies/academic-affairs/academic-courses.php>

The University of Saskatchewan Learning Charter is intended to define aspirations about the learning experience that the University aims to provide, and the roles to be played in realizing these aspirations by students, instructors and the institution. A copy of the Learning Charter can be found at: <http://teaching.usask.ca/about/policies/learning-charter.php>.

USE OF VIDEO AND RECORDING OF THE COURSE

Video conference sessions in this course, including your participation, will be recorded and made available only to students in the course for viewing via Canvas after each session. This is done, in part, to ensure that students unable to join the session (due to, for example, issues with their Internet connection) can view the session later. This will also provide students with the opportunity to review any material discussed. Students may also record sessions for their own use, but they are not permitted to distribute the recordings (see below).

Please remember that course recordings belong to the instructor, the University, and/or others (like a guest lecturer) depending on the circumstance of each session, and are protected by copyright. Do not download, copy, or share recordings without the explicit permission of the instructor.

For questions about recording and use of sessions in which you have participated, including any concerns related to your privacy, please contact your instructor. More information on class recordings can be found in the Academic Courses Policy at <https://policies.usask.ca/policies/academic-affairs/academic-courses.php#5ClassRecordings>.

COPYRIGHT

Course materials are provided to you based on your registration in a class, and anything created by your professors and instructors is their intellectual property, unless materials are designated as open education resources. This includes exams, PowerPoint/PDF slides and other course notes. Additionally, other copyright-protected materials created by textbook publishers and authors may be provided to you based on license terms and educational exceptions in the Canadian Copyright Act (see <http://laws-lois.justice.gc.ca/eng/acts/C-42/index.html>).

Before you copy or distribute others' copyright-protected materials, please ensure that your use of the materials is covered under the University's Fair Dealing Copyright Guidelines available at <https://library.usask.ca/copyright/general-information/fair-dealing-guidelines.php>. For example, posting others' copyright-protected materials on the open web is not covered under the University's Fair Dealing Copyright Guidelines, and doing so requires permission from the copyright holder.

For more information about copyright, please visit <https://library.usask.ca/copyright/index.php>. For information on students' rights, see <https://library.usask.ca/copyright/students/rights.php>, or contact the University's Copyright Coordinator at copyright.coordinator@usask.ca or 306-966-8817.

STUDENT RESOURCES

- Netiquette information resources for faculty, instructors and students highlight the basics of internet etiquette including how to appropriately connect and communicate in a remote teaching and learning context. See <https://teaching.usask.ca/remote-teaching/netiquette.php> and <https://studentstest.usask.ca/articles/netiquette.php>.
- Remote learning readiness tutorial for students. This resource engages students in learning about the skills associated with remote learning success. Feel free to send this to students or embed it in your Canvas or Blackboard course as a recommended or required activity. See – see https://libguides.usask.ca/remote_learning.

- Remote learning resources have been pulled together for students on the students.usask.ca website. This site is updated regularly. See <https://students.usask.ca/remote-learning/index.php>.
- Academic integrity tutorial for students. This resource introduces students to the concept of academic integrity and guides them to better understand their responsibilities regarding academic work, their rights, and the supports and services available to ensure they succeed within the larger scholarly community. Feel free to embed this in your Canvas or Blackboard course as part of your course-based activities on academic integrity. See <https://libguides.usask.ca/AcademicIntegrityTutorial>.
- **Be Well at USask** is a podcast for all members of the university community highlighting campus initiatives and resources designed to engage and support. Included are episodes on how to thrive at university, transitioning to remote learning, academic supports, career planning in a crisis, as well as many other student supports. See https://www.youtube.com/playlist?list=PLQptLdMDrox2_HZ0XAfHQW6DZoQOhoXes.

STUDENTS WITH SPECIAL NEEDS

Students in this course who, because of a disability, may have a need for accommodations are encouraged to discuss this need with the instructor and to contact one of the following:

USask: Disability Services for Students (DSS) – 306-966-7273.

U of R: Coordinator of Special Needs Services – 306-585-4631.

STUDENTS EXPERIENCING STRESS

Students who are experiencing stress can seek assistance from one of the following:

USask: Student Affairs and Outreach – <https://students.usask.ca/health/centres/student-affairs-and-outreach.php> or call (306) 966-5757.

U of R: Counselling Services – <http://www.uregina.ca/student/counselling/contact.html> or call (306) 585-4491 between 8:30 a.m. to 4:30 p.m. Saskatchewan time Monday to Friday.

ACADEMIC INTEGRITY AND CONDUCT

Understanding and following the principles of academic integrity and conduct is vital to your success in graduate school. Ensuring that your work is your own and reflects both your own ideas and those of others incorporated in your work is important: ensuring that you acknowledge the ideas, words, and phrases of others that you use is a vital part of the scholarly endeavour. The JSGS has developed an Honour Code (see above) that encapsulates these values.

If you have any questions at all about academic integrity in general or about specific issues, contact any faculty member and we can discuss your questions. For more information, please see:

USask: Guidelines for Academic Conduct – www.usask.ca/university_secretary/council/reports_forms/reports/guide_conduct.php.

U of R: Academic Misconduct – <https://www.uregina.ca/president/executive-team/ed-governance-univ-secretary/student-appeals/student-behaviour.html>

JSGS GRADE DESCRIPTIONS

85+ excellent

A superior performance with consistent strong evidence of:

- a comprehensive, incisive grasp of the subject matter;
- an ability to make insightful critical evaluation of the material given;
- an exceptional capacity for original, creative and/or logical thinking;
- an excellent ability to organize, to analyze, to synthesize, to integrate ideas, and to express thoughts fluently; and
- an excellent ability to apply theories to real-world problems and intersect with related disciplines.

80-85 very good

An excellent performance with strong evidence of:

- a comprehensive grasp of the subject matter;
- an ability to make sound critical evaluation of the material given;
- a very good capacity for original, creative and/or logical thinking;
- an excellent ability to organize, to analyze, to synthesize, to integrate ideas, and to express thoughts fluently; and
- a strong ability to apply theories to real-world problems and intersect with related disciplines.

75-80 good

A good performance with evidence of:

- a substantial knowledge of the subject matter;
- a good understanding of the relevant issues and a good familiarity with the relevant literature and techniques;
- some capacity for original, creative and/or logical thinking;
- a good ability to organize, to analyze, and to examine the subject material in a critical and constructive manner; and
- some ability to apply theories to real-world problems and intersect with related disciplines.

70-75 satisfactory

A generally satisfactory and intellectually adequate performance with evidence of:

- an acceptable basic grasp of the subject material;
- a fair understanding of the relevant issues;
- a general familiarity with the relevant literature and techniques;
- an ability to develop solutions to moderately difficult problems related to the subject material; and
- a moderate ability to examine the material in a critical and analytical manner.