

Land and Water Resources

Diploma



Do what you love... Love what you do... Do what you love... Love what you do... Do what you love... Love what you do... Do what you love...

WORKING WITH THE ENVIRONMENT

Are you looking for a career path where you can make a difference to the environment? Enroll in Olds College's two-year Land and Water Resources diploma program. This diploma offers you a broad base of training in applied environmental sciences that will prepare you for a career in the conservation, reclamation and management of rural land. Acquire the tools you need to manage soil, plant and water resources in agricultural and natural ecosystems. Get involved in environmental stewardship, land reclamation and rural land use planning and help to create a sustainable future.

Program Description

The two-year Land and Water Resources program offers training in environmentally sustainable management of rural land. It involves the study of soil, water, plants, ecosystems and environmental sciences with applications to the workplace. Graduates of this program move on to a variety of careers related to oilfield, agriculture, mining and environmental regulation.

Students can choose from three majors, depending on their career objectives. The three majors share a common core of 1st year subjects with 30% of the second year courses being specialized. Core courses provide a solid basis in soil, water and plant science, agricultural practices, environmental issues, land management, communications and computer use. The 2nd year allows

students to focus on one of the areas of land reclamation, environmental stewardship or rural land use planning.

Graduates of the Land and Water Resources program are eligible for membership in the Alberta Institute of Agrology (AIA), which allows them to earn the Registered Technical Agrologist designation (R.T. Ag.). The AIA is the legally mandated provincial body that governs the activities of professionals in the areas of agriculture and environmental science. The R.T. Ag. designation is a legal requirement for certain field activities including "sign-off" authority for reclamation projects.

What people say about us...

"My studies are teaching me to see the world differently. What I used to see as an empty pasture has become a rich landscape full of geological and environmental possibilities. This past summer I was able to job shadow with a land reclamation company and get some real-life experience. This confirmed my desire to make a difference by taking care of our environment. I love what I'm learning in the classroom about land science. The hands-on approach to education at Olds College is a great fit for my skills and is preparing me for a future full of possibilities."

Jessica Kopp
Land & Water Resources



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COLLEGE**

program description continued...

Environmental Stewardship Major

The Environmental Stewardship major prepares graduates for a wide range of career possibilities in the environmental field with emphasis on soil and water conservation activities at the local, provincial and international levels. Many graduates find work in government related projects or with private consultants whose activities aim to reduce the impact of agricultural and other industrial activities on the health of soil, water and wildlife resources. Specialized courses focus on wildlife and watershed management as well as global development issues.

Land Reclamation Major

This major prepares you for a career in the reclamation industry, repairing land disturbed or contaminated by industrial development. Most of the employment opportunities revolve around the oil and gas sector with some opportunities in mining, forestry and urban industries. Reclamation of disturbed land has

become a big business, especially in Alberta, B.C. and Saskatchewan, as resource companies strive to meet government and industry regulations. Students should recognize that many jobs in this sector require traveling away from your home base on a regular basis.

Rural Land Use Planning Major

This major prepares you to work for government and non-government planning departments or land developers as a land use planning technician. The rapid growth of Alberta's towns and cities has made planning extremely important in order to avoid environmental damage and potential conflicts that arise between residential, commercial, industrial and agricultural development. The major was developed in response to requests from members of the Alberta Association of the Canadian Institute of Planners (AACIP) because employers are presently unable to find qualified technicians. It is the first diploma program in Canada focused on rural land use planning.

Land & Water Resource Diploma

COURSES

- Plant Science
- Soil management
- Water management
- Communications
- Ecology
- Agricultural crop management
- GIS / GPS
- Reclamation and Remediation practices
- Global Sustainability
- Rural Land Use Planning

For a full listing of program courses visit www.oldscollege.ca/programs

Career Opportunities

Many employment opportunities in the private and public sector will be available to you upon graduation. Typical careers related to each of the majors are:

Environmental Stewardship

- Conservation Group Coordinator ➤
- Water Quality Technician ➤
- Agricultural Fieldman ➤
- Research Technician ➤
- Environmental Consultant ➤

Land Reclamation

- Land Reclamation Technician ➤
- Drilling Waste Technician ➤
- Environmental Monitoring Technician ➤
- Remediation Technician ➤
- Environmental Consultant ➤

Rural Land Use Planning

- Land Use Planning Technician ➤
- Land Development Officer ➤
- Agricultural Fieldman ➤
- Environmental Technician ➤



Admission Requirements

Applicants must have:

- a) 50% or better in English Language Arts 30-1 or 30-2
- b) 50% or better in Pure or Applied Math 20
- c) 50% or better in Chemistry 20 and Biology 20 OR Science 30

OR

General Requirements for Alternate Admission Status:

Alternate Admission Status applies if you do not meet the Alberta high school requirements of the program to which you are applying, or if you received your high school education through home based learning. Alternate Admission Status students may be required to meet specific program admission requirements. To apply under this status, you must submit a transcript(s) showing any completed high school and post-secondary courses, a statement in support of your application outlining aspects of your background and experience that might have prepared you for the program. Documents such as a resume, letters of reference from previous educators or employers, and/or a portfolio of related academic/project work must be included with your application.

Transferability

Lakeland College

Graduates from the Environmental Stewardship or Land Reclamation majors of the Land and Water Resources program are eligible to transfer into the "Bachelor of Applied Science – Environmental Management Degree" being offered at Lakeland College. This post-diploma program involves 8 months of classroom learning and an 8 month field placement. It was developed in collaboration with Olds College to further education in basic sciences, environmental monitoring, land reclamation and business management. For more information contact:

Lakeland College
5707 - 47 Avenue West
Vermilion, Alberta, T9X 1K5
Phone 1-800-661-6490 or (780) 853-8589
Fax (780) 853-8704.
E-mail: allen.verbeek@lakelandcollege

Olds College/University Transfer Information

University of Alberta

Graduates of the Land and Water Resources program are eligible for a modified 2 + 2 block transfer to the Faculty of Agricultural, Life and Environmental Sciences

at the University of Alberta. Transfer arrangements apply to the BSc. in Environmental and Conservation Sciences. Graduates of this degree program qualify for membership in the Alberta Institute of Agrology with a "Professional Agrologist" (P. Ag.) designation.

University of Lethbridge

Graduates of the Land & Water Resources program are eligible for entry into the third year of the Post-Diploma BSc. in Environmental Science program at the University of Lethbridge. Completion of the degree normally requires 2 years of study. Graduates of this degree program qualify for membership in the Alberta Institute of Agrology with a "Professional Agrologist" (P. Ag.) designation.

Olds College leads real-life, hands-on education in Canada. We help you explore your passion.



Business
Fashion
Horticulture
Animal Sciences
Land & Environment
Trades & Technology
Agriculture



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Email us: info@oldscollege.ca Visit our website: www.oldscollege.ca Write us: Student Recruitment, Olds College, 4500 - 50th Street, Olds, Alberta, Canada T4H1R6