





From Coast to Coast

Canadians are becoming increasingly aware of the connections between natural resource development and our environment, society and economy and there is much interest in the oil sands. Inside Education strongly believes teachers wish to present *balanced* learning in the classrooms. This is especially the case with respect to topics like the oil sands that can be controversial

Oil sands topics arise throughout the curriculum in every province and territory, and in all areas of study from social studies to science, to careers education.

We made the decision to expand our audience for this program, inviting classroom teachers from across Canada. By providing teachers from across Canada insight into an important *Canadian* resource, we believe the promotion of balanced energy literacy can be fostered across the country.

The feedback and enthusiasm from the 20 participating teachers from outside Alberta absolutely proves this to be true!

"My eyes, mind and person have been opened and inspired. I will be a better-informed Canadian thanks to this, and am certain, a better teacher."

Morgan Dilts, Jaffray Junior Secondary Elementary School, Jaffray, BC



The Participants

The 40 participants represent a group of truly outstanding educators dedicated to growing professionally and personally and sharing their experiences with the students with whom they work with everyday.

Our participants were chosen to represent a wide range of grades, subject areas, years of teaching experience and geographic diversity.

Most importantly, all of these teachers pledged their commitment to bringing current, accurate and meaningful energy education back to their students.

We were overwhelmed to have received over **186 applications** from teachers across Canada. We believe this is a testament to the importance and demand for this type of professional development education programming. The following quotes indicate the value it brings to the classroom.

"My current understanding and knowledge of the oil sands has primarily been based on the negative media images and reports that have been on television and the radio. I would like to believe that there is a more positive story to be told about this technology that I could learn about and share with those around me."

Application from Vanessa Zacharias from Morden, Manitoba



The Participants

Jaclyn Schmitz, Nellie McClung Elementary Michelle Anderson-Draper, Abbott School Jennifer McCallum, Chaparral School Ivor Low, Princeton School Kristine Demers, Belvedere Parkway Elementary Susan Giesbrecht, Roland Michener Secondary School Jessica Vossebelt, Calvin Christian School Travis Cummings, St Timothy's Junior and Senior High Alex Lambert, Ecole HJ Cody School Morgan Laird, Bentley School Bill Turnham, Bellerose Composite High School Gregor Campbell, St. Margaret's School Vanessa Zacharias, Morden Collegiate Institute Michelle Cleary-Haire, Ascension Collegiate Tracy Webb, Horton High School Gerald Baron, Chief Jimmy Bruneau School Taina Kanerva, RH King Academy Kathryn Scott, W.A. Porter Collegiate Institutes Nadine Demuy, École Secondaire des Hauts-Sommets

Joanne Tremblay, WP Sandin High School

Erica Vanden Pol, Fort McMurray Christian School Tanya McCallum, Forest Lawn High School Jean-Francois Latour, Bezanson School Ronald Vanden Pol, Fort McMurray Christian School Susan Campbell, Hughenden Public School Pauletta Renkema, Pembina Hills Regional School Division Lori Brohman, Old Scona Academic High School Breanne Bodnar, Grande Prairie Catholic School Division Allen Herbst, St. Mary's School Seaghda Mcinnes, St. Francis Xavier High school Sean Holland, St. Margaret's School Morgan Dilts, Jaffray Junior Secondary Elementary School Mary-Ann Fast, Arthur A Leach School Gerald Ford, Corner Brook Regional High David Armstrong, Chester Area Middle School Geoff Buerger, Diamond Jenness Secondary School Krystal-Lee Klimack, École Secondaire Catholique Garneau Diane Boulanger, Peel District School Board Benoit Lorrain, École Secondaire Henri-Dunant Chris Williamson, Major School

Chester, NS

Hay River, NWT Hughenden, AB Slave Lake, AB

Wolfville, NS



Program Overview

The 2012 Canadian Oil Sands Education Program, as with all Inside Education programming, provided a well-rounded discussion of current topics related to natural resources and the environment. The program was designed to examine the oil sands from social, economic and environmental perspectives. This allowed the teachers a unique opportunity to visit the oil sands regions and ask questions of experts to learn more about the challenges and opportunities related to development. Participants

were provided with many tools and resources to engage their students upon returning to the classroom.

Program Goals:

- Introduce the science behind oil sands development
- Explore current oil sands issues, innovations and careers
- Deepen an appreciation for the connections between energy, environment and society
- Recognize the perspectives of, and relationships between, multiple stakeholders in the oil sands region
- Bring current and meaningful energy education to empower students, stewards of today and decision-makers of tomorrow

40 teachers, 6 days, 35 speakers, 8 on-site tours, 6 buses, 1 airplane





Detailed Program

Sunday, July 8

Program Welcome & Introductions

This interactive session introduced teachers to Inside Education, their fellow participants and to the program. This component served to launch discussions about Alberta's oil sands and set the stage for the amazing week to come.

Presenter: Inside Education

Monday, July 9 — Welcome to the Oil Sands

Oil Sands 10

What are oil sands? Where are they found? How do they produce the oil sands resources? This session introduced key background concepts and terminology and prepared the teachers for the exciting journey ahead.

Presenter: Inside Education

Why Oil Sands

Why are oil sands so important to Alberta, Canada and the rest of the world? This session introduced the users and uses of oil sands and highlighted the role this resource plays in both our economy and society.

Presenter: Alberto Benzo, Alberta Energy

The Oil Sands from Above

We gained a unique perspective of the land-use in the boreal region of Alberta. Our charter plane flew from Edmonton to north of Fort McMurray to gain a bird's eye view of some of the area's oil sands mining development.

Welcome to Wood Buffalo

Mayor Melissa Blake welcomed us to the region and shared her insights on the region and its citizens, highlighting how the region is shaped by oil sands development. Russell Thomas, an outdoor enthusiast, long-time resident and passionate community member told us his story of living and working in this dynamic region.

Presenters: Mayor Melissa Blake & Councillor Russell Thomas,
Regional Municipality of Wood Buffalo







Tuesday, July 10

Introduction to Oil Sands Mining

Ken Chapman discussed oil sands development broadly, highlighting local environmental, economic and social issues facing the Wood Buffalo region today, and into the future.

Presenter: Ken Chapman, Oil Sands Developers Group

Oil Sands and Public Education

The teachers continued their immersion in oil sands education with an interpretive visit to the world-famous Oil Sands Discovery Centre.

Hosts: Oil Sands Discovery Centre

Oil Sands Mining Toui

Participants traveled to Syncrude's Mildred Lake oil sands mine site to tour the active mining operation, upgrader, reclamation and bison area. Discussions included an overview of the mining process as well as an opportunity to visit with a variety of individuals working at the mine site.

Hosts: Syncrude Canada

An Evening with Fort McKay First Nations

This event included a traditional dinner at the Fort McKay First Nation Band Hall. Participants had the opportunity to visit with and hear from members of the Fort McKay First Nation Band Council and Elders.

Presenter: Councillor Raymond Powder, Fort McKay First Nation

Wednesday, July 1

Environmental Careers in the Oil Sands

To what extent are wildlife concerns connected to development decision-making? How does a wildlife biologist end up working in oil and gas? Visiting with large mammal wildlife biologist, Amit Saxena, teachers had an opportunity to learn how his work impacts and is impacted by development in Alberta's boreal region.

Presenter: Amit Saxena, Devon Canada







Wednesday, July 1°

Conklin and Area Local Opportunity Centre

Teachers had the opportunity to visit and learn about this collaborative approach between industry, government and the local community. The centre is designed to give local individuals and businesses the information and tools necessary to provide services to the large industries in the region.

Hosts: Conklin Local Opportunity Centre staff

In-Situ Oil Sands Development - SAGE

Teachers discovered the development of oil sands deposits that are too deep underground to mine from the surface. The teachers were divided into two groups with one touring Devon Canada's Jackfish facility, the other visiting Cenovus' Christina Lake operation.

Hosts: Devon Canada & Cenovus

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Living the Life

Participants experienced the lifestyle many workers in the oil sands experience regularly — camp life. We stayed overnight at Statoil's Leismer Camp.

Thursday, July 12

Oil Sands in the Boreal — Forests and Wildlife

This combined presentation and field-based tour introduced participants to the Oil Sands Leadership Initiative (OSLI) and one of their major field projects, the Faster Forests program. Participants visited a forest reclamation project and learned about Statoil Canada's awardwinning "Scat Dog" research project.

Tour Host: Terry Forkheim, Statoil Canada; Jonah Keim, Matrix Solutions







Friday, July

Oil Sands and the Environment — Environmental Panel Discussion

The teachers visited with three of Canada's leading environmental organizations whose work involves the oil sands. Taking a micro to macro approach, issues related to water, climate change and development in general were discussed through presentations and a panel Q & A with all three experts.

Panelists: Dr. Rob Powell, World Wildlife Fund; Julia Ko, WaterMatters;

Marc Huot. The Pembina Institute

Oil Sands Environmental Policy and Future

We got an inside look into the environmental policies and regulations surrounding oil sands development and also learned what is the expected future of these policies.

Presenter: Beverley Yee, Alberta Environment and Sustainable Resource Development

Oil Sands Science, Technologies, Research and Futures

Participants were divided into three groups to find about the myriad of oil sands-related research projects being undertaken by industry, government and the academic community. Tour Hosts: Natural Resources Canada – CanMET Energy Laboratories; University of Alberta – Faculty of Engineering; Syncrude Canada

Saturday, July 14

Oil Sands and Energy Literacy

Through a series of presentations and workshops, teachers began to synthesize the vast information gained over the past five days and working on what sources and services might they access to implement energy — and specifically oil sands topics — in their teaching.

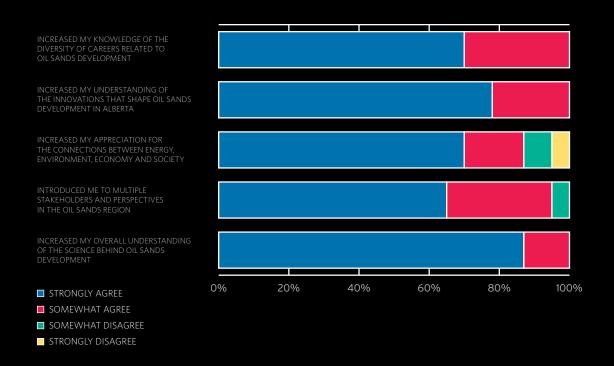
Alberta Environment and Sustainable Resource Development introduced teachers to their Oil Sands Information Portal and Inside Education shared their full complement of programming and resources. Finally, the group took part in a fun workshop that gave practical ideas of how to incorporate all their learning back in their classrooms.

Program Evaluation

We continually evaluate and improve our education programming. For this program, we conducted a formal survey following the program in addition to the anecdotal feedback we receive in the form of testimonials during the program itself. The exemplary results demonstrate success in achieving the program's goals, the lasting impact of the program and the value of this and future professional development programs.

Question 1:

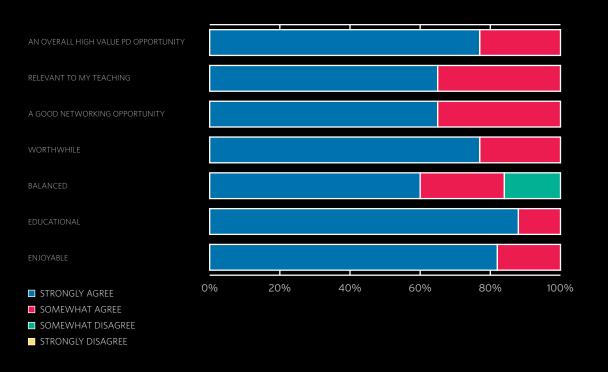
Program Goals - My participation in the Oil Sands Education Program...



"I was able to access things I would never be able to as simply a member of the public, or even a teacher. It was good to learn that inside the industry there are some good people, with good intentions, doing good work. That gives me hope."

Kathryn Scott, W.A. Porter Collegiate Institutes, Toronto, ON

Question 2: In my opinion the 2012 Canadian Oil Sands Education Program was...



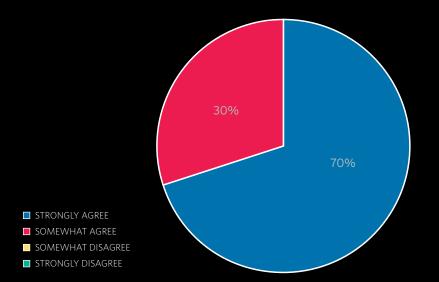
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Future Impact

The experiences gained by the 40 educators participating in the 2012 Canadian Oil Sands Education Program will extend well beyond the program itself. Upon the completion of the program the teachers have experiences, resources, networks and tools to become energy education leaders in their schools and communities and enhance discussions about oil sands development across their sphere of influence.

Inside Education will be following up with teachers in six months to discover how the experience has shaped their teaching during the 2012-2013 school year.

Question 3: This experience will help me to provide informative, accurate and high quality learning experiences for my students.

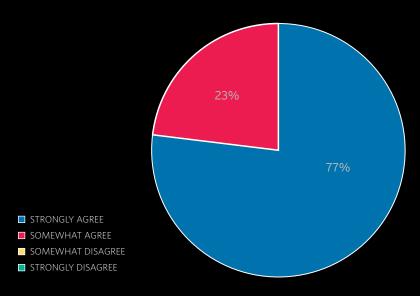


This has opened my eyes in ways I never knew. The various stakeholders we have met have given us a well-rounded picture of an industry I now realize I knew nothing about. Every Canadian should have this experience.

Taina Kanerva, RH King Academy, Toronto, ON

Question 4:

This experience introduced me to resources that will help me explore energy topics with my students.



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The teachers will share what they learned with over 4500 students from across Canada.

Classroom Goals

Inside Education and the participants of our professional development programs can see the ongoing connections and benefits of this type of education throughout the school year. Below are some of the goals outlined by participants during the final day education workshop. With these goals in mind, Inside Education is confident that the 2012 Canadian Oil Sands Education Program will have lasting impacts and will influence many generations of young Canadians.

"Share this learning with my colleagues by acting as a facilitator and leader in my school and community"

"Approach this and other natural resource & environment topics from multiple perspectives"

'Teach the value of collaboration and having an open $\operatorname{\mathsf{mind}}'$

"Include local connections and help my students become more aware and informed about natural resources and the environment in our communities"

"Share the diversity of opportunities available in Alberta, bringing awareness of jobs and careers in the oil sands"

In the News

Learn more about the experiences and goals of some the teachers on this program in articles from their local communities at www.insideeducation.ca/in_the_news

Thank You

Program Partners

Inside Education appreciates the time and support of our partners who came together to make this program a success. These relationships allow us to offer a truly valuable professional learning experience for teachers. Thank you to all of the organizations that provided expert speakers, site tours and resources for the 2012 Canadian Oil Sands Education Program.

We'd like to give a special thank you to the partners who provided the financial support that made this program possible:

























Summary

Inside Education is proud of the many successes of the 2012 Canadian Oil Sands Education Program.

Inside Education has a 27-year commitment to providing exceptional natural resource and environment education for students and teachers. Professional development is an important component of the work we do providing dynamic opportunities and experiences for teachers to expand their understanding of critical topics that shape both the environmental and education landscape.

Programs like the 2012 Canadian Oil Sands Education Program are one of the many ways Inside Education works towards advancing our vision of a future of engaged stewards who think critically about our environment and natural resources, and their complex relationship to our economy and society.

For more information on our Professional Development programs, please contact:

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"From science to careers and all of the processes in between I have learned a ton and will certainly be bringing forward a balanced approach to my staff and students."

Bill Turnham, Bellerose Composite High School, St. Albert, AB

Being able to see the oil operations, meet and speak with various stakeholders

 and be embraced with the culture that comes along with
 has really left me with something to bring back to my students.

Alex Lambert, Ecole HJ Cody School, Sylvan Lake, AB







