

## TSM Performance by Company

### Syncrude Canada Ltd.



Syncrude is one of the largest operators in Canada's oil sands industry, with over 50 years of responsible operations and ongoing innovation. Based in Fort McMurray, Alberta, and supported by a large research and development facility in Edmonton, Syncrude is known for pioneering many of the technologies used in the industry today.

Over the last few years, Syncrude has achieved major milestones in its sustainability and environmental performance. The startup of a \$1.6 billion sulphur scrubbing project in 2014 has helped reduce sulphur dioxide emissions by 60% from 2005 levels. Another \$3 billion has been invested in tailings reclamation projects, including the startup of a major centrifugation plant in 2015, which actually spins the water out of tailings. The resulting clay material is then incorporated into land remediation activities. To date, the company has permanently reclaimed over 3,500 hectares of former open-pit mining areas and co-manages a herd of wood bison with the neighbouring Fort McKay First Nation.

Syncrude is a recognized leader in Aboriginal relations. The company is one of the largest industrial employers of Aboriginal people in Canada and has spent a cumulative \$2.5 billion with local Aboriginal companies.

Syncrude produces a high-quality light, low sulphur crude oil, which is used by refineries across North America to produce products needed by society, including automobile and jet fuel. Cumulative production now exceeds 2.4 billion barrels. Through its operations, Syncrude annually contributes more than \$6 billion to Canada's economy through the payment of wages, royalties and taxes, and through procurement of goods and services.

Syncrude's commitment to excellence in safety, health and environmental performance and its leadership in community relations have been strengthened by its participation in the TSM program. The company internally verified its performance for 2015 and the following is a summary of the results:

- Level A ratings were achieved in all areas of tailings management. Syncrude's focus includes regular updates to its operation, maintenance and surveillance (OMS) manuals for all tailings facilities. The company also monitors the integrity of all dams on its site, holds external geotechnical reviews, and ensures emergency plans are in place to respond to incidents involving these facilities.



*Syncrude's Sandhill Fen watershed research project was built on a foundation of reclaimed oil sands tailings in a 54-hectare section of a former open pit mine. It was revegetated in 2012 with more than 40 types of native plants. An additional 80 types of native plants are growing without having been planted.*

- Syncrude's energy and GHG emissions management and reporting systems are fully implemented and effectively integrated into its operations, resulting in Level AAA ratings for these indicators. However, targets for 2015 were not met. This was the result of reliability issues and lower than anticipated production, which affected overall performance.
- Level AAA ratings were achieved again for Aboriginal and community outreach. An executive and management level group oversees the strategic plan of Syncrude's Aboriginal engagement, and community of interest (COI) input is sought to drive future performance. In 2015, Syncrude was reaccredited at Gold Level status in the Progressive Aboriginal Relations program of the Canadian Council for Aboriginal Business for the sixth consecutive time. In addition, through a community-oriented philosophy, the company works extensively with regional stakeholders to manage social and environmental effects of oil sands development. This includes numerous multi-party organizations and industry associations that deal with local socio-economic impacts and policy issues.
- Syncrude scored "yes" in all areas of crisis management planning. The company regularly conducts emergency response simulations, including desktop and site-wide simulations, to ensure all personnel are properly trained and tested. Pre-plans exist for all medium- and high-level risks, and approved company spokespeople are identified and trained.
- Level AAA ratings were achieved for biodiversity conservation management. Significant effort continues on returning former mining areas back to nature, including the recent completion of the world's first fen wetland restoration project constructed on a foundation of reclaimed tailings. This project was the recipient of a 2015 Alberta Emerald Award, which recognizes outstanding environmental achievements in the province. The project was also recognized with the TSM Environmental Excellence Award in 2014.
- Syncrude is committed to protecting and promoting the safety and well-being of employees, contractors, communities and the environment. This is evident in the reported results of Level AAA ratings across four of the five safety and health indicators, with Syncrude's safety performance in 2015 among its best ever.

🔗 For more information, please visit: [www.syncrude.ca](http://www.syncrude.ca)



2015 TSM Results

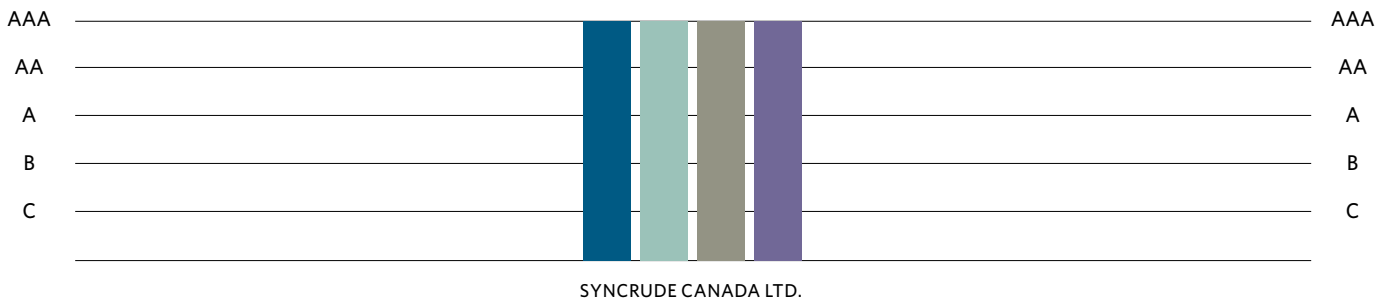
Syncrude Canada Ltd.

Crisis Management Planning Assessment

FACILITY	PREPAREDNESS	REVIEW	TRAINING
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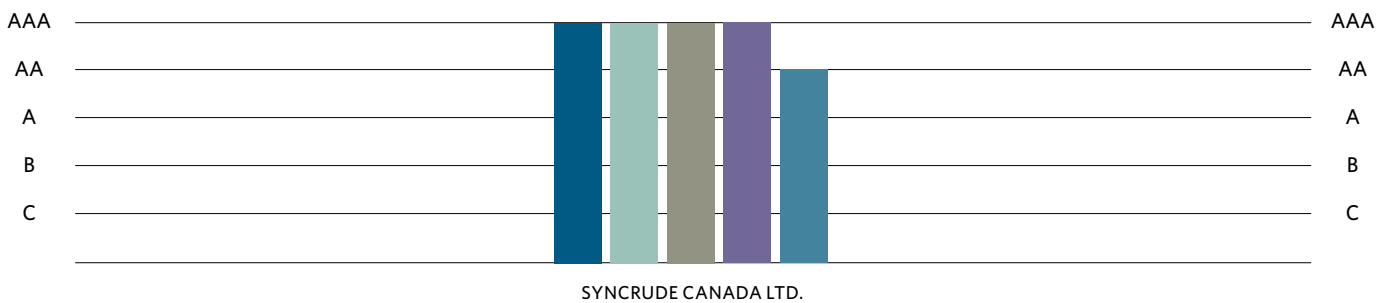
Aboriginal and Community Outreach Assessment

- COMMUNITY OF INTEREST (COI) IDENTIFICATION
- COI RESPONSE MECHANISM
- EFFECTIVE COI ENGAGEMENT AND DIALOGUE
- REPORTING



Safety and Health Assessment

- POLICY, COMMITMENT AND ACCOUNTABILITY
- TRAINING, BEHAVIOUR AND CULTURE
- PLANNING, IMPLEMENTATION AND OPERATION
- MONITORING AND REPORTING
- PERFORMANCE

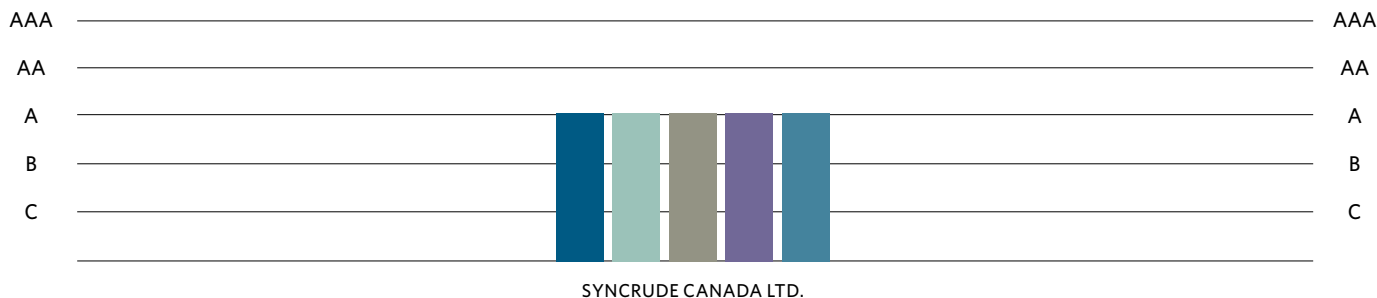


Self-assessed results; last external verification: 2014; next external verification: 2017.



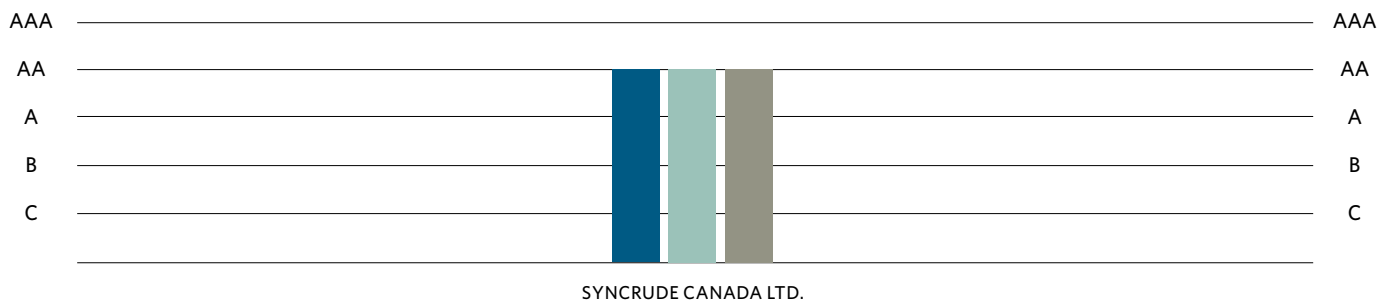
## Tailings Management Assessment

- TAILINGS MANAGEMENT POLICY AND COMMITMENT
- TAILINGS MANAGEMENT SYSTEM
- ASSIGNED ACCOUNTABILITY AND RESPONSIBILITY FOR TAILINGS MANAGEMENT
- ANNUAL TAILINGS MANAGEMENT REVIEW
- OPERATION, MAINTENANCE AND SURVEILLANCE (OMS) MANUAL



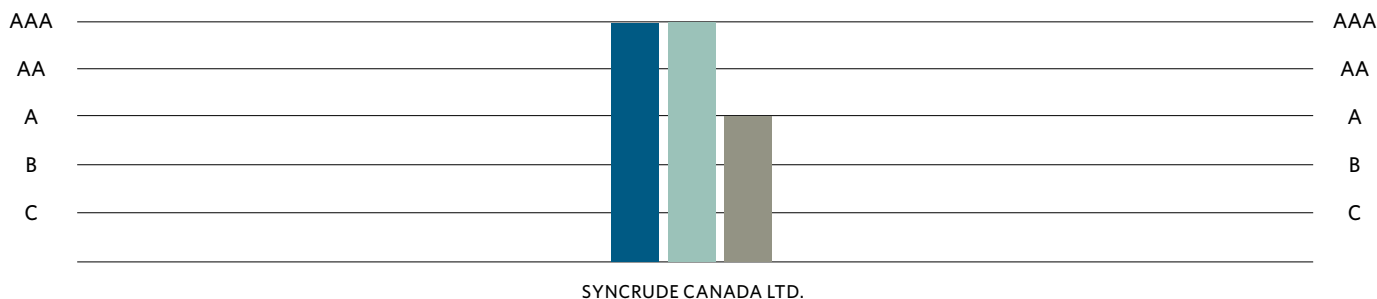
## Biodiversity Conservation Management Assessment

- CORPORATE BIODIVERSITY CONSERVATION POLICY, ACCOUNTABILITY AND COMMUNICATIONS
- FACILITY-LEVEL BIODIVERSITY CONSERVATION PLANNING AND IMPLEMENTATION
- BIODIVERSITY CONSERVATION REPORTING



## Energy Use and GHG Emissions Management Assessment

- ENERGY USE AND GHG EMISSIONS MANAGEMENT SYSTEMS
- ENERGY USE AND GHG EMISSIONS REPORTING SYSTEMS
- ENERGY AND GHG EMISSIONS PERFORMANCE TARGETS



Self-assessed results; last external verification: 2014; next external verification: 2017.

