



# JAMES BAY LITHIUM MINE ENVIRONMENTAL IMPACT ASSESSMENT

## CHAPTER 2: PROJECT CONTEXT AND RATIONALE

JULY 2021 (VERSION 2)





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# 2 PROJECT CONTEXT AND RATIONALE

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## 2.1 HISTORY OF MINING DEVELOPMENT

Spodumene-bearing pegmatite was discovered on the project mining property in 1964 by Jean Cyr, a prospector, who then staked its boundaries in 1966. The project property was acquired by the SDBJ in 1974, which, after doing additional exploratory work, returned the property to Mr. Cyr on June 10, 1986. Little work was done over the 20 years that followed, except for a few geological compilations and some project conceptual analysis.

In April 2008, Lithium One Inc. signed a letter of intent with the SDBJ to explore a group of claims covering the territory known as the “CYR Lithium-bearing Pegmatite Deposit”. The Lithium One drilling campaigns done in 2008 and 2009 confirmed the presence of large pegmatite dykes, numerous swarms several hundred metres wide, one-kilometre long and up to 150 m deep. The finding of this drilling campaign was that a significant pegmatite resource could be found on this portion of the property.

In 2010, Galaxy Resources signed a memorandum of understanding with Lithium One Inc. (TSX-V LI) to acquire up to 70% of the James Bay Lithium project and to form a joint venture for its development. In accordance with this memorandum of understanding, the joint venture made up of Galaxy (the subsidiary of Galaxy Resources) and Lithium One Inc. was created in 2011, in respect of the joint venture mentioned earlier, and then Galaxy immediately acquired 20% of an undivided interest in the James Bay Lithium Mine project.

In April 2012, Galaxy Resources announced that it intended to take over Lithium One Inc. by way of an arranged transaction to acquire all issued and outstanding common shares of Lithium One Inc., the end result being that once the transaction was completed in July 2012, the rights and interests of Lithium One Inc. to the James Bay Lithium Mine project as well as its Sal de Vida lithium potash brine project in Argentina came under the sole control of Galaxy Resources, as wholly owned subsidiaries. Lithium One thus became a wholly owned subsidiary of Galaxy Resources, which resulted in being delisted from the TSX.

In 2011, GLCI issued a project description for the James Bay Lithium Mine project, but this was suspended in 2012 because the price of lithium had fallen, compromising the viability of the project. A few years later, the significant increase in the demand for lithium and promising forecasts made it possible for GLCI to relaunch its project. A new project description was submitted to provincial and federal authorities in October 2017.

**The main activities conducted since the fall of 2017 include:**

- further geological drilling leading to new calculations of the resources present in the deposit;
- sterilization drilling confirming the location of the various infrastructures planned;
- geotechnical drilling to evaluate the bearing capacity of the soil beneath the infrastructures;
- progress on the engineering portion of the project (Project Definition Document);
- determination of basic design criteria for the project, more specifically, the positioning of all infrastructures to the west of the James Bay road to avoid any interference with the highway and the Hydro-Québec power line;
- the production of sectoral studies requiring several field surveys to document the physical, biological and human components of the environment into which the project will be inserted;
- the opening of temporary roads and construction of observation wells in conjunction with the above activities;
- discussion regarding partnerships with local and regional organizations, the SDBJ in particular for the lodging of workers during pre-construction phase as well as the rental of work space and space for the core racks;
- negotiations to reach an agreement with Hydro-Québec for the addition of a power line to serve the future facilities;

- developed strong working relationships with local communities, stakeholders and determined local and regional sources of goods and services.

The knowledge drawn from these activities has helped to better define the project and to consider certain issues regarding the project's receiving environment, including:

- the traditional activities practised by the Cree within the study area of the human environment;
- the geotechnical stability of the future waste rock stockpile in relation to the nature of superficial deposits (clay).

**On the basis of these activities, an Environmental Impact Assessment (EIA) was submitted to the Canadian Environmental Assessment Agency (CEAAg) and the Quebec *Ministère du Développement durable, de l'Environnement et de la Lutte contre les Changements climatiques* (MDDELCC) in October 2018 (WSP, 2018a).**

**After the EIA was filed in 2018, federal and provincial authorities requested additional information. While responses were being prepared for these various requests, project optimization work was also done in consideration of technical and environmental constraints and issues raised during discussions with stakeholders since 2018. Additional studies were also done to respond to requests from various government bodies or to better understand the receiving environment and thereby better define the project and its impact on the environment. This new input to the impact assessment consisted of:**

- additional discussions and consultations with stakeholders;
- an economic assessment of local Cree communities (WSP, 2019a);
- additional sampling work;
  - Cr(VI) soil content (WSP, 2021a);
  - sediment quality (addition of stations and parameters analyzed) (WSP, 2021b);
- an additional vegetation survey and confirmation of the presence of wetlands (WSP, 2021c);
- a determination of mercury levels in fish (WSP, 2019b);
- geotechnical drilling and hydrogeological characterization (fall 2020 and winter 2021) (SNC-Lavalin, 2020; 2021);
- infrastructure design optimization including rehabilitation of the areas affected, reduction of the size of buildings and other industrial site infrastructure and shortening of distances for transporting ore and waste rock.

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## 2.2 MINING RIGHTS AND LAND TITLE

The site of the James Bay Lithium Mine project is located on Québec public lands (public land belonging to Her Majesty in right of the province of Québec). Wholly owned subsidiaries of Galaxy Resources, including the project promoter, GLCI, are the holders of the mining claims currently comprising the mining property of the project.

The land covered by all 54 claims forming the mining property of the project is 2,163.75 ha in area (Map 2-1). These 54 claims will expire between June 12, **2022**, and **June 20, 2023**. Although they can be renewed for an additional two years, an application for a mining lease under section 100 of the Mining Act (R.S.Q. c. M-13.1) will be filed for the operation of a pit mine and concentrator with an annual production capacity of 2,000,000 t of material. This application will be submitted to MERN in **2022**.



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## 2.3 PROJECT RATIONALE

Galaxy Resources Limited is a spodumene producer in Australia in addition to developing a lithium (saline solution) project in Argentina. Thus, the company has very good experience in the construction and operation of this type of mine as well as a good understanding of the global lithium market. Lithium (Li; atomic number 3) is the lightest metal in the periodic table. It is a soft silvery-white metal that belongs to the alkali metals group. Lithium is highly reactive and flammable. It is never found in a free neutral state in nature, but often as a compound in minerals, the most common being spodumene, or as an ion in ocean water, as well as in brines and clays. Its lightness and high reactivity make it particularly suitable for use in the manufacture of batteries as well as in various other industrial processes.

The applications for lithium are highly diverse and include the manufacture of glass and ceramics, lubricants, pharmaceutical polymers and products, air treatment and, recently and very significantly, in the manufacture of lithium-ion batteries. In the past, the bulk of the lithium market was monopolized by glass and ceramics manufacturing. Today, the manufacture of lithium-ion batteries is the largest market for lithium. Hybrid and electric vehicles, portable electronic devices and renewable energy storage systems for homes and businesses are all applications that have grown significantly in recent years.

The available information on the subject all reaches similar conclusions. The production of electric vehicles and mobile devices continues to grow at a rapid rate, and according to many independent organizations this growth is expected to continue. The International Energy Agency, for example, in its annual review<sup>1</sup>, forecast fivefold growth in electric vehicle production compared to the fourth quarter of 2019.

The only project currently authorized in the James Bay territory experienced financial difficulties when it faced major technical and financial problems during the execution of the project, despite the quality of the deposit (nearly 40 Mt of measured and indicated resources at 1.4% LiO<sub>2</sub>). Another project, with a smaller deposit, is under consideration in the area. The company's website mentions 26.8 Mt of resources, indicated at 0.85% LiO<sub>2</sub>. This is a low-grade deposit. The GLCI project deposit offers a high-grade material with very good potential, i.e. around 40 Mt of indicated resources at 1.4% LiO<sub>2</sub>. GLCI has experience in the lithium mining industry and plans to use a simple process similar to that of their existing Mt. Cattlin mine in Australia to reduce technological risks; GLCI is therefore confident that its project can be realised with positive economic returns.

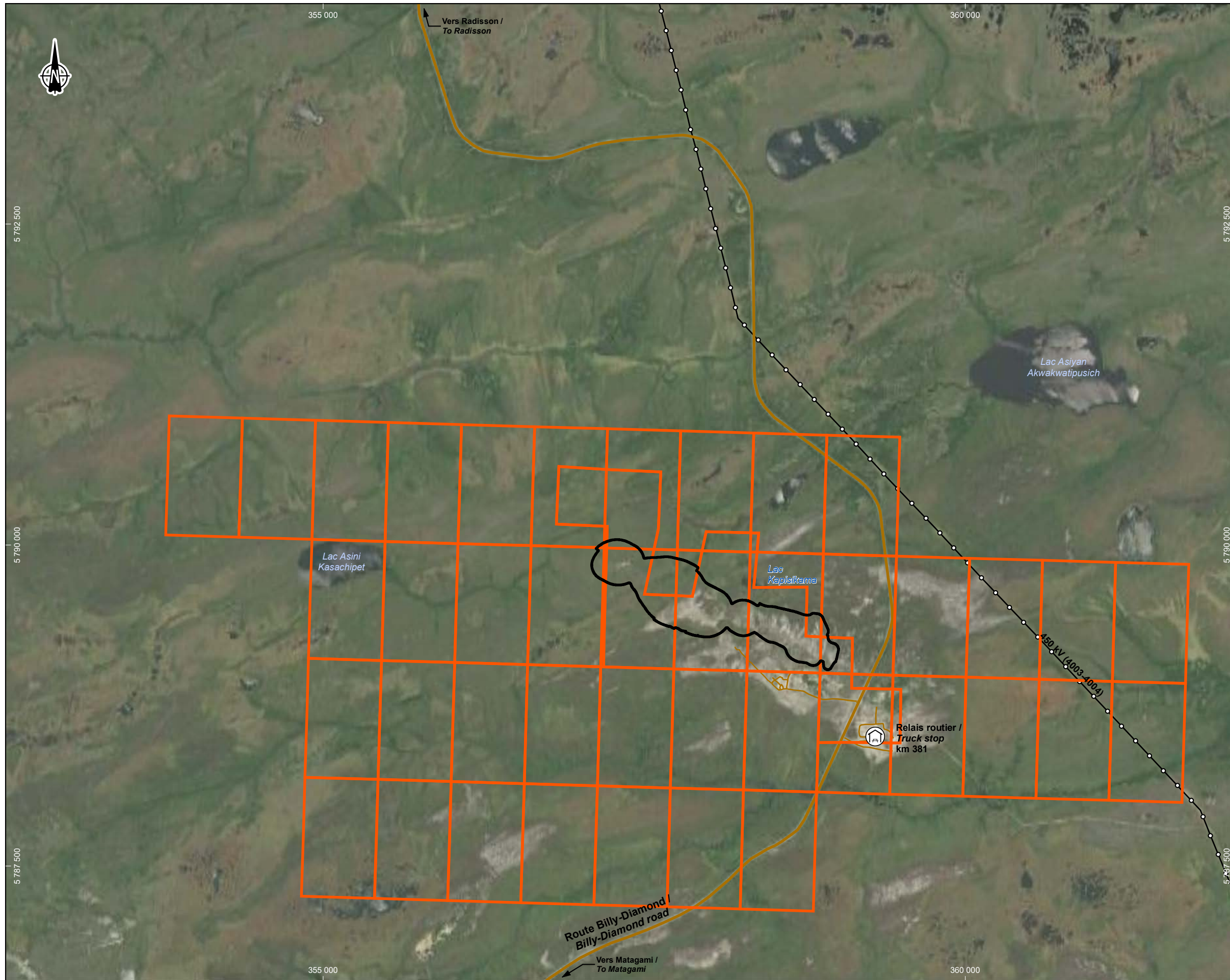
Given GLCI's expertise, the growing demand for lithium in the renewable energy sector and the quality of the deposit at the James Bay Lithium Mine project, the implementation of the project as described in this document is justified. The lithium market supporting the project as well as the various advantages related to the James Bay Lithium Mine location are presented in the following sections.

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1 <https://www.iea.org/reports/global-ev-outlook-2019>.





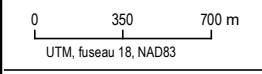


- Contour de la fosse / *Open pit*
- Propriété des claims / *Claim Owner***
- Galaxy
- Infrastructures / *Infrastructure***
- Relais routier / *Truck stop*
- Route principale / *Main road*
- Route d'accès / *Access road*
- Ligne de transport d'énergie / *Transmission line*



**Carte / *Map 2-1***  
**Claims miniers / *Mining Claims***

**Sources :**  
 Orthoimage : Microsoft Bing (ESRI, 2017)  
 Gestim : MRNF Québec, 210315  
 Données du projet / Project data : Galaxy 2020



**Juillet / *July 2021***

Dessin : A. Masson  
 Approbation : C. Martineau  
 201-12362-00\_c2-1\_wspT301\_claim\_210701.mxd





### 2.3.1 LITHIUM MARKET

Global interest in adopting vehicles powered by new energies (electric and hybrid) and the implementation of mass energy storage systems composed of lithium batteries has dramatically increased in recent years. While from 2011 to 2015 there were no major changes in lithium demand and sales of electric vehicles remained insignificant, demand surged toward the end of 2015 in response to commitments from an increasing number of auto manufacturers and the adoption of new government policies (Swiss Resource Capital AG, 2018). In 2016, it was estimated that approximately 190 kt of lithium carbonate equivalent was produced globally and that around 44% of it was used in the manufacture of batteries. Of the 302 kt of LCE consumed globally in 2020, 173 kt LCE went to the battery sector and 129 kt to other industrial uses. Battery demand for lithium is dominated by the electric vehicle (EV) sector, accounting for almost two-thirds of demand in the same year.

EV adoption levels are forecast to pick up sharply in the second half of the 2020s. As scheduled investment in vehicle electrification is further realized and the market builds scale, the cost of EVs at a cell, battery pack and vehicle platform level are expected to reduce significantly. As a result, the price for EVs is forecast to approach parity with internal combustion engine (ICE) vehicles by the mid-2030s. Non-battery demand for lithium will, for the most part, be for the end use of various lithium chemicals, predominantly lithium hydroxide and carbonate. However, some of the lithium consumed by the glass and ceramics sector will be in the form of a mineral concentrate (spodumene or lepidolite). Material specifications tend to differ between applications. For example, spodumene concentrate used to manufacture ceramics is unlikely to be optimal for processing into battery-grade lithium hydroxide. Based on recent growth projections for all uses, it is estimated that lithium demand will increase to almost 1 Mt LCE by 2025 (Table 2-1).

Table 2-1 Lithium Demand Forecast

000t LCE Demand	2020	2021	2022	2023	2024	2025	2030	2035	2040
Total Non-Battery	129	133	144	153	159	164	190	220	256
CAGR% from 2020							3.9	3.6	3.54
Total Battery	173	253	390	512	663	830	2,062	4027	6618
CAGR% from 2020							28.1	23.3	20.0

Source: Benchmark Mineral Intelligence, 2020 in G Mining Services, 2021

There will be an ongoing need for capacity investment for lithium. Specific to the li-ion battery sector, the overall demand for automotive batteries for EVs will experience sustained growth through to 2025, particularly in China. The demand for lithium globally is projected to grow to more than 2.25 Mt LCE by 2030, of which 2.06 Mt will be used to produce batteries, of which 80% will be used for electric vehicles. In 2040, the global demand for lithium could reach nearly 6.60 Mt, of which about 6.25 Mt would be used for the manufacture of batteries. Even if the future adoption of EVs is slower than the base case assumption, lithium demand from EV batteries is still estimated to grow at a compound annual growth rate (CAGR) of >36% between 2020–2025 and by roughly 20% between 2025–2030.

At any one time, there are numerous brownfield and greenfield lithium capacity projects announced and undergoing development. Some of that number will either never come to fruition or else proceed at a faster or slower pace than projected. In the Preliminary Economic Assessment (PEA) prepared for GLCI, using a detailed analysis conducted by Benchmark Mineral Intelligence (BMI) of both producers and projects, a supply forecast was constructed on a per-company basis for the period 2020–2040. Projects are subjectively designated as either “Highly probable”, “Probable” or “Possible”, based on criteria that may affect the likelihood of project success. Secondary supply accounts for future recycling of Li-ion batteries for raw material extraction, however technologies have not yet reached a commercial stage. Figure 2-1 highlights the necessary as-of-yet unplanned production required to meet the demand forecast through to 2040.

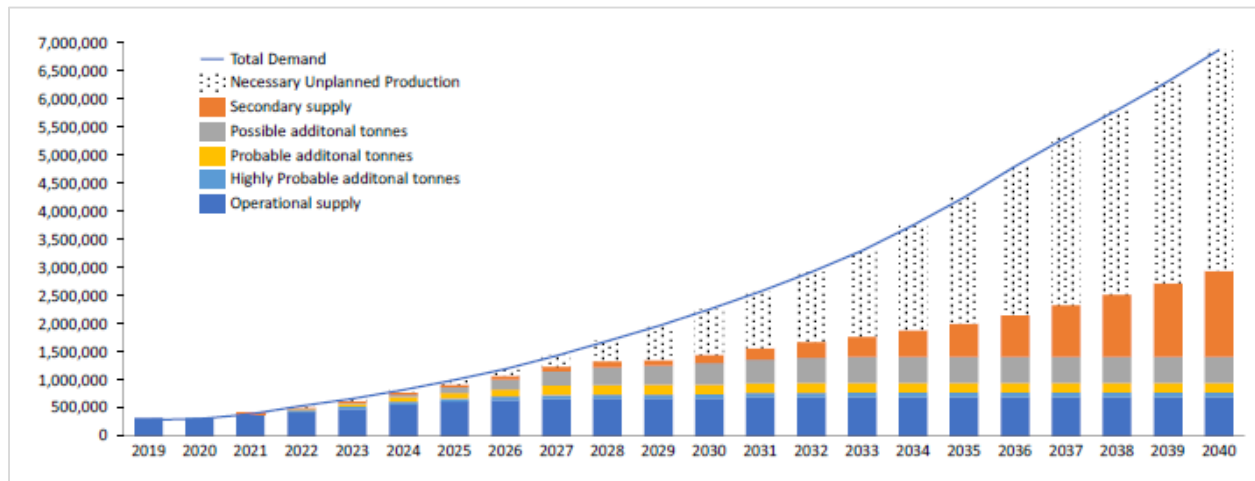


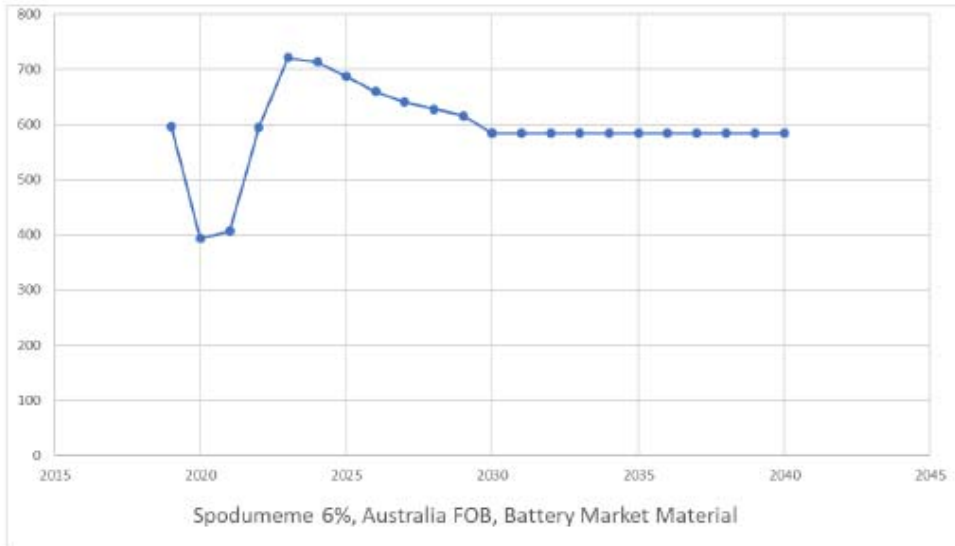
Figure 2-1 Lithium Supply vs Demand (t LCE)

Source: Benchmark Mineral Intelligence, 2020 in G Mining Services, 2021

Relatively high prices for lithium prior to 2018, coupled with increased understanding of lithium technology, and consumer demand in the EV space, have led to increased investment activity in new lithium supply. As a result, based on a pipeline of projects planned to come online and the backlog in existing spodumene inventories, the lithium market is likely to remain in surplus until 2022. In this context, investments in the lithium industry are currently being reduced in order to maintain market equilibrium. In contrast, market forecasts indicate a growing demand. Forecasts for 2023 expect that the lithium market will be in a deficit of around 60,000 t LCE if all “probable” global supply from expected projects comes into operation. This is why, combined with additional challenges at the supply level including the lack of ready-to-start projects, the delays associated with project development and the traditional challenges related to accelerated market entry, it is predicted that the market will fall back into a supply deficit as early as 2023, thus offering a surge in the increase in lithium prices.

For the reasons above, the global average price (US\$/tonne) of LCE peaked in 2018 and fell in 2019 and 2020. According to BMI, the average price of chemical-grade lithium concentrates in 2021 is estimated at USD 405/t (real) free on board in Australia. This price has been used as it is the most recognized reference point available at this time in the market. This price is expected to increase to an annual average of USD 640/t between 2024 and 2028, which aligns with GLCI’s projected first five years of future operation for James Bay Lithium Mine project. BMI predicts that the price will reach a maximum of USD 665/t in 2027, in line with rising chemical prices, before settling out at a long-term average of USD 565/t.





Source: Benchmark Mineral Intelligence, 2020 in G Mining Services, 2021 (2021 update).

The James Bay Lithium Mine project is expected to be commissioned in 2023, amid strong growth in lithium markets. In addition, sustaining costs (including operating costs, royalties, depreciation of capital expenditures, etc.) should be in the lower half of the price curve. Combined with market expectations for lithium prices, the above market conditions justify the economic rationale for the project.

### 2.3.2 PROJECT RECEIVING ENVIRONMENT

#### Ore Extraction and Concentrate Production

In regard to the environment into which the project will be inserted, the mine site is located in an area little disturbed by human activity, covered mainly by peatland, a typical vegetation of the James Bay region. One watercourse is present on the northern border of the site; a second is located in the south; and a small boggy lake is found in the centre. With the exception of a truck stop 500 m southeast of the pit, no permanent or temporary dwellings are located within a radius 8 km of the projected facilities. Furthermore, the study area is used by the Cree for their traditional activities, although usage dropped following forest fires in 2005, 2009 and 2013.

From a socioeconomic standpoint, the James Bay area offers a significant pool of labour potential for GLCI. Furthermore, the company **has already spoken** with the James Bay School Board **about its training programs for the mining industry**. Attractive employment prospects will be available to qualified people, not only at the James Bay Lithium Mine, but also in other future similar projects in the region.

The proposed project enjoys a very positive context, the following elements weighing in favour of its completion:

- the growing **global** demand for raw lithium;
- promising market forecasts for lithium chemical products for the battery manufacturing sector (including lithium carbonate and lithium hydroxide), supported by various government policies around the world as well as the new direction being taken by automobile manufacturers;
- the quality and size of the deposit, facilitating the extraction and concentration of material (low overburden and impurities), in addition to significant potential for expansion;
- the presence of hydroelectric facilities nearby, offering an accessible, reliable **and renewable** source of energy;

- the similarity of the James Bay deposit with that of Mt. Cattlin in Australia, making possible transfer of expertise for process development.

In addition, the project offers several advantages from an environmental and socioeconomic standpoint:

- a supply of power for the processing plant from a renewable source (hydroelectricity);
- a contribution to reducing global greenhouse gas (GHG) emissions through the processing of lithium, a raw material in the manufacture of lithium-ion batteries for electric vehicles;
- onsite primary **processing** to concentrate, a high-value-added product;
- the proximity of road transport infrastructure for the export of concentrate;
- the creation of well-paying jobs;
- significant economic impacts for Québec, especially the Nord-du-Québec administrative region.

### Concentrate Processing

The project is an upstream mine. GLCI is not considering onsite processing of the spodumene to produce hydroxide or carbonate. The downstream conversation of the spodumene will occur at an (currently unknown), offsite location. The receiving environment where the ore will be mined is, moreover, inadequate for processing concentrate. In making the decision to conduct secondary lithium processing outside of the mining region, consideration was given to the full supply chain all the way through battery and vehicle manufacturers, energy and chemical product supply factors, availability of specialized labour and safety issues. Converting spodumene into lithium chemicals requires large amounts of energy, chemical products and specialized labour.

Major constraints apply to setting up a lithium processing plant in the Eeyou Istchee James Bay territory, which would significantly increase the costs to build and operate it, as well as the environmental risks.

For example, the process requires a regular and substantial power supply, part of which takes the form of natural gas (over 1M GJ/year). Natural gas transported by pipeline is not available in the Eeyou Istchee James Bay territory. Liquefied natural gas (LNG) is available, but at a cost two to three times higher, and requiring cryogenic storage tanks. The same applies to chemical product supply; large quantities would have to be transported and stored in the Eeyou Istchee James Bay territory. In addition to increasing operating expenses, this transportation activity would significantly increase road traffic, greenhouse gas (GHG) emissions and environmental and safety risks. Lastly, the process requires specialized labour that is not available in the Eeyou Istchee James Bay territory.

Given the aforementioned factors, the costs to set up and operate a chemical processing plant in the Eeyou Istchee James Bay territory would be increased on a number of counts, thereby significantly reducing profitability for a project that faces competition on a global level.

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## 2.4 REGULATORY FRAMEWORK

The James Bay Lithium Mine project is in the James Bay agreement territory. The JBNQA was signed in 1975 by the governments of Canada and Québec, the Grand Council of the Crees (GCC) and the Northern Quebec Inuit Association. The JBNQA divides the territory into two zones at the 55th parallel: James Bay and Nunavik. Because of the project's position, legislative provisions associated with the James Bay territory apply. Section 22 of the JBNQA defines the environmental and social protection regime of the Cree people, their societies and communities and their economy in connection with development activities that affect the territory. Schedule 1 of section 22 sets out a list of projects that are automatically subject to environmental assessment.

The territorial regime introduced by the JBNQA is a determining factor governing use of the territory. It divides the territory into Category I, II and III lands. Category I lands are allocated to the Crees for their exclusive use. They may be used for residential, community, commercial, industrial or other purposes. In addition, the Cree have exclusive hunting, fishing and trapping rights there. Category II lands are contiguous with Category I lands. They are part of the Québec public domain. These are lands in which the Cree have exclusive hunting, fishing and trapping rights. Category III lands are all agreement territory lands that are not included in Categories I and II. On these lands, the Cree have the exclusive right to trap fur-bearing animals. Furthermore, certain wildlife species are reserved for their hunting and fishing activities. On these territories, both native and non-native people may engage in hunting and fishing activities. In Category III lands, mining rights belong to the provincial government. The James Bay Lithium Mine project is located on Category III lands.

Section 22 of the JBNQA also defines the process leading to the granting of permits through the agency of the following committees—the evaluation and review committees. The Evaluation Committee, made up of representatives of the Cree nation and federal and provincial authorities, examines the notice of application and prepares guidelines in consultation with the community. The Review Committee (COMEX), made up of representatives of the Cree nation and the provincial government, studies the EIA and recommends whether or not the project should be authorized.

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### **2.4.1 ENVIRONMENTAL ASSESSMENT TRIGGERS**

**The provisions of the Environment Quality Act (EQA) subject the project to an environmental assessment in accordance with provincial directives. The project must, therefore, undergo environmental assessment under the EQA, which was amended in 2018. The project is also subject to an environmental impact assessment by the Impact Assessment Agency of Canada (IAAC, formerly CEAA), which was also revised in 2019.**

**Provincial directives and federal guidelines for completing the James Bay Lithium Mine project impact assessment were, however, received in 2018<sup>2</sup> before the respective regulatory reforms in 2018 and 2019. Consequently, this impact assessment was done based on the directives issued by regulatory authorities and did not take into account recent reforms.**

#### **2.4.1.1 ENVIRONMENT QUALITY ACT**

Opening of the James Bay Lithium Mine is subject to the provincial environmental impact assessment and review procedure, as provided in section 153 of chapter II of the EQA. This chapter deals with the provisions applicable to the James Bay and Northern Québec region. Schedule A of the EQA lists projects that are automatically subject to the assessment and review procedure. The James Bay Lithium Mine project is subject to the procedure because Schedule A lists “all mining developments, including additions to, alterations or modifications of existing mining developments.”

The nature, scope and extent of the environmental impact assessment are defined in the Directive for the project developed by the MDDELCC<sup>2</sup>.

#### **2.4.1.2 JAMES BAY AND NORTHERN QUÉBEC AGREEMENT**

Like the EQA, schedule 1 of section 22 of the JBNQA lists projects that are subject to the assessment process, such as mining projects.

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2 Provincial directive: <https://www.ree.environnement.gouv.qc.ca/dossiers/3214-14-055/3214-14-055-3.pdf>  
Federal guidelines: <https://aeic-iaac.gc.ca/050/documents/p80141/121718E.pdf>



### 2.4.1.3 CANADIAN ENVIRONMENTAL ASSESSMENT ACT

The project is also subject to a federal environmental assessment, as required under section 13 of the *Canadian Environmental Assessment Act* (CEAA) (2012) (S.C. 2012, c. 19, s. 52), because ore production will exceed 3,000 t/day (par. 16[a]) and the capacity of the concentration plant will exceed 4,000 t/day (par. 16[b]) of the *Regulations Designating Physical Activities* (SOR/2012-147). **For the purposes of applying this Act to environmental assessment, the environmental effects that are to be taken into account in relation to an act or thing, a physical activity, a designated project or a project are listed in section 5(1) of the CEAA (2012).**

The nature, scope and extent of the environmental assessment are defined in the guidelines developed by the Canadian Environmental Assessment Agency<sup>3</sup>.

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### 2.4.2 APPLICABLE LAWS AND REGULATIONS

At the conclusion of the EIA analysis, the final design of the project must comply with provincial and federal regulations applicable to construction and mining operations, as well as to planned equipment and infrastructure. This legislation requires various permits and authorizations to be obtained. Applications for authorizations and permits, including detailed plans and specifications for infrastructure and facilities, will be submitted when appropriate, after obtaining general project authorization issued by decree.

The applicable legislation governing the project includes a number of laws, regulations, policies and directives, with the main ones being specified below.

#### 2.4.2.1 PROVINCIAL

– *Environment Quality Act* and associated regulations:

The EQA stipulates that authorization must be obtained for mining projects. Authorization applications **must comply with** regulations in effect and must be submitted under the terms of the EQA. **The main regulations to which the James Bay Lithium Mine project is subject under the EQA include:**

- *Clean Air Regulation;*
- *Regulation respecting the landfilling and incineration of residual materials;*
- *Regulation respecting hazardous materials;*
- *Regulation respecting waste water disposal systems for isolated dwellings;*
- *Protection Policy for Lakeshores, Riverbanks, Littoral Zones and Floodplains;*
- *Water Withdrawal and Protection Regulation;*
- *Regulation respecting the quality of drinking water;*
- *Land Protection and Rehabilitation Regulation;*
- *Politique de protection des sols et de réhabilitation des terrains contaminés [Policy on the protection of soil and rehabilitation of contaminated land];*
- *Regulation respecting pits and quarries;*
- *Regulation respecting industrial depollution attestations.*

– Mining Act.

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3 Provincial directive: <https://www.ree.environnement.gouv.qc.ca/dossiers/3214-14-055/3214-14-055-3.pdf>  
Federal guidelines: <https://aeic-iaac.gc.ca/050/documents/p80141/121718E.pdf>

- Directive 019 on the mining industry.
- Act respecting occupational health and safety.
- **Other applicable provincial laws and regulations:**
  - *Transportation of Dangerous Substances Regulation of the Highway Safety Code;*
  - *Sustainable Forest Development Act;*
  - *Regulation respecting standards of forest management for forests in the domain of the State;*
  - *Act respecting the lands in the domain of the State;*
  - *Petroleum Products Act and its implementing regulation;*
  - *Act respecting threatened or vulnerable species;*
  - *Act respecting the conservation and development of wildlife;*
  - *Regulation respecting wildlife habitats;*
  - *Construction Code and Safety Code for the installation of petroleum equipment, both governed by the Building Act;*
  - *Act respecting explosives and its implementing regulation.*

#### 2.4.2.2 FEDERAL

Other laws should be considered when preparing the impact assessment and obtaining subsequent authorizations. The main ones are as follows:

- *Canadian Environmental Protection Act.*
- *Fisheries Act.*
- **Other applicable federal laws and regulations:**
  - *Navigation Protection Act;*
  - *Species at Risk Act;*
  - *Migratory Birds Convention Act;*
  - *Transportation of Dangerous Goods Act, 1992 and Transportation of Dangerous Goods Regulations;*
  - *Hazardous Products Act;*
  - *Explosives Act.*

#### 2.4.2.3 EYYOU ISTCHEE JAMES BAY REGIONAL GOVERNMENT

The Eeyou Istchee James Bay Regional Government is also involved in the authorization process. **After obtaining** general authorization (**governmental decree**), additional authorization applications will be filed primarily under the following law:

- *James Bay Region Development Act*

GLCI will file applications for authorization and permits for the construction and operation of the project with the Eeyou Istchee James Bay Regional Government, in particular a certificate of authorization and compliance with regional regulations.

