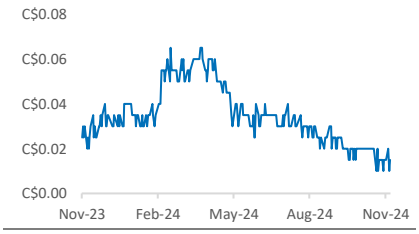
Canada Carbon Inc*

Canadian graphite with vast resource upside potential

Graphite is critical to the green transition given its key role in prevailing lithium-ion battery (LIB) technology in the EV and stationary renewable energy storage markets. It also has other more specialist applications that similarly contribute to a more sustainable economy, including in nuclear and geothermal power generation, while its derivative graphene has potential revolutionary applications in the electronics, aerospace and medical sectors. Yet like many other critical raw materials, global supply of graphite is dominated by China. To safeguard the sustainability of Western world de-carbonisation plans, it is therefore essential that alternative secure supply chains of such critical raw materials are developed. We think this enhances the strategic value of graphite projects in low-risk jurisdictions close to end-use markets. Canada Carbon offers exploration and development leverage to this outlook, it's Asbury and Miller projects – both sites of historic graphite production – hosting high-quality macrocrystalline graphite in a mining-friendly jurisdiction well-positioned to emerge as a graphite supplier to North America's growing EV, nuclear and technology markets. With only a small fraction of the company's overall ground-holdings at each project explored to date, we see considerable scope for resource growth near term, while future technical studies could demonstrate development potential longer term.

- **Exposure to critical transition material:** Canada Carbon offers exploration leveraged exposure to natural graphite, a high-growth market that is rising in prominence given the rapid electrification of the global economy, graphite being the anode material of choice in prevailing LIB technology used in EVs and stationary energy storage. Other high-value, specialist applications in electronics, construction, and nuclear and geothermal power generation further add to graphite's strategic importance, highlighting the importance of this unique material in supporting innovations across various sectors striving for a more sustainable, and efficient, operating model.
- **Strategically located:** Given graphite's importance to the green economic transition, China's domination of supply – the country controls over 70% of natural graphite production and more than 90% of processed battery-grade material – poses clear risks to Western world de-carbonisation goals. China's recent introduction of export controls on certain graphite products only heightens such concerns. Canada Carbon's Asbury and Miller projects are eligible for economic development supports from the provincial government of Quebec, a mining-friendly jurisdiction with the infrastructure and supportive policy to emerge as future strategic supplier of critical raw materials to North America's growing battery and green-tech markets.
- **Significant upside potential on under-explored, past-producing sites:** The obvious place to explore for new resources of any mineral is next to proven production sites, and both Asbury and Miller have seen prior mining for graphite. Canada Carbon has already delineated modest initial resource estimates, and with each considered open both along strike and at depth, and with just a small fraction of identified geophysical targets at both properties explored to date, we see considerable resource growth potential with future drilling. Canada Carbon will also seek to fast-track studies of mine development potential alongside ongoing exploration.
- **Not just about LIBs:** Initial metallurgical testing of both Asbury and Miller flake indicates high carbon purity levels and good crystallinity, properties indicative of potential amenability for use as anode material with downstream processing. Miller flake appears to be of exceptional purity (with very low boron content), raising the possibility that it could be amenable for nuclear applications in modern reactors, which require very high-quality graphite that commands a market premium. Canada Carbon is collaborating with various industry players to further assess this potential.
- **Catalysts:** Further drilling could materially grow resources at both Asbury and Miller, while planned technical studies will set out development parameters. Subject to funding, Canada Carbon thus holds potential to rapidly progress up the value curve.

CCB CN **Mining & Metals**



Source: © Alpha Terminal

Market data

Price (C$)	0.015
12m High (C$)	0.070
12m Low (C$)	0.010
Shares (m)	214.7
Mkt Cap (C$m)	3.2
Mkt Cap (US$m)	2.3

Company summary

Canada Carbon is an exploration and development company focused on advancing its Asbury and Miller natural flake graphite projects in Quebec. Both Asbury and Miller have significant resource upside potential and metallurgical testing to date suggests high-quality flake that would be suitable for a variety of high-tech applications, including as anode material for the fast-growing lithium-ion battery market.

Board and Management

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Non-Exec Director	Greg Lipton
Non-Exec Director	Dr Peiter Barnard
Non-Exec Director	Bruce Coventry
Non-Exec Director	Arran Thorpe

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Investment summary

Diversifying graphite supply chains is critical for the green transition

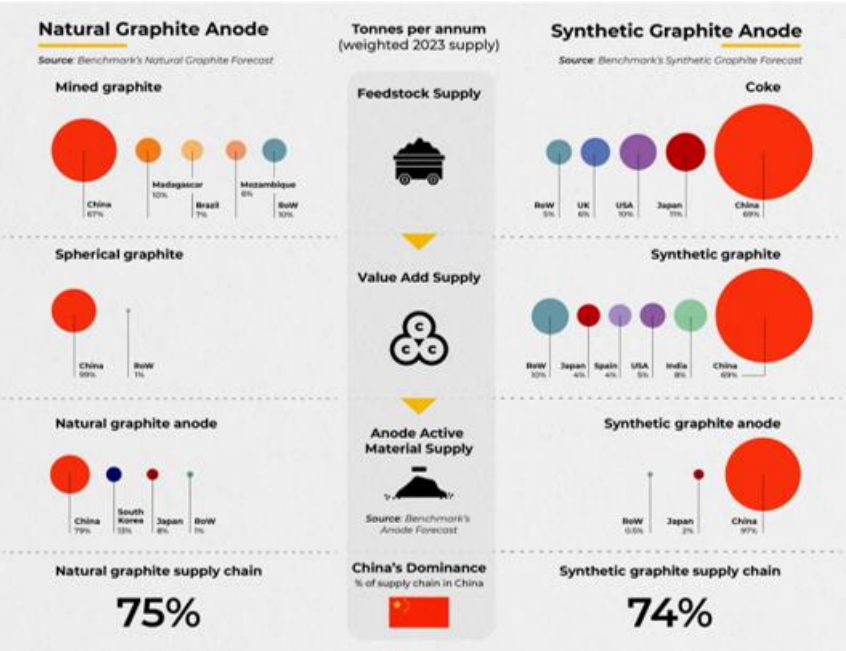
As a vital ingredient in the prevailing LIB technology that powers electric vehicles (EVs) and facilitates storage of energy generated from renewable sources, graphite is a critical material to lessening dependence on fossil fuels and transitioning towards a 'greener' future. Multiple other high-value applications, including in the aerospace, electronics and nuclear power industries, only further underscore graphite's importance to the modern world's economy.

Developing alternative graphite supply chains is critical to advancing the green transition

Against this compelling outlook for demand, the current graphite supply dynamics look far from sustainable. With China dominating the production of both natural and synthetic graphite (over two-thirds of global supply) and of refined graphite anode material (over 90% of world production), the future of LIB and EV manufacturing in North America and Europe is worryingly exposed to potential external disruptions. China's recent move to introduce export restrictions on certain graphite products highlights this issue starkly. Moreover, some of the graphite mining and processing practices followed in China are not compatible with Western views on sustainability and environmental stewardship.

We therefore feel the development of alternative, secure supply chains for both upstream natural flake graphite and downstream processed graphite products in North America and Europe is essential for sustainable growth of many green-tech industries in those jurisdictions.

Figure 1: China currently has tight control of the graphite anode supply chain



Source: Benchmark Minerals Intelligence

Canada holds key to unlocking a North American supply chain

Canada is ideally placed to emerge as the upstream engine of a North American graphite supply chain given its proximity to the key US market and sizeable existing natural graphite resources and exploration prospectivity (particularly in Quebec).

As a long-established mining country, Canada has the infrastructure, technical expertise and research capabilities to expedite development of projects. Moreover, it benefits from a stable political and regulatory environment with supportive policy at both the federal level (e.g. Canada's Critical Mineral Strategy) and provincial level (e.g. Quebec's Development of Critical and Strategic Minerals Plan).

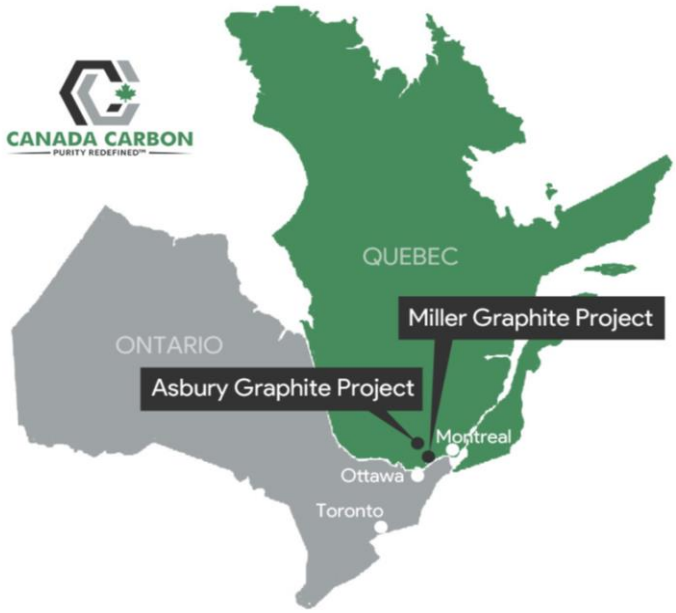
Canada Carbon well positioned to leverage geopolitical advantages

Canda Carbon is well located to participate in the emergence of a secure North American natural graphite supply chain

Canada Carbon is ideally positioned to leverage this geographic advantage and political will as it seeks to advance two past-producing graphite properties in Quebec. Its Asbury and Miller projects are well served by existing road, rail and power infrastructure and have access to both US and international export markets – the Port of Montreal lies just c.100km to the east, and is accessible via the Trans-Canada highway. There is an abundance of skilled labour within the region and both projects are situated in localities that are eligible for economic development support from Quebec's provincial government.

And we feel Canada Carbon is differentiated from other Canadian graphite plays in that its projects hold potential to be developed as future suppliers of natural flake graphite products suitable for a range of high-value end-use applications, in addition to anode material for LIBs (which it could also serve). Its Asbury project hosts high-grade macrocrystalline graphite sought by a variety of wide-margin applications, while its Miller project hosts the only currently known North American deposit of very high-purity, low-contaminant graphite suitable for nuclear applications.

Figure 2: Canada Carbon is advancing graphite projects in southern Quebec



Source: Canada Carbon

Asbury: high-quality graphite with vast resource upside potential

The Asbury project is characterised by its high-quality macrocrystalline graphite, demand for which is growing exponentially from the LIB market and other high-value sectors such as foils, building products and engineered graphite products.

A maiden inferred resource estimate of 4Mt at an average grade of 3% Cg (for 126,000t of contained graphite) was declared earlier this year, derived from data gleaned from drilling of just a small fraction of the overall property package. The

resource is open along strike and at depth, and significant exploration potential also exists across the wider project, most pertinently along a 4km geophysical anomaly that stretches from the currently delineated resource to an area of historic mining (1970s-80s) situated to the southwest. Records indicate that mined material averaged over 6% Cg, suggesting that there may also be grade upside to Asbury with further drilling in addition to tonnage. Indeed, Canada Carbon believes there to be potential for at least 19Mt of mineralised material within this anomaly alone.

Asbury's vast resource upside potential to be further explored

A programme of work – including drilling, subject to availability of funding – is underway to further develop this resource potential, offering much scope for positive exploration news flow over the coming months.

Miller: potential source of globally-scarce nuclear-grade graphite

Miller hosts a globally scarce potential source of exceptionally high-quality graphite that metallurgical test work suggests may be particularly suitable for use in specialist nuclear industry applications. Laboratory and pilot-scale testing to date has produced graphite concentrates that consistently exceeded 95% Cg grades, with potential to upgrade to over 99.99% through further beneficiation.

Miller hosts exceptionally high-purity graphite low in contaminants

Crucially, the purified graphite produced from this testing of Miller concentrate contains lower levels of elemental contaminants (notably boron) than found in commercially available natural and synthetic graphite products currently being assessed for use in pebble-bed nuclear reactor developments in the US (including boron, the most detrimental contaminant for use in nuclear reactors). Canada Carbon has entered strategic collaborations with aerospace and nuclear energy organisations to further assess the potential of Miller graphite for such applications.

And as at Asbury, the Miller project has considerable resource upside potential. Mineralisation is considered open both along strike and down dip from the existing resource model, and multiple geophysical anomalies across the wider project are yet to be drill tested. Indeed, Canada Carbon's drilling campaigns to date have covered less than 2% of its total claim area at Miller.

Experienced management team to drive project progress

Canada Carbon's board has a wealth of experience in the upstream graphite business, downstream graphite markets and mineral exploration.

Chief executive Ellerton Castor was finance director and then chief executive of Ontario Graphite, a Toronto-based private company that owned the past-producing Kearney graphite mine in Ontario. Other board members include Dr Pieter Barnard, a retired president at carbon and graphite group GrafTech International, and Greg Lipton, a professional geoscientist with over 30 years' exploration experience with major international mining companies.

We think this is a strong blend of skills to progress Canada Carbon through exploration into the project development evaluation phase, and also to assess potential future markets for its graphite.

Market comparable valuation considerations

Market comparable analysis is not a perfect tool for valuing graphite equities given flake graphite is not a uniform commodity like most other mineral classes, flake characteristics and properties often differing markedly from one project to the next. However, comparable analysis does at least provide some quantitative context for assessing the relative merits of earlier-stage explorers and developers (E&D) for

whom advanced technical and economic project assessments (a pre-requisite for a more comprehensive valuation) are not yet available.

As with other 'battery commodities', graphite pricing has softened over the past 12-18 months as demand growth for EVs has slowed relative to the extraordinary rates seen over the preceding years. The market valuations of graphite equities have weakened accordingly, particularly amongst E&D stage companies, as can be seen by the relatively low enterprise value per tonne of in-situ graphite resource multiples of the 20 publicly-quoted companies in Figure 3 below.

We see scope for material share price upside on resource expansion and project development studies

At just under US$10/t, Canada Carbon is trading above the peer average market multiple. We think this reflects the high-quality nature of Asbury and Miller flake as indicated by metallurgical testing to date, but also the considerable resource upside potential at each given exploration thus far has merely 'scratched the surface'– at Asbury work to date has focussed on an area that occupies just c.7% of a major geophysical anomaly, while only c.2% of the overall Miller property has been tested.

Were we to assume future drilling delivers a c.10x uplift in overall project resources – not unreasonable given the prospectivity of Asbury in particular, where Canada Carbon suggests there may be at least 19Mt of mineralised material – we see potential for more than six-fold price upside (assuming it trends towards the peer group average multiple). And we believe there may be scope for far greater upside should future assessment verify the premium product potential of graphite from Asbury and Miller over the longer term. We caveat such projections with the warning that there can be no guarantee of drilling success, and that the pace and extent of exploration and evaluation is dependent on availability of funding.

Figure 3: Graphite E&D companies market comparison

Company	Ticker	EV	Country	Project	Resources			EV/resource
		US$m			Mt	% Cg	Cg Mt	US$/t
Black Rock Mining	BKT AU	31	Tanzania	Mahenge	213	7.8%	16.6	1.9
Blencowe Resources	BRES LN	11	Uganda	Orom-Cross	25	6.0%	1.5	7.4
Canada Carbon	CCB CN	2	Canada	Asbury	18	1.3%	0.2	9.8
Falcon Energy Materials	FLCN CN	68	Guinea	Lola	66	3.9%	2.6	26.2
Focus Graphite	FMS CN	3	Canada	Lac Knife	87	11.2%	9.7	0.3
EcoGraf	EGR AU	6	Tanzania	Epanko	291	7.2%	21.0	0.3
Evion Group	EVG AU	6	Madagascar	Maniry	40	6.5%	2.6	2.4
Evolution Energy	EV1 AU	4	Tanzania	Chilalo	67	5.4%	3.7	1.0
Graphite One	GPH CN	68	USA	Graphite Creek	281	5.1%	14.3	4.8
Green Battery Minerals	GEM CN	0	Canada	Berkwood	3	16.7%	0.5	0.6
Greenwing Resources	GW1 AU	6	Madagascar	Graphmada	62	4.5%	2.8	2.1
Lincoln Minerals	LML AU	6	Australia	Kookaburra Gully	13	7.6%	1.0	6.5
Lomiko Metals	LMR CN	3	Canada	La Loutre	82	4.4%	3.6	1.0
Magnis Energy Technologies	MNS AU	36	Tanzania	Nachu	174	5.4%	9.3	3.9
NextSource Materials	NEXT CN	39	Madagascar	Molo	141	6.1%	8.7	4.5
Northern Graphite	NGC CN	24	Canada	Bissett Creek	137	2.8%	3.9	6.1
Nouveau Monde	NOU CN	100	Canada	Matawinie	153	4.3%	6.5	15.3
Talga Group	TLG AU	120	Sweden	Vittangi	71	23.8%	13.3	9.0
Walkabout Resources	WKT AU	63	Tanzania	Lindi	42	10.8%	4.5	14.0
Westwater Resources	WWR US	29	USA	Coosa	158	2.6%	3.9	7.4
Average					**106**	**7.2%**	**6.5**	**6.2**

Source: Company filings and presentations (market values as of 20/11/2024)

Upcoming catalysts

- Further drilling and resource update at Asbury – 2025*
- Prefeasibility study of Asbury – H1 2025*
- CTPAQ public hearing for Miller – Q4 2024
- Resumption of exploration activities at Miller – 2025*

*Subject to availability of adequate funding

Risks

- As an exploration and development stage company, Canada Carbon will require additional funding to progress its projects. The availability, level and pricing of future equity fundraisings will be influenced by prevailing market conditions.
- Canada Carbon is focused solely on graphite, and its market fortunes will therefore be linked to prevailing conditions in the graphite market specifically and the LIB/EV sectors more generally.
- While both Asbury and Miller hold significant prospectivity, there can be no guarantee that future exploration will materially add to current resources, which in our view require greater critical mass before either project can be considered a commercial development target.

Graphite market overview

Graphite essentials

Graphite is a crystalline form of carbon that forms through geological processes (natural graphite) but which can also be manufactured through high-temperature processing of carbon-based materials such as petroleum coke or coal tar pitch (synthetic graphite). While chemically identical to diamond, graphite has structural differences that make it softer and give it distinct properties including excellent electrical and thermal conductivity, high resistance to chemical erosion and lubricity.

These distinctive properties give graphite many applications. Its heat resistance and strength at high temperatures make it crucial in steelmaking and foundries, where it is used in refractories and as an additive to enhance strength. Its conductive properties see it used as an anode material in batteries, notably lithium-ion batteries (LIBs), as well as in electrical contacts and components. Graphite's moderating and thermal conductivity properties meanwhile lend it for use in nuclear reactors and, specifically for expandable graphite, as a fire resistance additive in construction materials and as heat dissipating foils in electronic devises.

EVs and renewable energy storage have emerged as the key drivers of graphite demand growth

The global graphite market is c.US$25bn and has an annual volume of just over 4Mt, of which c.60% is synthetic and c.40% natural. Historically, steelmaking and related metallurgical applications have been the main drivers of demand, and these traditional industrial markets still account for around two-thirds of global consumption. However, the EV and renewable energy storage sectors have emerged as by far the fastest-growing demand centres over recent years, graphite being the dominant anode material in prevailing LIB technology.

Synthetic versus natural

Synthetic graphite is manufactured through the thermal treatment of amorphous carbon materials, usually petroleum coke or coal tar pitch. It can be subdivided into primary material for direct application, and secondary material that requires further manufacturing (e.g. scrap salvaged from spent synthetic graphite electrodes used in the manufacture of steel).

The very high temperatures required to manufacture synthetic graphite (up to 3,000°C) make it an environmentally questionable process that is also expensive – as an anode material for LIBs, primary synthetic graphite can be over twice the input cost relative to using battery-grade natural flake graphite (depending on availability of secondary supply). However, as a manufactured product it can be tailored to customer specification – with minimal impurities and consistency of quality – important qualities for certain applications such as electrodes and LIB anodes.

As the name suggests, natural graphite is crystalline carbon formed through natural processes in the earth's crust. In normal times, the cost of mining and processing natural graphite into anode-grade material is generally lower relative to the cost of manufacturing synthetic graphite, but as a naturally occurring material its properties can vary from one deposit to the next (and within deposit). Natural graphite can occur as flake (the dominant source of mined natural graphite), vein or amorphous. A majority of the world's current supply of flake graphite (around two-thirds) is mined in China, but Africa is emerging as an important alternative source while there is also some supply out of the Americas.

End-use applications

The major application of **synthetic graphite** is as an electrode material in electric arc furnaces in steelmaking, though special grades of synthetic graphite are also used by the nuclear industry (for neutron moderators within reactors), by the battery industry (as an anode material in rechargeable LIBs) and in the manufacturing of certain engineered products (e.g. carbon-fibre reinforced plastics and heat-resistant composites). Secondary synthetic graphite from unusable electrode material is often used as a re-carburiser (a carbon hardening additive in steel production), a market in which it competes with natural graphite.

LIB manufacturing is the key end-use market, but other high-value applications are also important

Traditionally the main markets for **natural graphite** have been iron and steel industry applications (specifically refractories and foundries), followed by friction products (brake pads, carbon brushes) and lubricants. But in recent years flake graphite has been taking an increasing share of the anode market in the manufacturing of LIBs, displacing synthetic graphite. Other specialist applications such as fire retardants, graphite foils, highly-engineered gaskets and components of nuclear reactors are other notable markets (though the very high purity graphite required by nuclear applications is very rare in nature). The flake form of natural graphite has the widest array of market applications of all graphite products.

Downstream beneficiation to battery anode material feedstock

Run-of-mine (RoM) flake concentrate (graphite concentrated from mined ore, typically through conventional crushing, grinding and floatation processes) can be marketed directly to certain end-users, such as those in the generally lower-value traditional metallurgical markets. However, for use in the higher-value technology markets such as battery anodes, further beneficiation is required to optimize the desired properties. Downstream beneficiation is typically undertaken by specialist processors (dominated by China currently) rather than by the primary miners.

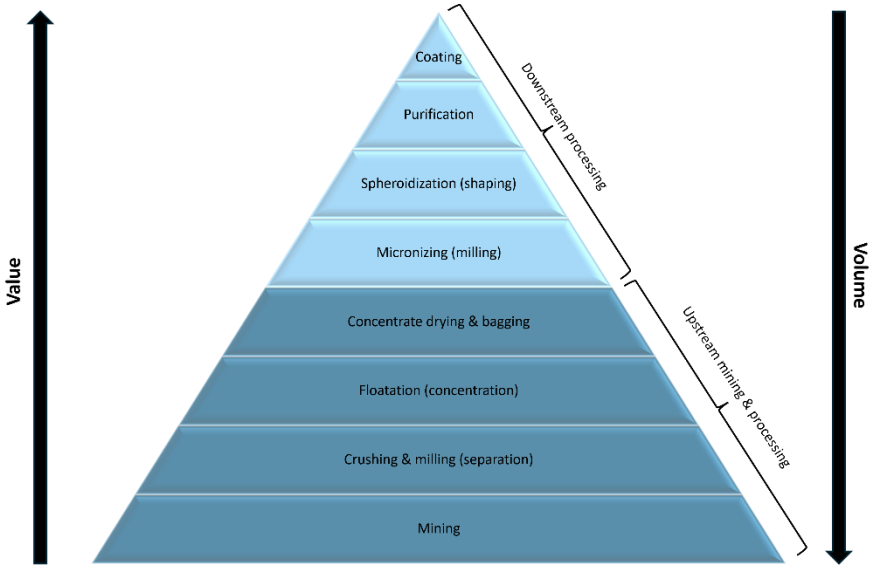
- **Micronizing/Milling:** This is the process of reducing RoM concentrate flakes to a uniform size fraction suitable for the specific end-use application – battery anode manufacturers typically seek small-diameter graphite products, as this enhances the ability of lithium ions in the electrolyte to diffuse between graphite particles. However, as graphitic carbon purity levels are often higher in large flake, larger sizes can be a more economically viable feedstock (micronizing being less costly than the energy-intensive process of purifying – see below), though large flakes can also have other high-value applications.
- **Spheroidization:** For use as battery-anode material, natural graphite needs to be not only high purity but also spherical in shape – round particles pack more efficiently, enhancing the conductivity-to-volume ratio and thus energy capacity. Spheroidization is the mechanical process of shaping flat graphite flakes into spheroids. As this process results in flake wastage (yields in China – the dominant commercial-scale producer of spherical graphite from natural feedstock – are typically no higher than 40%), spherical milling is usually undertaken prior to purification to minimize purification costs.
- **Purification:** Certain graphite applications, notably battery anode use, require very high purity levels, typically over 99.95% carbon-as-graphite (Cg) in anodes. Purifying graphite concentrate is generally the single largest cost component in the production of battery-grade graphite from natural sources, and can be undertaken using either chemical or thermal beneficiation processes. Chemical purification involves acid or alkaline leaching of the graphite to remove impurities and is the main purification method used in China. Chemical purification is typically lower-cost than thermal purification but can have adverse environmental impacts, depending on the chemistry used. Thermal

purification involves exposing the graphite to extreme high temperatures (up to 3,000°C) in the presence of halogen gases to volatilise impurities, thereby enabling them to be removed. This is energy intensive and thus typically more costly than chemical purification.

- **Coating:** The final step for preparing spherical graphite for anode use is the application of a fine carbon coating, which reduces degradation of the particle and therefore enhances the life of the resultant battery. Coating is a skilled process requiring technology that is currently dominated by the major battery-manufacturing countries (China, Japan and South Korea). It is the most value-additive step in the processing of natural graphite to anode-grade material.

Beneficiation adds significant value, but the cost of downstream treatment varies with the quality of RoM flake feedstock (e.g. size and starting carbon purity will greatly influence the amount and cost of purification required) and geography (e.g. access to low-cost power and skilled workforce). This limits the relevance of comparing flake graphite projects by grade and/or projected RoM costs, as the upstream production costs can be dwarfed by the costs of downstream beneficiation, control of which is crucial to capturing the value uplift.

Figure 4: Natural flake graphite value-add pyramid



Source: ARC

Not just about LIBs: other high-value applications

Aside from raw material for anode production for LIBs, graphite has several other high-value end-use applications, including:

- as a stabilising material in **nuclear reactors**, specifically in gas-cooled and pebble-bed reactors, which use very high-purity graphite as a neutron moderator to improving reactor efficiency and safety
- the **electronics** industry – graphite is used in semiconductors and electrodes, graphite foil can be used as a heat dissipating material in electronic devices
- the **aerospace** industry – graphite is a key component in carbon-fibre composites for lightweight, heat-resistant materials

- *expandable* graphite can be used as a fire retardant in **construction materials** given its excellent thermal stability and non-flammable properties, and is used to produce graphite foils (see above)
- industrial **lubricants**

Moreover, graphene – a relatively recently-developed single carbon atom layer derivative of graphite – could have a potentially revolutionary future impact in the electronics, medical and aerospace industries.

Market pricing structure

The graphite market is opaque, with prices for both upstream and downstream products negotiated between supplier and customer on a rolling basis and varying significantly depending on type (natural or synthetic), quality (purity, crystallinity and flake size) and quantity of material and end-use application.

The upstream natural graphite market is effectively two tiered

However, it is fair to say the upstream market for natural graphite is effectively two tiered, with RoM flake concentrates for the traditional metallurgical markets being more commoditised and lower priced compared with flake suitable for the battery and engineered-products markets. Prices paid by these more specialist markets are higher, but at the upstream level are also more variable depending on the individual flake concentrate quality, with larger-flake and high-purity concentrates typically commanding a significant premium.

Beneficiated material – purified spherical graphite (SPG) and coated purified spherical graphite (CSPG) – will attract much higher prices still, and markets for such products are generally more resolute.

Figure 5: Indicative market pricing range for graphite products (last 12 months)

Graphite product	Indicative pricing
Fine flake graphite (anode pre-cursor)	US$450-700/t
Uncoated spherical purified graphite	US$2,000-3,000/t
Coated spherical purified graphite	US$6,000-8,000/t
Coarse flake graphite (incl. expandable)	US$1,000-3,000/t

Source: Company reports and presentations, media reports

Supply: can China's dominance be challenged?

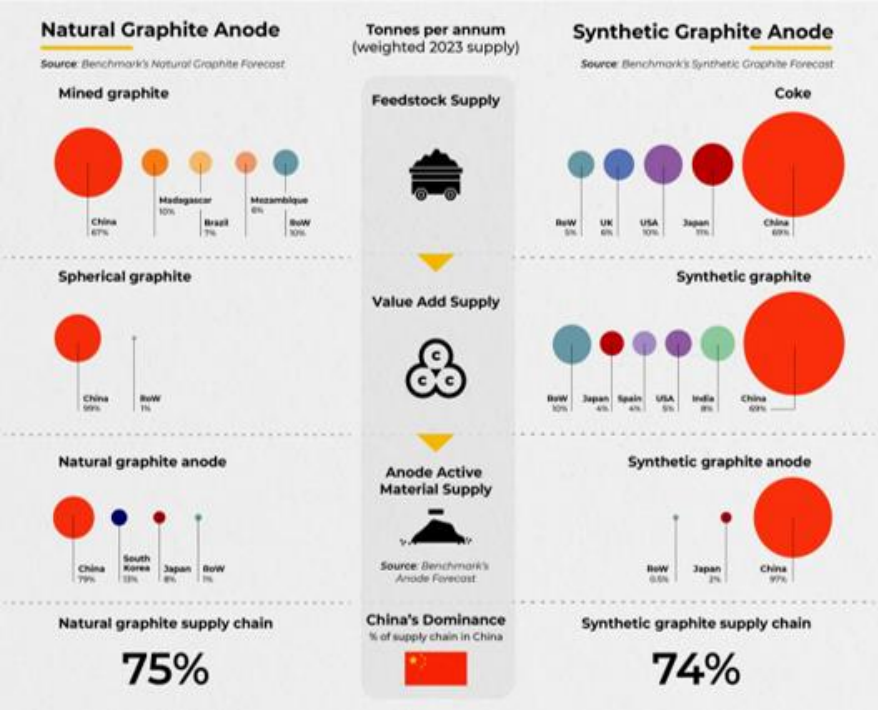
China is by far the largest supplier of upstream flake concentrate...

Global supply of mined natural flake graphite concentrate, processed natural graphite products and synthetic graphite products is dominated by China. The country accounts for over two-thirds of the world's flake supply and synthetic graphite production, over 95% of SPG supply and over three-quarters of CSPG supply (Figure 6).

Most of China's natural graphite production originates from mines in the country's Heilongjiang province, with processing mainly being undertaken in Shandong province.

China's domestic graphite industry has become increasingly consolidated over the past decade as its strategic importance has grown and environmental regulations have tightened.

Figure 6: China currently has tight control of the graphite anode supply chain



Source: Benchmark Minerals Intelligence

Away from China, Madagascar and Mozambique have meaningful production (with Syrah Resources' large-scale Balama operation emerging as an important producer in the latter country over recent years) as does Brazil, while Canada has some limited smaller-scale output. There are a number of flake graphite projects being progressed in eastern Africa, North America and the Nordic region of northern Europe, but China's dominant position at the lower end of the industry cost curve presents a significant barrier to entry to would-be new natural flake graphite concentrate producers without either a unique concentrate product proposition (e.g. exceptional purity flake, or a high proportion of jumbo/coarse size flake) or a deliverable downstream beneficiation plan.

...and dominates the supply of downstream beneficiated graphite anode material

China (and specifically its Shandong region) is currently the world's only large-scale producer of SPG, a situation arising from its historic domination of mined graphite feedstock but also to less stringent environmental controls relative to the Western world which has allowed it to use toxic (but lower cost) chemical purification methods that would not be permitted in many Western economies.

Chinese SPG production is either coated domestically or sent to Japan or South Korea for this final stage of treatment. China's major spherical graphite and anode manufacturer, BTR New Energy Materials, integrated into upstream mining over the past decade amid a general trend of consolidation within the Chinese graphite industry. This is against a backdrop of tightening environmental regulations in China, with inspections of production facilities more common place than in the past.

There is some downstream processing of natural flake graphite in North America, generally using imported feedstock material and much of it beneficiated for non-battery sector applications. However, given increasing concerns in the West over China's dominance of the graphite supply chain, and backed by the introduction of governmental policies such as the Inflation Reduction Act in the US and the Critical

Raw Materials Act in Europe, several plans are being advanced to develop downstream processing hubs outside of China (either integrated with nearby flake production centres or using imported non-China produced feedstock). A notable example is Syrah Resources' recently constructed Vidalia active anode materials processing facility in the US state of Louisiana, but there are other earlier-stage plans in the pipeline.

Such projects were given added impetus with China's announcement in late 2023 that it intends to impose export controls on both natural graphite and synthetic graphite products (including graphite anode materials). Depending on how strictly these new export controls are rolled out and enforced, **this presents a clear security of supply risk to LIB battery manufacturing outside of China.**

Figure 7: The world's top ten natural graphite producers

Source: Benchmark Minerals Intelligence

Demand – LIB use driving growth across the chain

The EV revolution and more steady global growth in consumer electronics has already seen the battery market begin to rival traditional metallurgical uses as the major source of demand for both processed natural graphite and synthetic graphite.

Graphite is one of the most critical raw materials in prevailing LIB battery technology, which is used in EVs but also in consumer electronic devices and increasingly in large-scale stationary energy storage systems. Despite their name, LIBs are far more graphite intensive than lithium, requiring approximately 7-10x more graphite units.

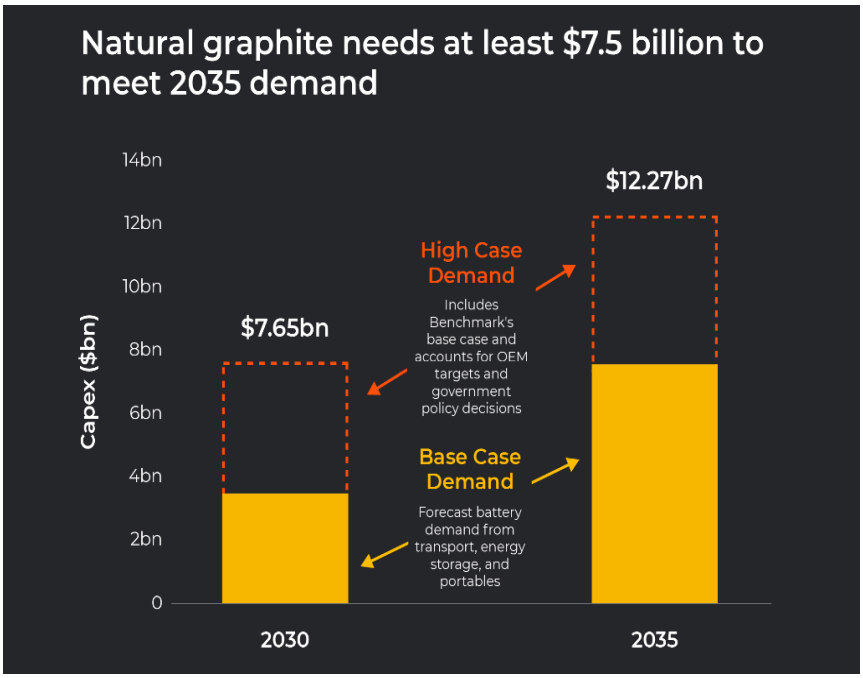
As the adoption of EVs continues to rise globally, driven by environmental concerns and given added impetus by supportive government policy in much of the developed world, demand for graphite as a battery material can be expected to follow a similar trajectory.

We see potential for an added layer of growth as stationary energy storage solutions become ever more important in supporting the transition away from carbon-intensive economies to ones powered by renewable sources.

Graphite market is set to more than double over the next decade

The global trend towards increased sustainability, technological advancement and cleaner energy therefore all points towards materially higher future demand for natural graphite. Conservative forecasts predict demand to at least double over the next decade, which will require substantial investment in supply (Figure 8).

Figure 8: The natural graphite supply chain needs substantial investment if it is to come anywhere close to meeting projected future demand requirements



Source: Benchmark Minerals Intelligence

Outlook: diversification of supply chains essential

Graphite markets are currently experiencing price volatility across the value chain as the ramifications of US, EU and Chinese policy decisions play out and EV demand growth temporarily cools. So far in 2024 demand and therefore pricing for natural graphite fines (anode pre-cursor material) has been soft amid a short-term slowdown in EV sales growth rates coupled with an oversupply of Chinese secondary synthetic graphite.

We do not see this recent softening lasting given global net-zero goals (which require a much greater shift away from combustion engine vehicles) and the cost and environmental issues associated with synthetic graphite production. Pricing for other more specialist graphite grades (e.g. coarse flake and expandable) has remained more stable as there is little substitution threat from synthetic graphite.

A wave of new natural graphite supply sources is required

We continue to believe the overall supply-demand outlook for natural graphite is overwhelmingly supportive of much firmer prices over the medium to long term, particularly for battery-grade product at the downstream end of the marketplace. Battery commodities consultant Benchmark Minerals Intelligence forecasts that global demand for natural graphite-derived anode material for use in LIBs alone will grow nearly five-fold through this decade, and suggests that close to 100 additional natural graphite mines producing at an average rate of over 50kt pa will be required to meet this demand.

Potential for emergence of a two-tiered geographic pricing market?

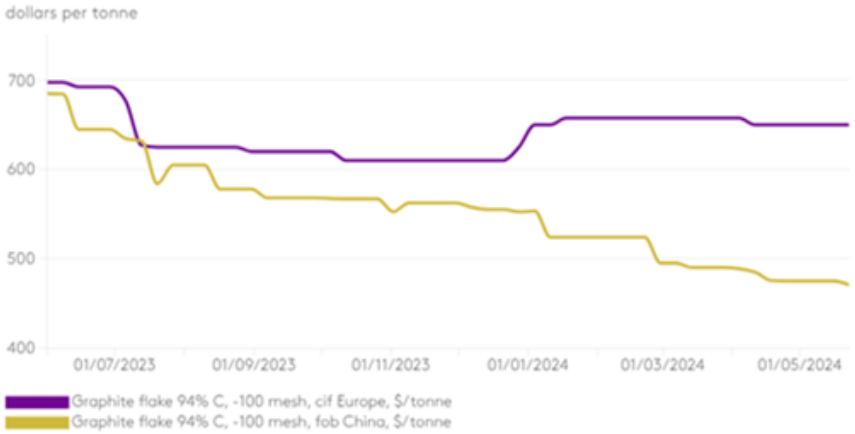
We also see potential for a two-tiered market to emerge, with premiums paid for natural graphite products (be it upstream flake concentrate or downstream processed anode materials) that come from sustainable, secure sources outside of China as US and European policy moves bed in.

EV manufacturers in the US must source graphite anode material from a "non-foreign entity of concern" by 2027 if their vehicles are to qualify for consumer tax credits under the Inflation Reduction Act, and a 25% tariff on certain graphite products has also been reinstated after a temporary lift.

The EU's Critical Raw Materials Act has similar incentives in place to promote the development of self-sustaining supply chains in Europe.

Given China's primary concern is meeting its own domestic graphite requirements, a challenge to China's dominance of the natural graphite value chain must come if Western economies are to get anywhere close to meeting and sustaining net-zero emission targets, in our view.

Figure 9: The spread between graphite prices in China and Europe has widened



Source: Fastmarkets

Company overview

Summary

Listed on the TSX Venture Exchange under the ticker CCB, Canada Carbon is a junior exploration and development company focused on advancing two high-purity flake graphite deposits in Canada.

The company's current priority project is the Asbury group of properties in Notre-Dame-du-Laus area of southern Quebec, for which a maiden graphite resource estimate was declared earlier this year. Canada Carbon also holds the Miller project in the Grenville-sur-la-Rouge area of southern Quebec. Miller is known for its exceptionally high-purity natural graphite that could be well suited for nuclear energy applications as well as other high-tech end uses.

In addition to its existing projects, Canada Carbon holds ambitions to grow through potential bolt on natural graphite acquisition opportunities and, potentially, also through the development of a downstream graphite processing plan over the longer term.

Finances and capital structure

Canada Carbon cash resources stood at C$0.07m as of 30 June 2024, with a working capital deficit of C$0.92m.

Post that reporting date the company completed a private placement in November 2024, raising C$0.11m through the issue of 7.33m units at C$0.015 per unit. Management participated in the placing.

Each unit comprised one new common share in Canada Carbon plus a warrant to purchase an additional share at C$0.06/share at any time until 60 months from the issue date.

Following the November placing, Canada Carbon had just under 215m common shares outstanding, approximately 45m warrants (ranging in exercise price from C$0.05-0.10/share and in term from under one year to up to five years) and 7.5m stock options (vesting up to four years at exercise prices of C$0.10-0.15/share).

Asbury graphite project

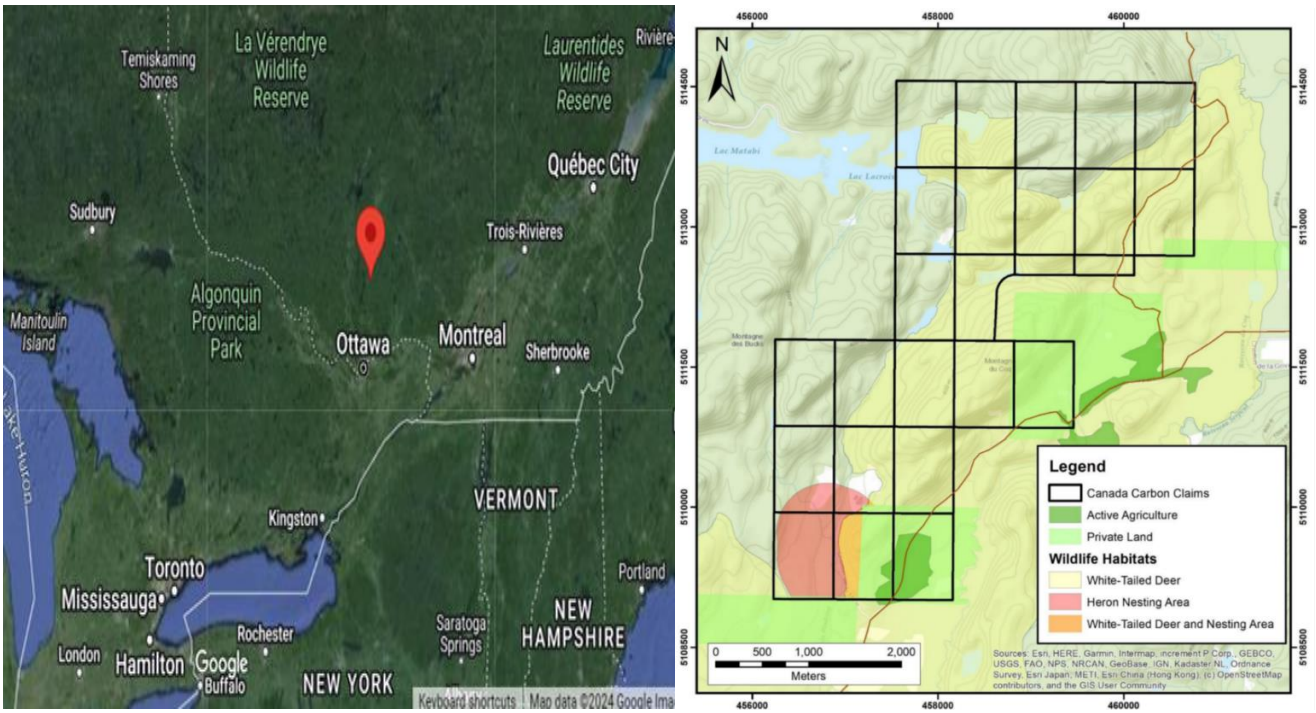
Asbury is an exploration-stage flake graphite project comprising a block of 25 individual property claims (valid through to February 2026) covering a combined 13.8km^2 of ground in southern Quebec. All the claims are wholly-owned by Canada Carbon, and include a past producing mine site (the Asbury mine). There are no outstanding environmental liabilities from prior mining activities.

A network of permanent roads and trails traverse and surround the properties, in addition to seasonal roads and trails used for forestry and agriculture. A power transmission line runs through the project area and the city of Gatineau, located 80km southwest of the project, provides essential services such as gas, lodging, food and medical care.

The northern part of the block of properties is subject to certain restrictions relating to wildlife habitat (specifically the confinement of deer), while the southeastern quarter includes land designated for recreational use by the municipality of Notre-Dame-du-Laus.

These restrictions do not preclude exploration activities from taking place, but do potentially limit when and for how long specific work streams can be undertaken.

Figure 10: Asbury project location (LHS) and claim boundaries map (RHS)



Source: Canada Carbon

Geology

The Asbury properties sit within the Grenville geological province, a regional package of rocks that have been interpreted as constituting the root of an ancient Himalayan-scale mountain range formed during the last major orogenesis that shaped the Canadian Shield. The Grenville province is characterised by highly-metamorphosed Archean age and Paleoproterozoic-to-Mesoproterozoic age rocks, with Asbury hosted in formations of the latter.

Canada Carbon's exploration activities are focused on the graphite potential of these rocks, specifically metamorphic-hosted vein-type deposits and more disseminated mineralisation types.

Exploration history

Exploration of the Asbury area dates back to the 1950s, when Steel and Graphite Company undertook some stripping and limited drilling that revealed the presence of graphite mineralisation over significant widths.

The southwestern part of the current claim package saw production activities across the 1970s and 1980s, with records indicating that some 875,000t of ore at a cut-off grade of 6% Cg was extracted via open-pit operations at the Asbury mine between 1974 and 1988.

Evidence from historic mining and exploration suggests Asbury may host multiple graphite lenses

This historically mined area displays several electro-magnetic conductive anomalies, correlating with where significant graphite mineralisation has been delineated by past drilling. Indeed, electromagnetic anomalies have been detected over hundreds of metres of strike extent, one correlating with a drill intersection measuring 2.3% Cg over more than 40m (hole M-25, drilled by Asbury Carbons in 1983).

The presence of distinct graphitic rock units is characteristic of a skarn, a deposit type which typically hosts multiple graphite-mineralised lenses.

A ten-hole, c.1,000m drilling programme was undertaken on the McGill part of the project area in the late 1980s, returning graphite-bearing intersections including 8% Cg over 19m in one particular hole.

Geophysical evidence points to interconnectivity of mineralisation

Following its acquisition of the Asbury project in 2012, Canada Carbon discovered a new high-grade graphite mineralised trend in the northeastern part of the property block. Multiple electro-magnetic anomalies connect this trend to the historic Asbury mine in the southwest.

In 2021 the company undertook a follow-up geophysical survey that defined three geological fold patterns in the conductor anomalies, folding being an important marker in graphite exploration as it can be associated with thickening and enrichment of graphitic horizons along fold hinges. One of the folds intersects the locality of the historic Asbury mine.

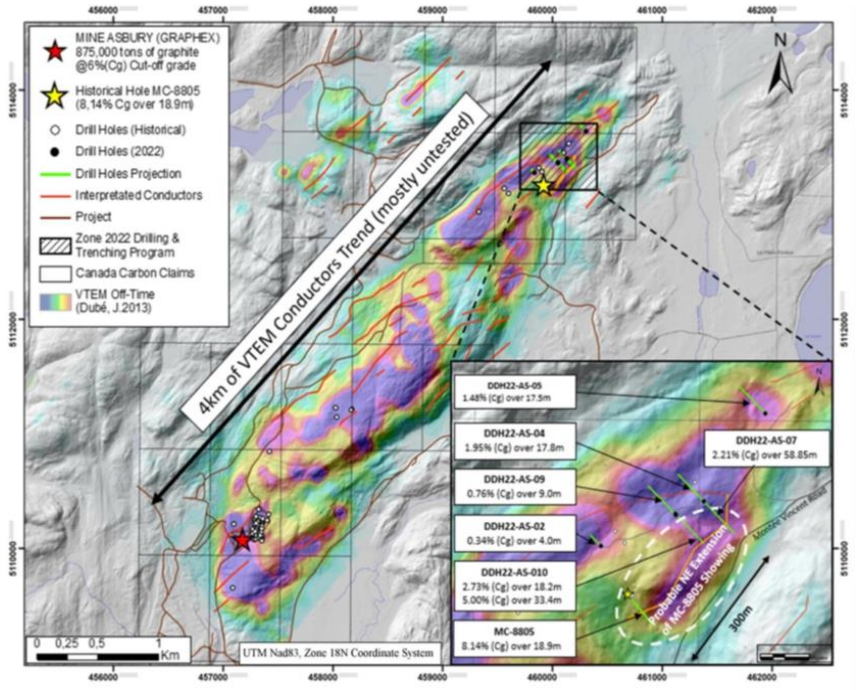
Recent Canada Carbon exploration and maiden resource estimate

In 2022 Canada Carbon undertook a six-hole (for 830m) diamond-core drilling programme and excavated six trenches from which just over 60m of channel samples were taken.

This exploration phase was designed to test some of the previously identified electro-magnetic anomalies and conductors at depth in the northeastern part of the trend that connects this area to the historic Asbury mine c.4km away to the southwest, and to verify the occurrence of graphite mineralisation at surface in these previously targeted zones.

Significant intersections are summarised in Figure 11.

Figure 11: 2022 drilling programme

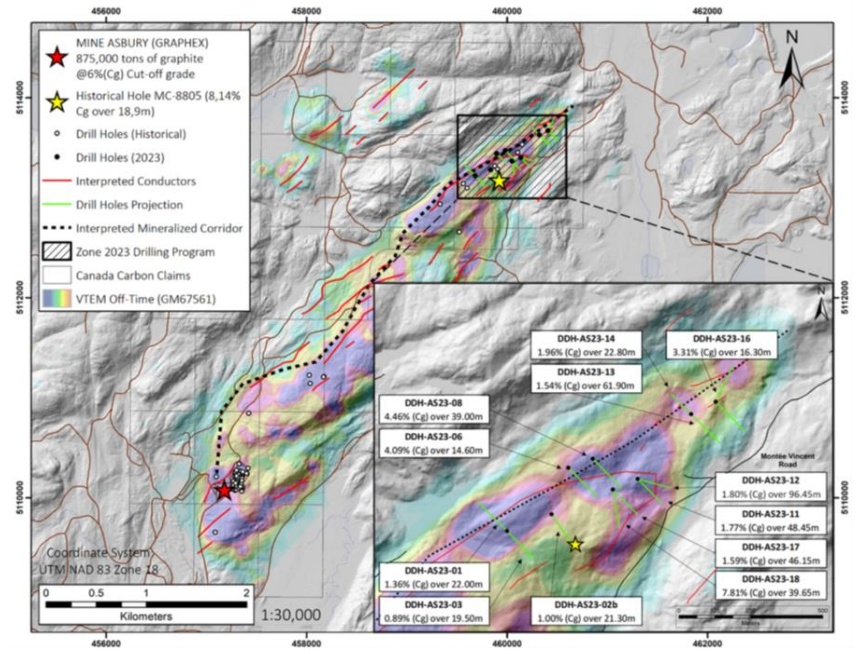


Source: Canada Carbon

Canada Carbon believes there may be a c.4km SW-NE mineralised trend

This programme was followed by some 2,457m (across 13 holes) of diamond-core drilling in 2023, varying in depth between 100m and 325m. This latter drilling phase aimed to further test the depth and lateral extension of mineralisation in the northeastern area of the project, but also to test some of the new conductor anomalies along the interpreted 4km mineralised corridor connecting this area to the old Asbury mine. Significant intersections are summarised in Figure 12.

Figure 12: 2023 drilling programme



Source: Canada Carbon

The 2022 and 2023 drilling results and associated fieldwork yielded sufficient data points for delineation of a maiden NI 43-101 compliant resource estimate by independent consultant SGS Geological Services Inc. A 5m x 1m x 2m block model was defined over a strike length of approximately 1,050m to a maximum depth of 175m below surface, resulting in a total resource estimate of just over 4Mt at an average grade of 3% Cg for 126,000t of contained graphite (calculated using an assumed open-pit resource cut-off grade of 1% Cg). Given the spacing of the available drill data points, all the resource was classified in the inferred category.

*Figure 13: Asbury project NI 43-101 resources**

Category	Cut-off % Cg	Tonnage Mt	Grade % Cg	Graphite t
Measured	-	-	-	-
Indicated	-	-	-	-
Inferred	1.00	4.14	3.05	126,000
Total	**1.00**	**4.14**	**3.05**	**126,000**

**Calculated as of March 2024* *Source: Canada Carbon*

Metallurgy points to quality flake with good recoverability potential

In conjunction with specialist consultant SGS Lakefield, Canada Carbon commenced a bulk sampling programme in late 2023 to test the metallurgical performance of the graphite mineralisation in both drill core and grab samples from surface outcrops. The work included head assaying, bond ball work index analysis and flotation testing.

Initial metallurgical analysis points to resource grade upside

The head assaying returned graphitic carbon speciation results ranging from 1.4% to 5.9% across low to high-grade drill cores, and a very high concentration of 15.7% from an outcrop sample. A composite of the low and high-grade cores (which Canada Carbon believes is representative of the overall Asbury deposit) assayed 3.7% Cg, significantly higher than the average grade of the maiden Asbury resource estimate. The bond testing of the same three samples returned values of 14.1-14.6kWh/t, within the median hardness percentile of SGS's extensive database of ore types.

High Cg concentrates are potentially achievable through conventional flotation-grinding processing

The flotation test work demonstrated that high total carbon grades of over 98% could be recovered to concentrate through a conceptual flow sheet comprising flash flotation of crushed ore followed by a primary grind of the flash concentrate, rougher flotation and polishing-screening-regrind. While grinding and regrinding hinders recovery of large flake (+48 mesh) to final concentrate, it significantly improves the carbon purity of the concentrate (important if targeting the LIB anode market).

These initial results confirm that Asbury holds potential to yield a premium graphite flake concentrate product that would be suitable for several high-margin end-use applications, including potentially as battery anode material.

Figure 14: Flotation and grind test work results

Flake size	Weight %	Grade % C	Distribution %
+80 mesh	41.7	98.2	41.7
+100 mesh	10.0	97.1	9.9
+150 mesh	14.1	99.1	14.2
+325 mesh	23.8	99.0	24.0
-325 mesh	10.4	96.7	10.2
Total concentrate	**100.0**	**98.2**	**100.0**

Source: Canada Carbon

Resource upside potential

Canada Carbon and SGS both consider there to be ample potential to extend known mineralisation along strike from the currently defined resource (while depth potential may also exist, exploration is understandably focused on potentially open-pittable mineralisation). The current mineral resource estimate is based solely on the northeastern portion of the overall Asbury property package – the focus of the 2022 and 2023 drilling campaigns – an area that occupies just c.7% of the geophysical anomaly that has been identified through surveying to date.

The geological model that Canada Carbon and SGS have developed points to multiple other exploration targets along this trend, including in the southwestern area that was the site of historic open pit operations in the 1970s and 1980s. This area exhibits several conductive electro-magnetic anomalies that correlate with identified graphite mineralisation from past drilling. These anomalies cover hundreds of metres in lateral extent and overlap with rock units that are considered compatible with the graphite skarn deposit model, which may imply the presence of multiple mineralised lenses of comparable quality to the historically mined (material which averaged over 6% Cg grade). SGS also opines that significant additional graphite mineralisation may be present along strike to the south of the historic open pit, as well as at depth.

Potential exists for the entire 4km strike extent of the geophysical anomaly to be mineralised

We therefore believe there is significant opportunity to grow overall resources (tonnage and grade) with further drilling of these two key target areas, as well as to upgrade the current inferred resource (to measured/indicated status). Indeed, Canada Carbon has ambitions to ultimately demonstrate that the entire 4km conductor corridor hosts resource potential graphite mineralisation.

Next exploration and development steps

SGS's accompanying technical report to the resource estimate concluded that the Asbury project holds potential to host a significant graphite resource above and beyond that delineated to date, and that the deposit identified thus far is likely amenable to mining by conventional open pit methods.

The consultant recommended the next phase of exploration should include a 3,000m drilling programme, focused primarily on extending the limits of known mineralisation in the northeastern part of the project area along strike from the currently delineated resource, as well as on in-filling portions of the currently wholly inferred category resource to upgrade to indicated status.

It also suggested further exploration of the southwestern part of the project area where historic mining took place, recommending 700m of drilling of targets to be determined from analysis of historic data, past drilling and geophysical surveying. These activities must take place whilst complying with the specific exploration restrictions applicable to these areas.

The guided budget for this next phase of drilling work is just over C$1m. Subject to availability of funding, drilling will recommence in winter 2024/25.

Canada Carbon also intends to undertake further analysis and testing of Asbury's potential flake concentrate product as it looks to progress the project through a prefeasibility study by the end of Q1 2025. This will include battery cell testing of sample concentrate through Polaris Labs, building on the recently completed upstream metallurgical testing. This will enable Canada Carbon to begin the process of qualifying Asbury concentrate for use in a variety of market verticals.

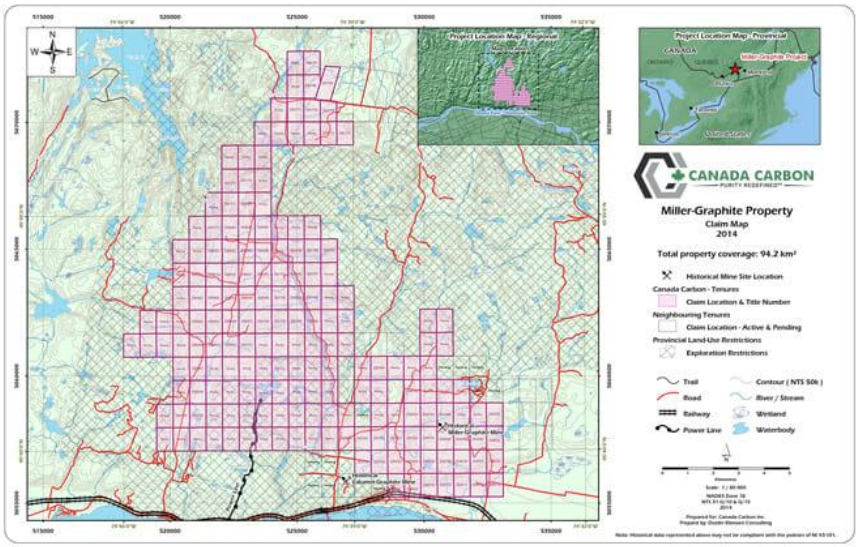
Miller graphite project

Located in the Grenville-sur-la-Rouge area 80km west of Montreal, the Miller project comprises a past-producing hydrothermal lump-vein graphite mine and surrounding property.

The project lies just 800m from main roads that are accessible all year round, with a bush road providing direct access to the main roads. The property is traversed by several old forestry roads, enabling new access routes to be established with minimal environmental impact.

A power line crosses the property area just 500m south of the currently identified deposit.

Figure 15: Miller project property locations



Source: Canada Carbon

History

The Miller graphite property – previously known as the Grenville project – was first explored and worked in the 1800s, producing graphite and mica from the Miller and Calumet mines that are thought to be Canada's first graphite operations. The Morgan Crucible Company of London and JH Gauthier and Co in the US used Miller graphite in their crucibles and claimed it to be of equal quality to the then considered best-in-class available graphite from Sri Lanka (then known as Ceylon).

Since taking ownership of the property in 2013 Canada Carbon has completed several drilling campaigns, though cumulatively these have covered less than 2% of the total claim area.

Geology

Much of the graphite mineralisation identified at Miller to date occurs as massive or disseminated flakes associated with 10-60cm wide vein structures hosted in marble units or pegmatitic rock. The mineralisation is generally high-grade, between 30-90% graphite, and flake sizes range from 0.5mm to many centimetres. Graphite mineralisation occurs alongside contact metamorphic minerals such as apatite, garnet, diopside, sphene, vesuvianite, wollastonite and zircon.

The graphite mineralisation is considered to be of skarn type, with the hypothesis being that mineralised fluids emanated out from a pegmatite intrusive body along the contact area with the marble unit

Prior project economic assessment

In 2016 Canada Carbon delivered a preliminary economic assessment (PEA) of the potential for Miller to be developed into a producer of high-value, high-purity specialty graphite products for high-technology applications as well as of architectural marble products (marble units being associated with the graphite mineralisation). The PEA returned robust economic outcomes, including a post-tax $NPV_{8\%}$ of C$110m and an IRR of 85%, assuming a realised price for its assumed purified graphite product of US$13,000/t.

However, following subsequent changes to Canada Carbon's management and a prolonged administrative delay to project activities (see p.24), the company has since repositioned the project to focus solely on its graphite potential, with an emphasis on its amenability to be a supplier of high-value graphite products suitable for marketing to aerospace, defence and nuclear industry applications.

Current resource estimate – just the start?

High-purity flake resource – open along strike and at depth

The most recent round of in-fill drilling was completed in late 2021 and served to double the covered area and increase a prior conceptual open-pit constrained resource estimate by 27%, to 13.8t at an average grade of 0.73Cg for 100,600t of contained graphite (of which 25% is classified in the indicated category and 75% is inferred)

The results of this drilling programme also indicated that graphite mineralisation remains open both at depth and along strike in either direction. Moreover, numerous geophysical anomalies have been detected across the wider Miller property and have yet to be fully tested with drilling.

*Figure 16: Miller project NI 43-101 resources**

Category	Cut-off % Cg	Tonnage Mt	Grade % Cg	Graphite t
Measured	-	-	-	-
Indicated	0.50	3.34	0.75	25,200
Inferred	0.50	10.48	0.72	75,400
Total	**0.50**	**13.82**	**0.73**	**100,600**

**Calculated as of November 2022* *Source: Canada Carbon*

Exceptionally high-purity graphite

Met tests demonstrate potential for exceptionally high-purity product

Purification and chemical characterisation tests and stockpiles sample materials by SGS has indicated that milling followed by conventional flotation processing can concentrate Miller flake to a +48mesh product grading 93-99% Cg. Subsequent alkaline roast and acid leach purification trials successfully upgraded the concentrate to essentially 100% purity.

These exceptional purity levels were obtained from a conceptual process flow sheet that is yet to be fully optimised, suggesting that Miller graphite may be suitable for applications that require ultra-pure grades such as moderators in nuclear reactors. Such material commands a significant premium given the scarcity of natural graphite products that can pass the stringent specification hurdles required for nuclear use.

Strategic MoU for future supply to defence and aerospace industry

In 2022 Canada Carbon signed a memorandum of understanding (MoU) with carbon materials trading group Irondequoit Carbon Co LLC pertaining to a potential joint venture and the sale of a minimum of 25% of future graphite produced from the Miller deposit to Irondequoit. The headline terms of the MoU include:

- Irondequoit will have exclusive rights for a three-year period (with potential to extend) to conclude binding graphite off-take agreements with certain entities engaged in the aerospace and defence sectors as well as with certain players in the high-performance lithium battery energy-storage sector
- Irondequoit will assist Canada Carbon in its efforts to raise the capital necessary to build a primary run-of-mine graphite processing operation at the Miller project
- The parties will evaluate the potential for the joint development of a downstream processing operation in the US (likely New York State) and share future net profits from the JV on a 50:50 basis

UK strategic collaboration

Canada Carbon is also in discussions with the Nuclear Graphite Research Group (NGRG) of the Henry Royce Institute at the University of Manchester on the potential for collaborating on developing routes to supply the graphite material required by the next generation of nuclear reactors. Canada Carbon has been identified by NGRG as a potential important player in the future nuclear industry graphite supply chain given the unique properties of its Miller project.

Professor Abbie Jones, Chair in Nuclear Graphite Engineering, is a UK independent expert commissioned directly by the Nuclear Innovation and Research Office (NIRO) – which reports to the UK's Department for Energy Security & Net Zero – and has been tasked with coordinating the development of future supply chains for the UK's nuclear power industry. Professor Jones and NGRG will work with Canada Carbon to further evaluate the suitability of the Miller project's graphite for inclusion in the UK's nuclear raw material supply chain.

Current status

Further exploration of the Miller properties by Canada Carbon is currently on hold pending the outcome of a public hearing by the Commission de Protection du Territoire Agricole du Québec (CTPAQ). Canada Carbon re-applied for exploration and development approvals from the municipal authorities in 2023 in an effort to draw a line under legacy issues relating to past concerns raised over the previous management team's plans to develop a marble quarrying operation, and the potential for that to adversely impact the agricultural potential of the claim area (specifically hydrogeological concerns and the potential impact on maple sugar bush cultivation).

Responding to those concerns, Canada Carbon subsequently dropped the marble quarrying component of the Miller project to focus instead on further evaluating the high-value graphite potential of the project. Moreover, it has also undertaken environmental and social impact analyses to a level beyond what would typically be expected of a project at this early stage of evaluation.

The final CTPAQ hearing could be the catalyst to reignite E&D work

The company anticipates the CTPAQ final hearing to take place later this year and, subject to a positive outcome, would look to re-start active exploration work thereafter.

Board and Senior Management

Ellerton Castor – Chief Executive Officer

Ellerton Castor was most recently chief executive officer of Ontario Graphite Ltd, a privately-held Canadian graphite project development company and owner of the mothballed Kearney mine. Prior to assuming the chief executive role at Ontario Graphite, Mr Castor served as company's chief financial officer. During his time with Ontario Graphite, Mr Castor supervised all finance and administrative functions, led licensing and permitting activities, oversaw project feasibility study and negotiated all engineering, procurement and construction management agreements.

Mr Castor has over 30 years' experience in principal investing, investment banking and M&A advisory services to companies in the US, Canada, Europe, Australasia and Latin America. Prior positions include: Managing Director of SphereInvest Special Situations Fund; Founder and Managing Partner of Panterra Partners LLC; Managing Director, Latin America M&A and Merchant Banking at Bank of America Securities; Executive Director, Global M&A and Financial Institutions Groups at CIBC Oppenheimer; and Senior Associate, Corporate Finance & M&A at Morgan Stanley. He holds an MBA from Harvard Business School and a BA in Economics and History from Franklin Pierce University.

Remantra Sheopaul – Chief Financial Officer

Remantra Sheopaul is a principal with Marrelli Support Services Inc (MSS), which provides chief financial officer, accounting, regulatory, compliance and management advisory services to several issuers on the TSX, TSX Venture and other Canadian and US exchanges. In his role with MSS, Mr Sheopaul has been involved in initial public offerings, analysis of complex accounting transactions, and assisting non-public and public clients regarding IFRS disclosure and compliance matters. Prior to his tenure with MSS, he was employed with a Toronto-based public accounting firm, including three years managing audits for medium-sized TSX Venture clients ranging from junior mining companies to real estate investments trusts in North America.

Dr Pieter Barnard – Director

Prior to his retirement in 2014, Dr Pieter Barnard enjoyed a long and illustrious career with global graphite and carbon manufacturing group GrafTech International Holdings Inc, latterly as president of its Global Industrial Materials division. During his time with GrafTech, Dr Barnard served as a reporting officer and chairman and board member for several of the group's international affiliates. He gained extensive international experience, working in South Africa, Europe and the US, and for a time led the GrafTech division that manufactures a broad range of high-quality graphite electrodes, petroleum needle coke and graphite/carbon refractory products.

Bruce Coventry – Director

Bruce Coventry is currently Chairman of TowerSec LLC, a privately-held US-Israeli automotive cyber security company. Mr Coventry is also a Director of US Manufacturing, a private-held maker of lightweight automotive axle components. Previously, he was VP Operations at Electrovaya, a Canadian lithium-ion battery manufacturer. Mr Coventry has over 40 years' experience in the automotive, energy, and private equity fields. He was President of Dresser Waukesha Engine prior to its sale to General Electric, and is a former President of Global Electric Motorcar, a wholly-owned subsidiary of Chrysler LLC. Other prior roles include President and Non-Executive Chairman of the Global Engine Manufacturing Alliance (a JV between Chrysler, Hyundai, and Mitsubishi), and VP of Powertrain Manufacturing for

Chrysler's US$5bn Powertrain Division. Mr Coventry is a current Trustee and past Chairman of the Board of Trustees of Kettering University in Michigan.

Greg Lipton – Director

Greg Lipton is a registered professional with the Association of Professional Geoscientists of Ontario (APGO) and a long-time member of the Prospectors and Developers Association of Canada (PDAC). He has over 33 years' experience in exploration for base metals, precious metals, diamonds, and industrial minerals, most of which was spent with BHP International and Utah International as a Senior Geologist. Mr Lipton has been a frequent conference speaker and has authored and co-authored numerous technical papers. He has been President and Chief Executive of TSX-V listed Metallum Resources Inc since 2004.

Arran Thorpe – Director

Arran Thorpe is President and Director of Skyway Sports Center, a private company, and has been an advisor and consultant in the payment processing systems space for the past nine years. For the last 15 years, Mr Thorpe has also been a priest for the Anglican Church, and sits on the international board for The Episcopal Network on Stewardship, the American and Canadian arm of the Church focused on Stewardship and Philanthropy. In addition to his role with Skyway Sports, Mr Thorpe's private sector work experience includes roles with Payment Processing Systems, GLG, Alpha Sights, and Third Bridge. Mr Thorpe holds a Master of Divinity from The Atlantic School of Theology in Canada and Bachelor of Arts degree from Saint Mary's University, Halifax, where he majored in International Development Studies.

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