

First Nations “demand” a moratorium on rare earth mining in Quebec

✘ The Assembly of the First Nations of Quebec and Labrador (AFNQL – the political organization regrouping 43 Chiefs of the First Nations of Quebec and Labrador) has demanded a moratorium on rare earth elements in the mining sector in Quebec. This decision affects Matamec Explorations directly. Matamec Explorations Inc. proposes the construction, operation and decommissioning of mines rare open land treat 1.3 million tons of ore per year over an operating period of 15 years, about 40 kilometers east of the municipality Kipawa, in an area where First Nations Eagle Village and Wolf Lake exercising their aboriginal rights and aboriginal title. Matamec faces an uphill struggle, but not all is lost.

Matamec specializes on the development of heavy rare earths in the Canadian provinces of Quebec and Ontario but its main interest is the Kipawa project in Quebec. Matamec has a partnership with Toyotsu (a division of Toyota Motors) that has enabled the Company to move quickly through the various stages of development such that production was expected to start in 2016. Toyotsu had agreed to buy all metals produced at the Kipawa property. Matamec has already started metallurgical tests, including the construction of a pilot test facility and its property includes heavy rare earths (HREE) and some niobium (Nb). Niobium has a number of applications but in the automotive sector it is especially desired for its steel strengthening qualities and used to make the future ‘high strength low alloys’ to enable manufacturers to reduce weight and, therefore, lower fuel consumption. The partnership has enabled Matamec to overcome the financial hurdle of funding the FS and the construction of the production plant, which would have allowed Matamec to join

Lynas and Molycorp as one of the few companies outside China able to supply high-quality rare metals. As a further boost, last March, the Government of Quebec expressed the economic and technological importance of Kipawa, prompting Resources Quebec (RQ) to invest CAD\$ 1 million in equity capital and a minority equity of CAD\$ 3 million in the Project, which is part of a total CAD\$ 6 million project (in which Matamec will invest CAD\$ 2 million).

The partnerships with Toyota and the Government of Quebec encouraged Matamec to announce, just last September, that it was considering various business opportunities to develop the rare earth mining project located in Témiscamingue. However, RQ's investment was always going to have to pass the hurdle of due diligence, featuring a crucial negotiation with the local native communities represented by AFNQL. Sensing the difficulty of this 'negotiation' and the Natives' hostility toward the Project, Toyotsu through its Toyotsu Rare Earth division ('TRECan') signed a 'termination and release' agreement between itself and Matamec, converting a 49% stake in Kipawa into a 10% net profits interest royalty, leaving Matamec as the sole owner of the HREE deposit. This was a move likely intended to reduce Toyota's exposure to the social battle that has been brewing with the local community.

Toyota, which presents itself in advertising as the Company behind the Prius, the poster child for 'green' motoring and icon for environmentalists and sandal wearers everywhere, could not afford to risk its reputation in a possible dispute with eco-social ramifications even if Matamec, once operational, would be employing at least 229 workers in a region that should have welcomed badly needed employment opportunities. Evidently, Matamec and the Government of Quebec (GoQ) failed to impress the leaders of the AFNQL, who have not even considered the employment opportunities. Indeed, on October 23, 2014, the leaders of the AFNQL adopted resolution No. 20/2014 supporting the position of the Algonquin First

Nations of Eagle Village and Wolf Lake for a moratorium on the extraction of rare earth elements (as part of the current moratorium on uranium mining in Quebec). The AFNQL's argument, directed at the GoQ and Canadian Prime Minister Harper himself, is that economic development is welcomed but that it must come as part of a program of responsible, sustainable resource development and protection of the territory and traditional ways of life in a context where the survival of their ancient culture is directly threatened. GoQ, says the AFNQL, has not fulfilled its duty to consult and accommodate two Algonquin First Nations in the exploration phase or stage of development of Matamec's proposed rare earth mine and the results of the cultural and socio-economic assessments by the two First Nations Algonquin already indicate that the rare earth project Matamec will have "an irreversible impact on their quality of life".

The government of Quebec is reviewing its (temporary) ban on uranium mining. On November 11, the Bureau for Public Hearings on the Environment (BAPE) will commence the final phase of public hearings on the issues of the uranium industry in Quebec. During this consultation, the permits for the start of the Strateco's Matoush project are suspended while another proposed uranium mine in Sept-Îles, has been idle for the past few years, opposed by 20 physicians in 2009, which had threatened to leave the city if the mine was built. Since then, the company behind the project, Terra Ventures, became a subsidiary of RioTinto. The GoQ, now in managed by a far more mining friendly Liberal Party, may be close to lifting its ban on uranium mining and this would give Matamec some legal leverage to challenge the AFNQL and save its Kipawa project. Alternatively, and more likely, Matamec will have to negotiate better terms with the local communities taking some lessons from such rivals as Ucore (TSXV: UCU | OTCQX: UURAF) and Avalon (TSX: AVL | NYSE MKT: AVL), to cite two, which have placed relations with the local communities among the top priorities of their projects, succeeding even to welcome some

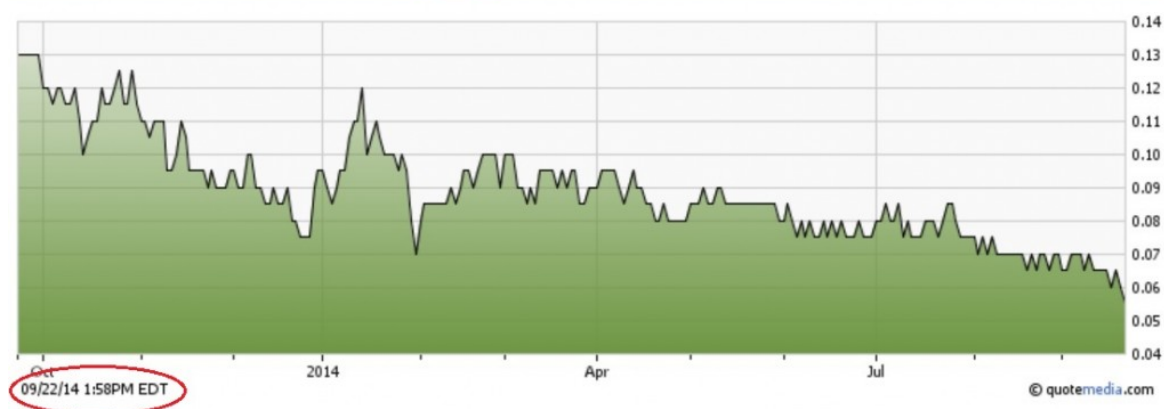
of their leaders to join their Boards.

Matamec converts Toyota partnership from joint venture to profit sharing

Matamec Explorations Inc. (“Matamec”, TSXV: MAT | OTCQX: MHREF) has issued an update about the CAD\$ 4 million investment from CDA Resource Quebec (‘RQ’) in the HREE deposit at Kipawa, announced by the company on April 2. Last March, the Government of Quebec expressed the economic and technological importance of the Kipawa Project, warranting Resources Quebec inc to invest CAD\$ 1 million in equity capital and a minority equity of \$ 3M CAD in the Kipawa deposit, which is part of a total CAD\$ 6 million project (in which Matamec will invest CAD\$ 2 million). Matamec has also announced that it now holds a 100% interest in the Kipawa deposit. As of September 19, Matamec said that it is now in a position to explore various business opportunities and develop the rare earth mining project located in Témiscamingue thanks to the financial partnership with RQ and the support of the Government of Quebec. RQ’s investment is now going through the various and normal stages of such a process, including due diligence. It also includes the negotiation of a corporate joint venture agreement between RQ and Matamec under which RQ will take a minority stake in the Kipawa deposit. Matamec’s agreement with RQ, however, has come just as the Company has signed a ‘termination and release’ agreement between itself and Toyotsu Rare Earth Inc. (TRECAn) in the Kipawa heavy-rare-earth-element deposit. Matamec will pay TRECAn CAD\$ 280,000 while TRECAn will convert its 49% stake in Kipawa into a 10%

net profits interest royalty, leaving Matamec as the sole owner of the HREE deposit. In its feasibility study published last fall, Matamec expected revenues of \$ 2.55 billion during the 15 years that will operate the mine. To start the mine investment of \$ 374 million will be needed. The company would recover its investment in just four years. It is expected that the mine will engage 229 workers in a region hit hard economically.

Charting for Matamec Explorations Inc. One Year



Toyota Tsusho (through TRECan) is one of the Japanese companies that have been securing partnerships with North American and Australian miners such as MATAMEC, Molycorp or LYNAS to reduce Japan's dependence on Chinese rare earths. Nevertheless, TRECan's conversion of the partnership with Matamec from joint venture to royalty agreement reflects some concerns. The investment was a sign of confidence in Matamec's ability to exploit rare earths in Quebec. The publication of the feasibility study of the project in October 2013 confirmed the quality of the Kipawa deposit. However, construction of the mine has been contested by several environmental and indigenous groups, including the Témiscamingue, and the Protect Lake Kipawa Quebec group, concerned about the potential contamination resulting from the process to extract rare earths. In October 2013, an official public hearing on the environmental effects of the mine was held to challenge Matamec. The related protests may have played an important

part in the decision by Toyota (represented by TRECan) to modify its relationship with Matamec. Toyota has positioned itself as the premier manufacturer of 'green' vehicles, epitomized by the Prius hybrid. Tesla Motors, while offering fully electric cars, has a higher and more exclusive market position.

Toyota aims for mass market appeal and it may have felt that its image would suffer in the wake of environmental protests. Nevertheless, the partnership remains even if under a new mechanism. Matamec is unique in that it is the only rare earths company to have signed a major automotive manufacturer as a joint venture partner with a guaranteed sale of its products for the duration of the mine, estimated at 13 years. Clearly, this helped to reduce Matamec's economic risk as TRECan had agreed to buy all metals produced at the Kipawa property. Matamec has already started metallurgical tests, including the construction of a pilot test facility. The property includes HREE's and some niobium (Nb). Niobium has a number of applications but in the automotive sector it is especially desired for its steel strengthening qualities and used to make the future 'high strength low alloys' to enable manufacturers to reduce weight and, therefore, lower fuel consumption. The TRECan partnership had enabled Matamec to overcome the financial hurdle of funding the FS and the construction of the production plant in order to ensure that production would begin around the second half of 2016, turning Matamec into one of the few companies outside China able to supply high-quality rare metals.

Matamec to gain from cooperation with Toyota and Quebec's mining strategy

☒ Canada has the potential to become a major force in rare earths space in the next decade, gaining as much as 20% of the market share – ambitious considering China supplies more than 90% of heavy rare earths. Quebec has the potential to become a strategic producer of these critical resources and it can count on many companies and research centers to promote electric car development. Quebec is among the pioneers in Canada in regards to charging infrastructure deployment cars.

The electrification of transportation is one of the centerpieces of Quebec's development strategies and Matamec Explorations Inc. ("Matamec", TSXV: MAT | OTCQX: MHREF) is well positioned to become one of the first HREE mining projects to go into production in all of Canada at its Kipawa project in Quebec. A KPMG study, commissioned by Matamec and Toyotsu Rare Earth Canada ('Toyotsu, a Toyota subsidiary), suggests that by 2020, the market for electric vehicles in Quebec could reach to 165,000. Quebec's 2011-2020 'Action Plan' for Electric Vehicles sets the goal of reaching 300,000 electric cars in 2020.

The actual amount of rare earths used in hybrid vehicles is small; however, the parts requiring rare earths are essential in making the magnets, superconductors, catalysts and batteries that allow hybrid and electric vehicles to work. HREE's are making it possible to reduce battery weight, dimensions while increasing their power in conjunction with developments in battery charging technology that will drive demand for EV's and hybrids over the next few years. Demand for rare earths could soon exceed supply, given that China produces 97% of these critical metals and is tightening the

reins on exports. The Kipawa project itself is significant because of the presence of such rare earths as europium, neodymium and dysprosium, essential metals for the production of electrical systems for hybrids and Electric Vehicles.

One of the challenges in producing electric cars is that over 95% of the heavy rare earths are produced in China, resulting in a significant risk in the supply of these materials. Toyota is the world's largest manufacturer of hybrid cars and is therefore highly dependent on these minerals. China is and will remain, for some time, the dominant player in the rare earths space but its status in this regard is not unassailable as China is reducing and consolidating its annual production. Whether China will succeed in achieving these goals, and in shutting down so-called illegal miners, remains unclear, but the rhetoric from Beijing in this regard appears more determined than ever this year. Meanwhile, despite the jittery markets the demand for rare earths is growing and by 2020, the annual levels could be double the present one at 200,000 tons by most analysts' estimations.

The investments of capital and effort to bring a rare earth production from mine to processing plant are enormous and in order to survive companies will have to engage in more cooperation, both with other miners and with specialized institutes. Canada is one of those countries where such cooperation has thrived. Matamec's partnership with Toyotsu is expected to help the mine reach production stage by 2016.

Matamec is unique in that it is the only rare earths company to have signed a major automotive manufacturer as a joint venture partner with a guaranteed sale of its products for the duration of the mine, estimated at 13 years. Toyotsu considers the Kipawa deposit as an essential source of HREE to build hybrid vehicles, an area in which the parent company Toyota has placed a great deal of its future growth prospects.

Last August, Toyotsu paid the final installment of a total USD\$ 16 million investment to fund a definitive feasibility

study (FS) for the Kipawa rare earths deposit. Toyotsu has agreed to buy all metals produced at the Kipawa property. Matamec has already started metallurgical tests, including the construction of a pilot test facility. Last April, Matamec announced the discovery of new REE zones, bringing the total number on the property to 12. The property includes HREE's and some niobium (Nb). Niobium has a number of applications but in the automotive sector it is especially desired for its steel strengthening qualities and used to make the future 'high strength low alloys' to enable manufacturers to reduce weight and, therefore, lower fuel consumption.

The partnership has enabled Matamec to overcome the financial hurdle of funding the FS and the construction of the production plant, all but guaranteeing that production will go ahead by the second half of 2016 as scheduled. Matamec will then join Lynas and Molycorp as one of the few companies outside China able to supply high-quality rare metals. This will be no small feat, given the difficulties faced by other exploration companies in achieving project targets. Moreover, the Province of Quebec passed a new mining Law that clarifies mining license procedures, setting clear rules for companies – they must submit feasibility and marketing studies to maximize the economic benefits for Quebec. The quality and value of the ore have to be promoted.

Thus, the new law introduces the province into modern mining world, it lays the foundations for a prosperous mining, which benefits all parties and will certainly attract new investors to a mining jurisdiction – further boosting the Kipawa property – that has already earned a reputation for very low regulatory risks.

Rare Earths and Critical Metals Weekly Review: Don't count on prices staying low for long



The EU Commission last week announced that Europe has been suffering from bottlenecks in the supply of such key raw materials as rare earths. The malaise did not suddenly manifest itself and, in fact, REE shortages partly accounted for the geometric rise of rare earth prices in 2010-2011. Rare

earths were as difficult to come by as platinum, natural rubber or cobalt and most REE had to be imported from China, the DR Congo, South Africa or Brazil. The Commission has therefore asked that more spending be directed to REE research. The focus, admittedly has been on improving recycling; however, mostly on recycling rare earths and reducing waste. However, the technology for recycling rare earths is still largely in the realm of academia and it will have little impact on the actual mining of these resources for the time being. Japan has explored the recycling route with even greater impetus and still its technology companies rely on foreign supplies. The EU commissioner has launched a formal process to improve the supply situation. The proposed approaches, in the short term, have less to do with finding efficient recycling techniques than they do with simplifying trade legislation to speed up the import process.

China, which is still the largest rare earth producer, has continued to exploit this position and the delays experienced

by the would-be challengers in Australia, Canada or the United States. China has used its dominance for years hampering, in particular, the electronics industry in industrial powers such as Japan, the USA or EU. Beijing has deployed the scarcity card to impose trade bans sending panic waves across what remains of the West's electronics industry. Concerns with climate change on one hand and political pandering in the form of ill-considered bans on nuclear technology (especially in Germany) have raised the importance of renewable energy and materials based on the rare earth metals are essential to the future and present currently represents an omnipresent topic especially for manufacturers of such components as batteries or capacitors and the 'invisible' bits that allow for wind turbines or solar panels to convert sunlight or wind power to energy transfer and energy storage, opening up new business opportunities. Demography has also been playing its part in sustaining demand for the kinds of electronics and processes that require rare earths.


Estimates suggest that the number of internet users worldwide will grow from 1.9 billion in 2010 to 3.1 billion in 2015 relying on a multitude of devices and especially mobile ones, generating exorbitant need to manage the flow of data traffic with all that it implies in demand for secure transmission networks, chips, and of course batteries – ever smaller and more powerful. The Nobel winning economist Paul Krugman himself predicted an intensifying technological revolution, noting during an interview that the information age has yet to fulfill the full extent of its impact, meaning that technology is just starting to catch up. Inevitably, where rare earths are concerned, the conclusion is that more mining and more sources are needed. Admittedly, in the past few months, the market for rare earths has been quite turbulent approached and prices have quite a distance from their old highs; global economic woes have combined with 'artificial scarcity' – fueled by a series of Chinese production cuts and export restrictions – and even attempts (largely unsuccessful) to

replace rare earths with other materials.

The perception in 2012 was that demand for REE's fell, accounting for the low prices and the difficulty faced by the share prices of the emerging new producers to fulfill their promise; and there are more candidates running in the race. Russia has decided to intensify its sources of rare earth, launching a project in Murmansk. Another, and particular, cause for optimism comes from the fact that German researchers and industrialists have grown quite concerned by the persistent threat of Chinese rare earth supply disruptions, reflecting the general EU outlook described earlier. Being German, they have wasted no time and are approaching the problem from two different angles. Deutsche Rostoff AG has launched exploration of a potential 38,000 ton REE deposit in Storkwitz, which had been initially investigated by the former DDR (East Germany) in the 1970's. The German Federal government is actively supporting the project given its vital importance to future economic development. German scientists have also been studying a second route involving the extraction of special metals such as indium and germanium and rare earths from tin mining waste products in a process that simultaneously provides for efficient and environmentally sound industrial practices.

Many specialists are involved including metallurgists, chemists, biologists and geologists. In a similar manner but closer to production stage, the Canadian Orbite Aluminae (TSX: ORT), last week announced the formation of a partnership with Veolia Environmental, a France based multinational specializing in waste management with projects all over the world has signed a joint agreement for the treatment and recycling of the 'red mud' from alumina production. More so than the rare earths themselves, Orbite's real potential lies in its patented process, which it can sell to others to, both, resolve a well known and difficult environmental problem and find new ways to extract rare earths. Nevertheless, even as

all this research continues and progresses, China's dominance in the market remains structurally strong enough to cause more market disruption and whatever the drop in prices and its effects, the long term picture is more complex and rising prices will result from the likely revival of economic and industrial activity.

The share performance of ProEdgeWire Rare Earth and Critical Metals sponsors for the week ending on February 8 was overall flat at an average of -2.12%. There were few highlights to report and Matamec Explorations (TSXV: MAT; OTCQX: MHREF) saw the best performance at +13.43%. Matamec has a collaboration agreement with Toyota Motors and the favorable share price also reflects the Japanese car company's desire to evolve its hybrid line-up by launching a new hybrid power Supra sports car in a plan set to increase sales of the entire and considerable range of its hybrid offerings. That should lead to more hybrid competition, prompting a tide that should lift  many other 'boats'...