



Eramet in Argentina Centenario-Ratones lithium Project

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BofA Lithium (DLE) / Battery Materials (virtual) Fieldtrip
14 September 2022

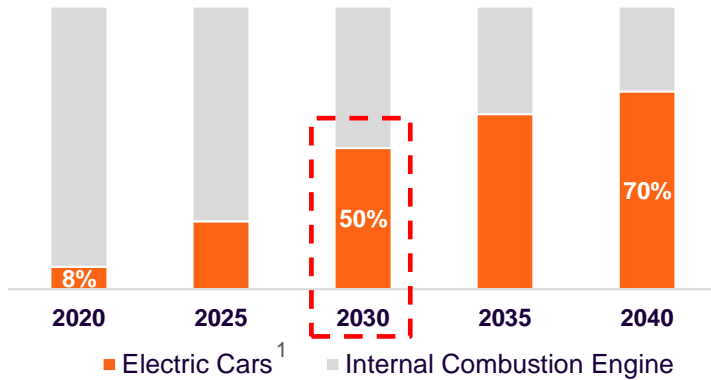


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A world-class asset in the Group's portfolio in a momentum of mega boost in metals for energy transition



Electric cars (fully or partially) to represent half of global sales in 2030...

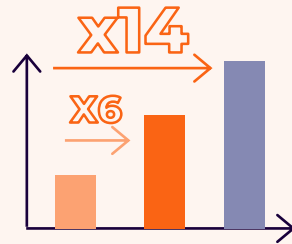


...with batteries requiring significant amount of lithium



45kg LCE²
c. 25,000 l of brine

Average requirement for a standard Li-ion EV battery



Global demand² in 2020 vs. 2030 vs. 2040 (in k-tonnes³)

Centenario-Ratones: Tier 1 lithium project

Salta, Argentina



- Life-of-Mine of **40 years⁴**
- Resources** estimated at c. 10 Mt LCE (providing further upside potential)
- Eramine Sudamerica (50.1% Eramet) owns **100%** of the entire salar with **perpetual mining rights**
- Construction in **partnership with Tsingshan Eramet to control and operate the project**

¹ Electric cars = Battery Electric Vehicles + Plug-in Hybrid Electric Vehicles + Hybrid Electric Vehicles

² Battery-grade Lithium demand for all applications

³ LCE (Lithium Carbonate Equivalent)

⁴ Based on proven and probable reserves at the Ratones deposit (1.1Mt LCE), and on a project designed for 24ktpa LCE

Top-notch sustainability standards

1

Building long-lasting and constructive relationships with local stakeholders



- **Solid local content: employment** (c. 95% of workforce) and **sourcing** (49% of procurement)
- Contributing to **local community** development (Quinoa Project developed by Eramet¹) over the past 4 years

2

Operating responsibly



- **Robust environmental programme**
- **Significantly lower incidence on hydric balance** vs. conventional process

3

Producing metals that the world needs

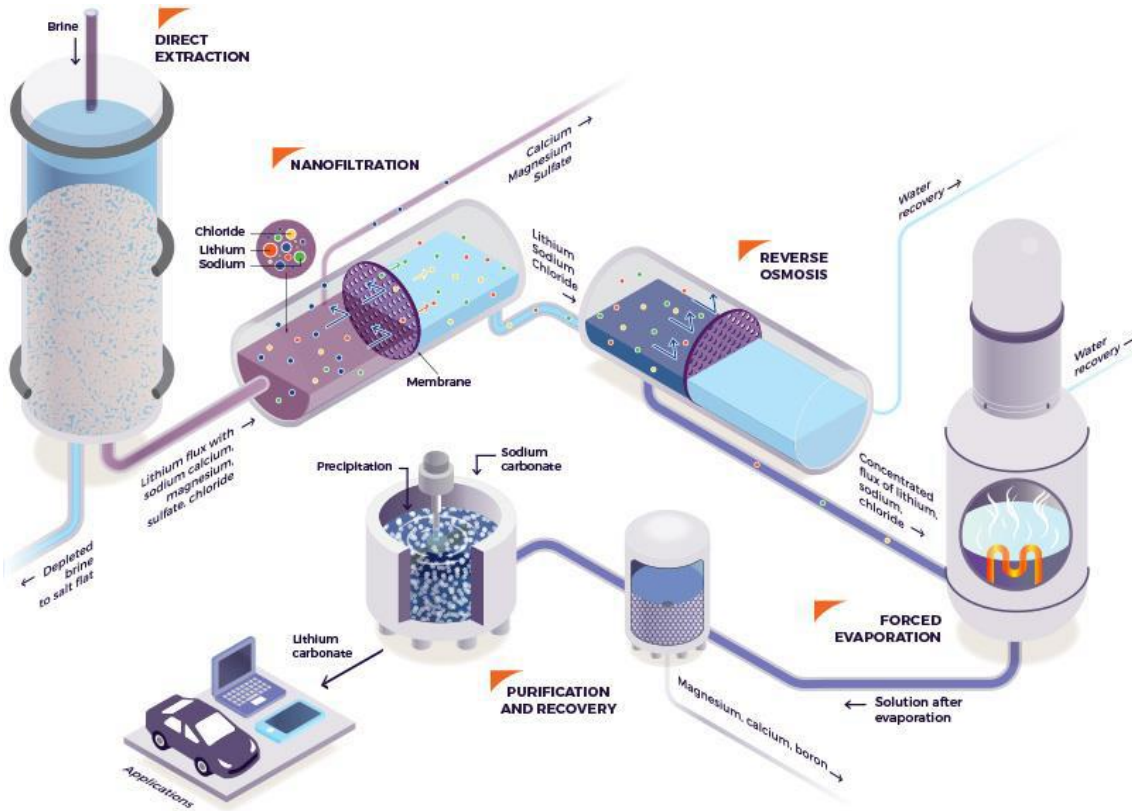


- Meeting the needs of **global economic development**
- Participating in the challenges of the ecological and **energy transition**

In line with UN Sustainable Development Goals

Continuously consolidating our social license to operate

Developed in-house, Eramet's Direct Lithium Extraction technology combines strong competitiveness...



Direct Lithium Extraction (DLE)

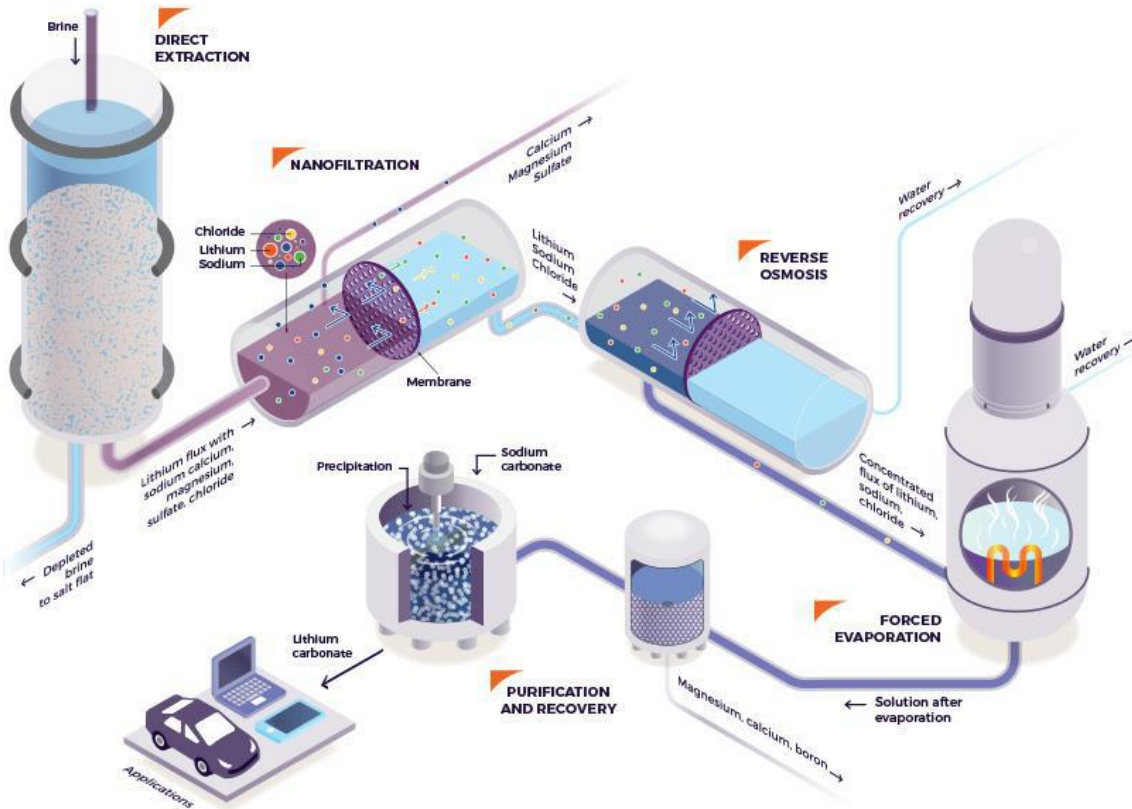
- **Proven** industrial process over the past 20-years (aluminum-based lithium sorbent)
- Proprietary lithium sorbent working at **native temperature** of the brine (20°C)
- **90%¹** lithium recovery yield of the DLE unit
 - > **Industry leading yield much higher** than traditional evaporation process (c. 40-50%)
 - > Almost **twice less** brine pumped²
 - > Thus, **optimized management** of the deposit's hydric balance

Much higher performances than conventional process

¹ 87% process yield overall

² Vs conventional process, based on the same brine characteristics (notably Li concentration)

... as well as high sustainability standards



Water recycling

- Regeneration of the lithium sorbent **only by water** (DLE based on titanium or manganese sorbents use acid) and at 20°C
- Water recycling** by reverse osmosis & forced evaporation
- 60%** process water recycling rate

Efficient purification

- High selectivity** of the DLE unit
- Nanofiltration and ion exchange for **solid waste minimization**

Swift production

- 1 week** lead time vs. 12-18 months on evaporation process

Aligned with the Group's strategy to create sustainable value

Full production process tested on site in real conditions over the past 2 ½ years

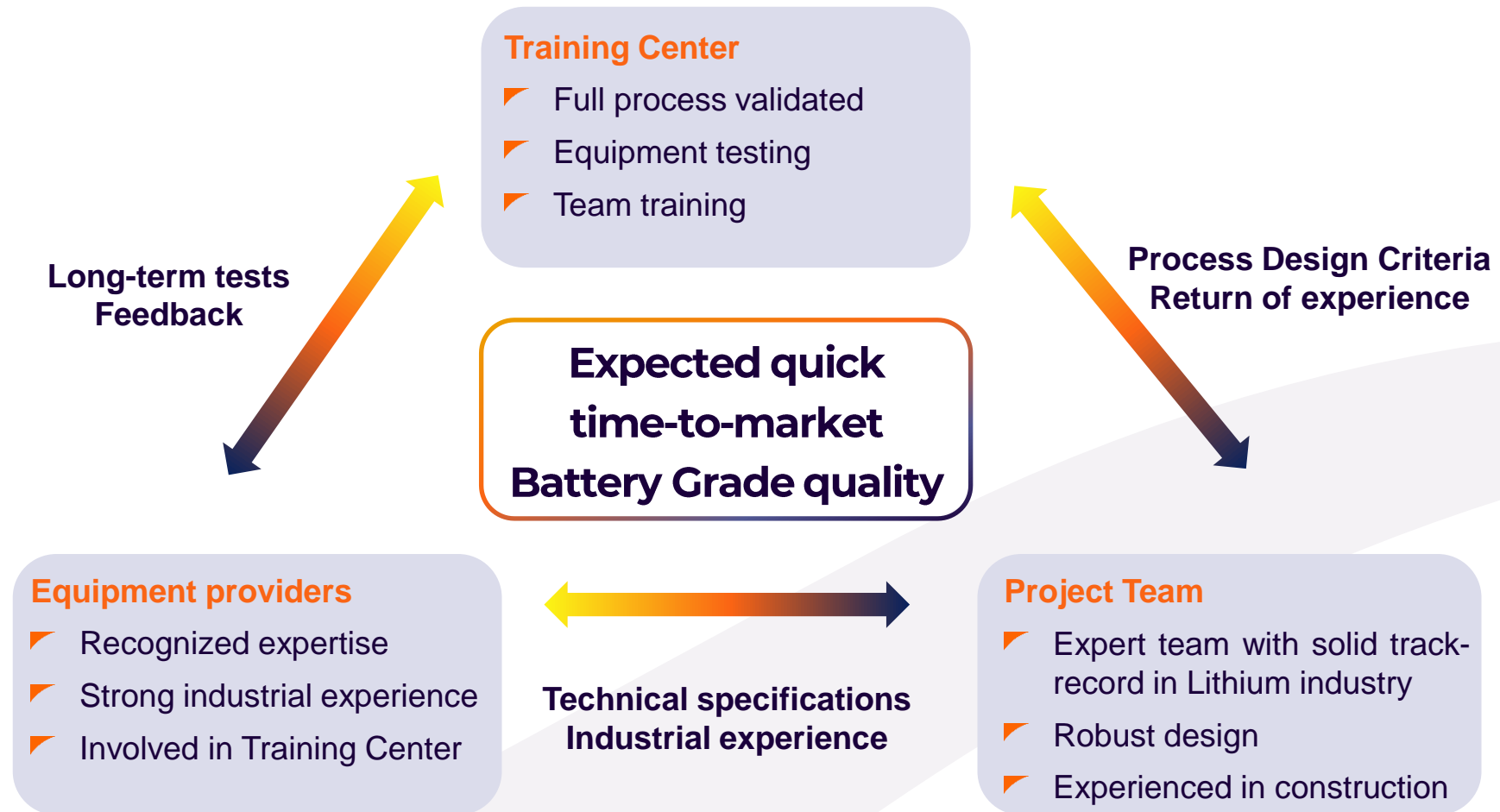


Eramine Training Center: Pilot Plant at 3,900 meters above sea, on the Andean highlands – startup in December 2019

- **Full process tested on site**, from brine pumping to battery grade Li_2CO_3 production
- **600 L/h** of raw brine feeding the DLE unit
- **2 ½ years** of continuous operation 24/7 demonstrated the performance and the robustness of the process

Highly trained team and solid return of experience

All conditions are met to achieve a short-term ramp up at full capacity...





...together with robust economics

Yearly production¹
24,000 kt-LCE²
(after ramp-up)

Cash cost (ex-works)
US\$ 3,500 per tonne
(after ramp-up)
1st quartile of the industry
cash-cost curve

EBITDA
at full ramp-up^{1,3,4}
c. **US\$ 200m**
Based on a \$12,700/t LCE⁵
LT consensus CIF price

Plant construction already engaged

Potential for further development



Very high **internal rate of return**

Eramet to become the first European company to operate a large-scale and sustainable lithium industrial complex leveraging on its own process

¹ On a 100% basis

² Lithium Carbonate Equivalent

³ Assuming a cash cost (ex-works) of 3,500 US\$/t

⁴ EBITDA inclusive of royalties and logistics costs

⁵ Spot price > \$ 70,000/t LCE

Not a project anymore... Construction has started





Q&A



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Appendices



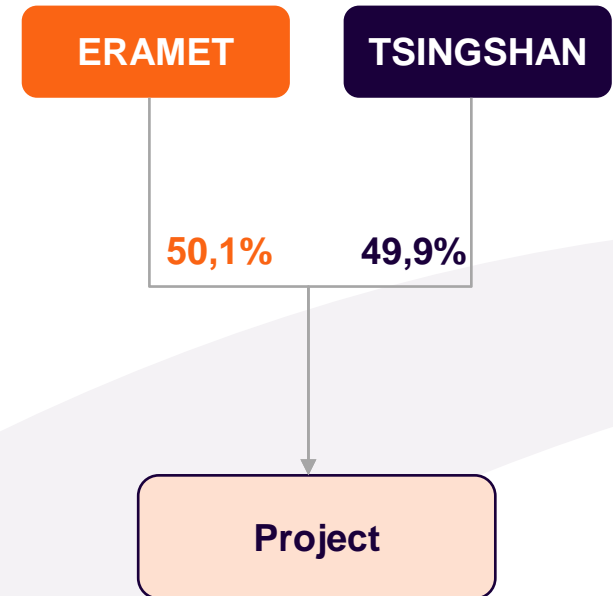


Project structure and financing

TRANSACTION WITH TSINGSHAN

- **Scope of the transaction:** construction of a **24ktpa LCE battery-grade plant** (“Project”) leveraging on Eramet’s assets in Argentina¹ and **in-house developed DLE technology**
- **US\$ 550m estimated remaining project capex²** funding requirement, **o/w:**
 - > Initial US\$ 400m **to be contributed by Tsingshan up to US\$ 375m** and by Eramet up to US\$ 25m
 - > Additional US\$ 150m (due to continuing rise in the price of materials and freight), to be contributed by both shareholders on a prorata basis (50.1%/49.9%)
- Future **commercial production to be shared on a prorata basis**

POST-FUNDING OWNERSHIP %³



Eramet to control and operate the project

¹ Including the mining rights of the Centenario, Ratones and Arizaro salars

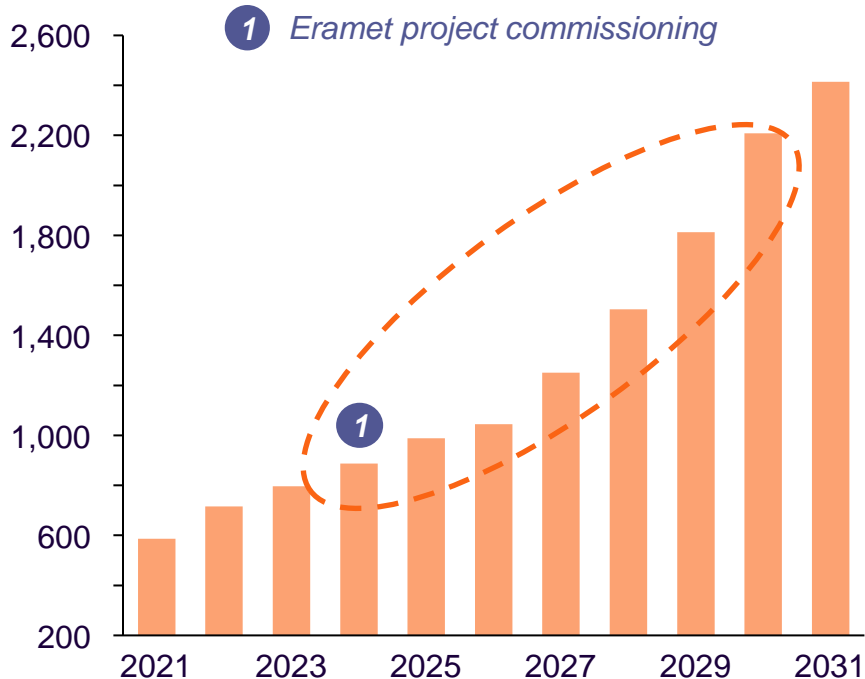
² US\$ 185 million invested by Eramet in the project until April 2020

³ Project fully consolidated in Eramet Group’s consolidated accounts

Continued strong growth momentum for lithium demand, still reflected in current prices

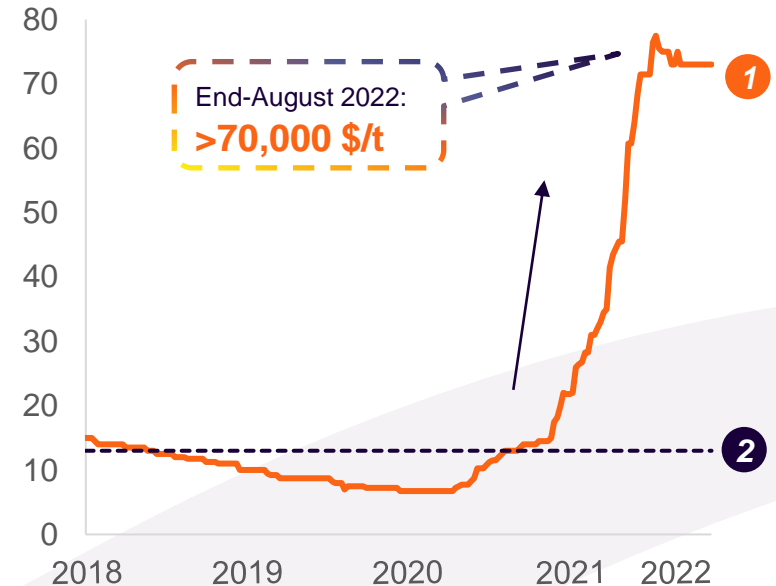


Forecasted lithium market demand¹ (in kt LCE)



Group's lithium expected market share post full ramp-up²: **c. 2.5%**

Li₂CO₃ CIF Asia (in US\$/kg LCE³)



- 1** Price increase: x10 since January 2021
- 2** Eramet long-term price assumption: 12,700 US\$ CIF per tone LCE

Poised to enter the market at the right time

¹ Sources : Eramet analysis
² On a 100% basis
³ LCE: Lithium Carbonate Equivalent

