



# VERDE MAGNESIUM

A Strategic Project in the European Union

# Strategic Projects (SPs)

CRM Act aims to incentivize and support the development of domestic supply

## Key Objectives

- 10% of raw materials consumption must be domestically mined
- 40% of primary materials (metals) must be domestically produced
- 65% of the recycled materials should be obtained domestically
- Diversification of external sourcing

## Key Advantages

- Streamlined permitting:
  - ✓ 27 months for mining projects
  - ✓ 15 month for processing projects
- Overriding public interest status, allowing SPs to take precedence over conflicting environmental or land-use regulations
- Enhanced access to public funding via IFIs, Investment Funds, Grants, State Aid

VerdeMg is recognized as a Strategic Project in the EU, and it is well positioned to take advantage of a supportive EU policies and regulatory environment

**100% dependency on imports puts EU's Industry at high risk**

● 2024e shows a consumption in Europe of ~160kt Mg metal

# Verde Magnesium Key Highlights

## Strategic metal with limited supply

- Magnesium is a strategic metal. Its market has limited supply alternatives thus offering a huge growth potential.
- Significant inbound interest from leading global OEMs, alloy manufacturers, and metal traders (combined revenues \$500+bn)
- EU and US have identified Mg as a strategic raw material and have put into place legislative and funding to support expansion of domestic supply and processing

## World's largest known brucite deposit

- Verde Magnesium ("VerdeMg") has secured mining rights to the world's largest known brucite deposit in Budureasa, western Romania, located at the crossroads of Europe with strong infrastructure and transportation links to key customers ("MineCo")
- Brucite is a rare but extremely attractive feedstock for Mg metal production

## Successful industrial tests

- Successful industrial tests have validated potential for green Mg metal production from brucite
- We are developing a Magnesium smelter in partnership with leading clean technology providers nearby to the mine site in Romania ("SmelterCo")

## Highly regarded team

- Highly experienced management team, strong local partners supported by an international board
- Amerocap, the sponsor, is an investor specialized in energy and natural resources
- Selected as an EU Strategic Project in 2025

## Multiple profit streams

- Magnesium metal forecasted to generate substantial cash flow
- Derivative products will also generate profits even on standalone basis:
  - MineCo operations (selling aggregates, mineral binders, brucite concentrates)
  - Brucite processing can deliver a variety of green products addressing sustainability needs in many markets/industries: flame retardants, soil amendments, chemical compounds of magnesium (oxide, hydroxide, sulfide, chloride, etc)

# Business ecosystem

Verde Magnesium represents an unique industrialisation project that will create a new business ecosystem in Romania and EU, will generate solid tax revenues, long term reliable development for local communities.

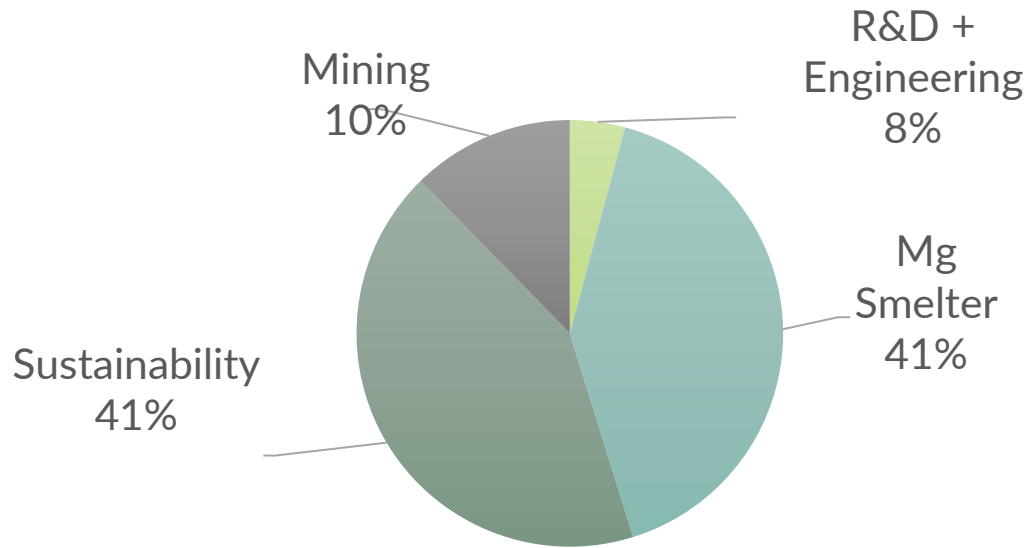


- A new business ecosystem at EU level
- Sustainable approach
- In line with emerging trends in global economy
- Enable a constellation of investments via vertical & horizontal integration and diversification
- Infrastructure
- Jobs creation and preservation
- New pillar of economic growth
- Education
- Urbanization

# Impact

VerdeMg envisages large investments over the next 10 years in building an **integrated value chain on Romanian territory**: state-of-the-art & sustainable mine, Mg smelter, infrastructure. Such investment will address up to **20% of Mg metal demand of EU by 2030** and **up to 50% by 2036** and will generate significant benefits for the local community and the Romanian State.

## INVESTMENT PLAN of ~\$1bn over 10 years



## STATE AND COMMUNITY BENEFITS



**\$1 – 3 bn**

Over 20 years in national government revenues



**\$0.5 – 1.5 bn**  
**\$5 – 10 bn**

Direct & Indirect investments



**200 – 1,000**

Direct jobs



**Up to 10,000**

Indirect jobs



**Sustainable activity**

Reliable long-term development

# Key steps on VerdeMg roadmap to creating the global leading magnesium metal producer

Ore  
Production  
&  
Mg Smelter

Strategic  
Project  
in EU

- ❑ **MineCo & SmelterCo. Strategic partners**
  - ❑ Secured customer and government validation
  - ❑ Secured local and international technology partners
  - ❑ *Secure additional customers across new end market applications*
- ❑ **MineCo. Mining license, permitting to recommence extraction operations**
  - ❑ Secured mining license
  - ❑ Existing open quarry, haul road, ore processing platform
  - ❑ Known resources & reserves
  - ❑ *Exploration program to confirm upside: bigger reserves of brucite, new reserves of polymetallic ores*
  - ❑ *Quarry reopening in the next 12-16 months to mine already proven reserves*
  - ❑ Brucite concentration solution under development
- ❑ **SmelterCo. Progress smelter to construction phase / “ready to build”**
  - ❑ Pre-Feasibility Study executed
  - ❑ Industrial tests executed
  - ❑ *Complete Feasibility Study and basic engineering design in 2025*
  - ❑ Business Plan for green products: Magnesium Oxide, Magnesium Hydroxide, Mineral Binders, Fertilizers, Flame Retardants, etc
  - ❑ *By-products marketing plan*

Significant value  
created to date

## Legend

- ❑ Executed
- ❑ To be executed

# VerdeMg plans to integrate circular approach to ensure net zero metal

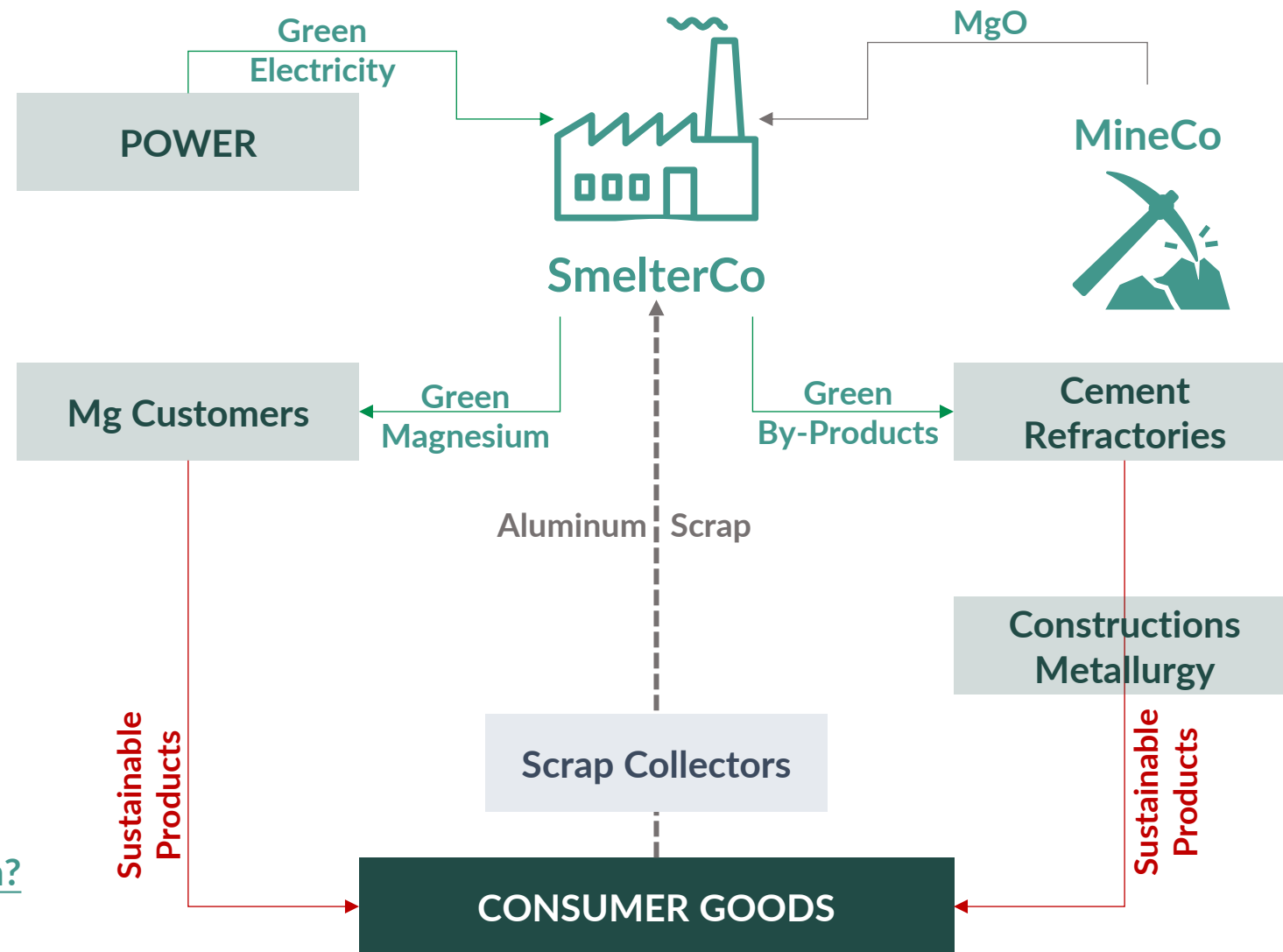
## Mg Smelter feeding from own Mine

- MineCo's feedstock type has unbeatable efficiency advantages;
- Mg smelter will also close Aluminum recycling loops
- Al scrap was successfully used as main reductant, reducing the energy intensity and CO<sub>2</sub> footprint of the produced Mg
- Green by-products for cement and refractory materials industries, enabling them to reach their sustainability targets

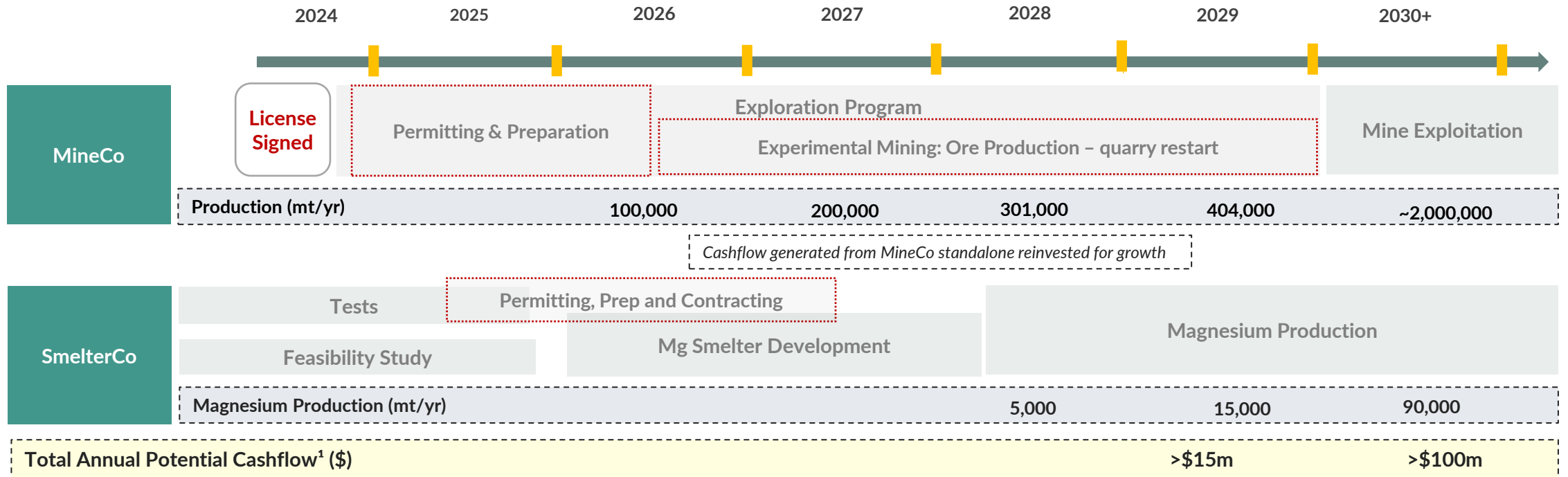
[What is Magnesium?](#)

[Who is Verde Magnesium?](#)

CTRL + Click  
to view on YOUTUBE



# Verde Magnesium Development Timeframe



(1) Assuming \$5K / MT annual price



**MineCo  
Extraction Project**

---

# MineCo Extraction Project Overview

## Largest known brucite deposit based in western Romania

- The License allows mining production. Existing quarry is planned to be restarted in 2026.
- Largest known brucite deposit globally. Located in Western Romania.
- > 50m tones resources & reserves with a high MgO content (>22%)
- Existing open quarry (DPB\_1) can supply feedstock for a 30kt/yr Mg smelter for 20 years, but expansion potential based on known proven reserves could support **increasing smelter capacity by 3x to 90kt**

## Proven Reserves

- Resources & reserves report was executed by an independent Romanian mining institute and was certified by NAMR (the National Agency for Mineral Resources of Romania)
  - This report was also included in the National Geologic Fund and in the National Registry for Resources and Reserves of Romania, confirming a **high degree of confidence**
- VerdeMg has conducted extensive due diligence on the old mine and a recertification process for the resources & reserves is undergoing

## Infrastructure and Permitting

- Brownfield site (open quarry) with multiple exploration galleries
- Existing preliminary ore processing platform, industrial road by-passing the village, connecting the quarries to the preliminary ore processing platform
- Project was fully permitted for mining. Permits and authorizations only need to be reinstated. Already applied for Environmental Permit
- Local community has been supportive, and we believe no issues in maintaining Verde's social license to operate
- ESIA execution undergoing

## De-Risking

- The brucite ore can be processed to produce brucite concentrates and various saleable mining products
- The deposit may also evolve as an alternative source for polymetallic ores. Exploration works undergoing
- Granite and limestone are also sold as construction materials

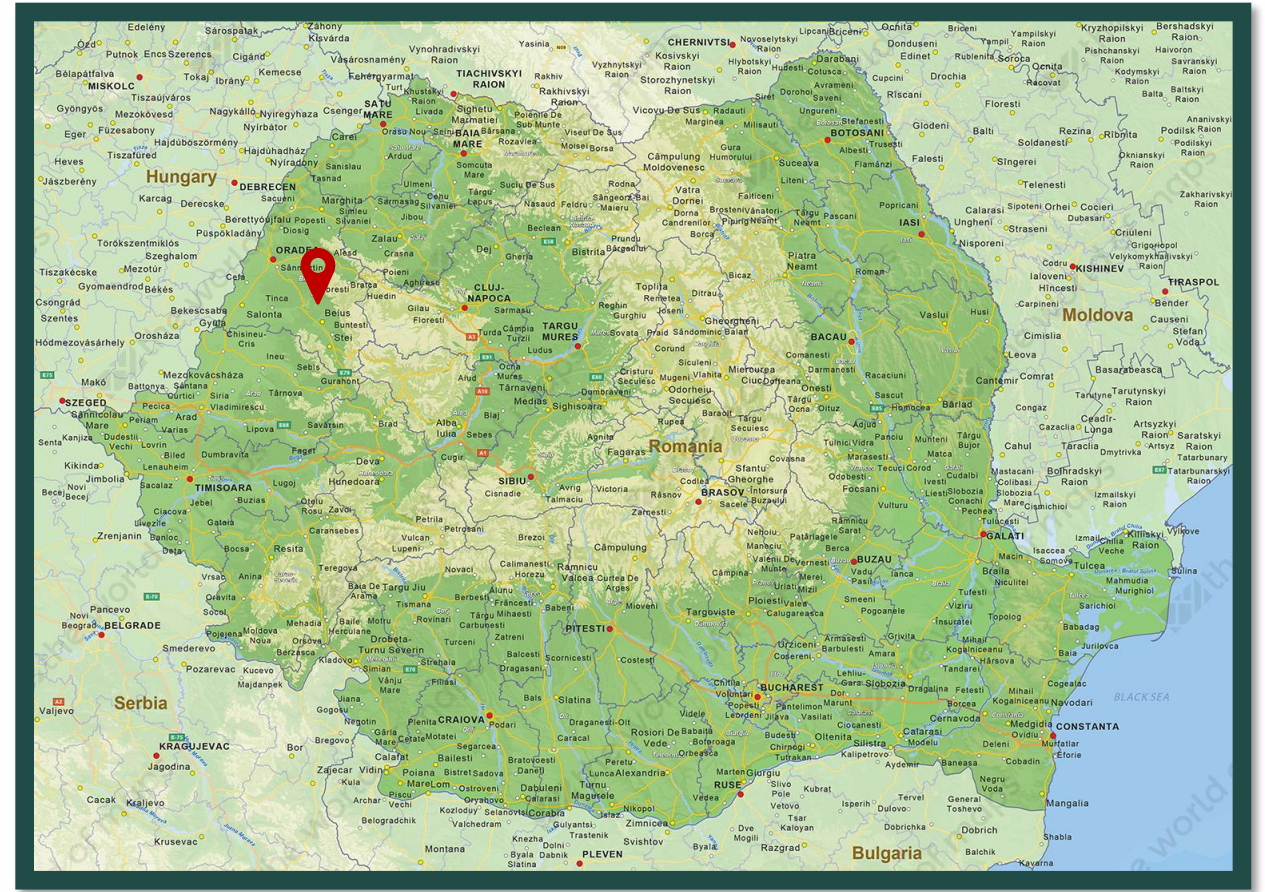
# VerdeMg secured mining rights for the world's largest brucite reserve

World largest brucite reserve, located in western Romania, Budureasa, 75 km SE of Oradea, an industrialized city located near the border with Hungary.

An airport, highways and railways link Oradea to the EU.

Also located 12km NW of Beius town (63 km SE from Oradea), with a railway link.

The mining site is connected to the electricity grid.



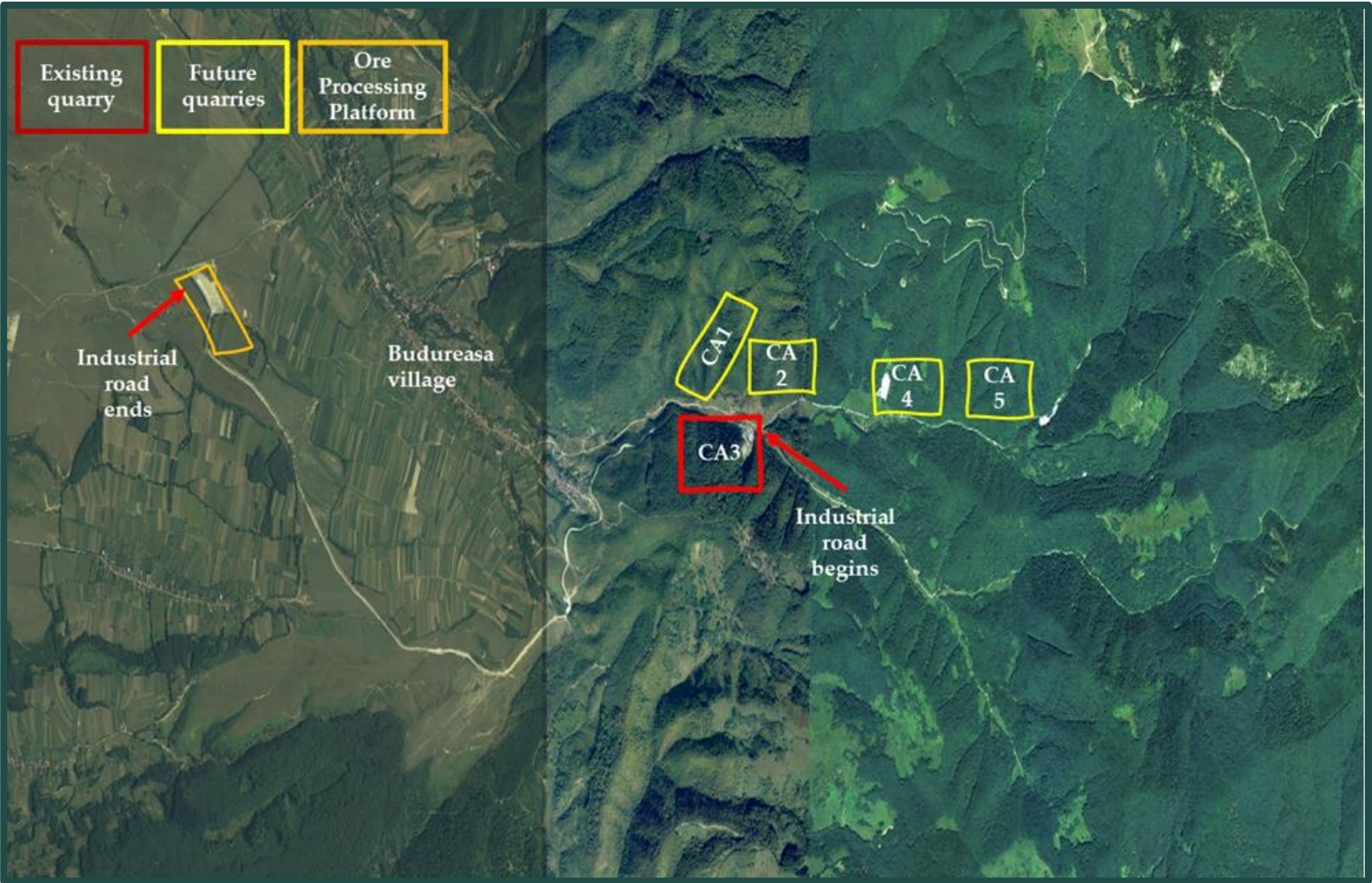
# Existing site has good local infrastructure with expansion potential

Already open quarry

Preliminary processing platform

Industrial road by-passing the village that connects the mine with the preliminary ore processing platform

Future quarries to be opened during the exploitation phase (underground mining is investigated for future exploitation to minimize environmental impact).



# Proven Reserves

**Resources & Reserves:** World's Largest Brucite Reserves  
**Quantity:** more than 50 mil tones  
**Quality:** an average content of + 22% MgO

Resources & reserves report was executed by a reputable Romanian mining institute. It had been accepted and certified (as per National Standards) by the National Agency for Mineral Resources (‘NAMR’) and included in the National Geological Fund and Romanian National Resources and Reserves Registry.

Recertification in line with international standards is undergoing.

This provides a high level of confidence that existing reserves are a reliable feedstock source for a minim 30kt/yr Mg smelter for 20 years.



# Photos of the site



1<sup>st</sup> open pit quarry



Preliminary Processing Site



Access Road



An aerial photograph of an industrial processing plant, likely a smelter, situated in a vast, flat, arid landscape. The plant consists of several long, white, rectangular buildings with dark roofs, arranged in a line. There are also smaller structures, a paved area, and a small pool of water. The surrounding terrain is dry and brown, with some sparse vegetation and a dirt road winding through the area. The sky is clear and blue.

# SmelterCo Processing Project

---

# SmelterCo Processing Project Overview

## Strong EU support for creation of domestic processing capability

- EU has become totally reliant on Mg metal imports
- Under current business plan, SmelterCo will meet up to **20% of the EU's forecasted demand** for Mg metal in the medium term and up to **50% in the long term**
- SmelterCo will be fully supplied by MineCo's brucite reserves
- Primary focus will be on Mg metal production, but other by products will be generated through operations (aluminum-magnesium spinel, calcium aluminate, and dry ice)
- US has also become totally reliant on Mg metal imports recently as US Magnesium permanently shutdown its operations

## Feasibility Study preparation underway

- SmelterCo executed the industrial test in a Chinese industrial plant. **Test confirmed the production of a high-quality green Mg metal from MineCo's brucite ore.**
- Banking feasibility study is envisaged to be finalized in 2025, as well as the basic and detailed design for the Smelter
- ESIA execution is undergoing
- MOU's already signed and under negotiation with blue-chip industrial customers. EC provides support to close off-take agreements with EU industrial groups.

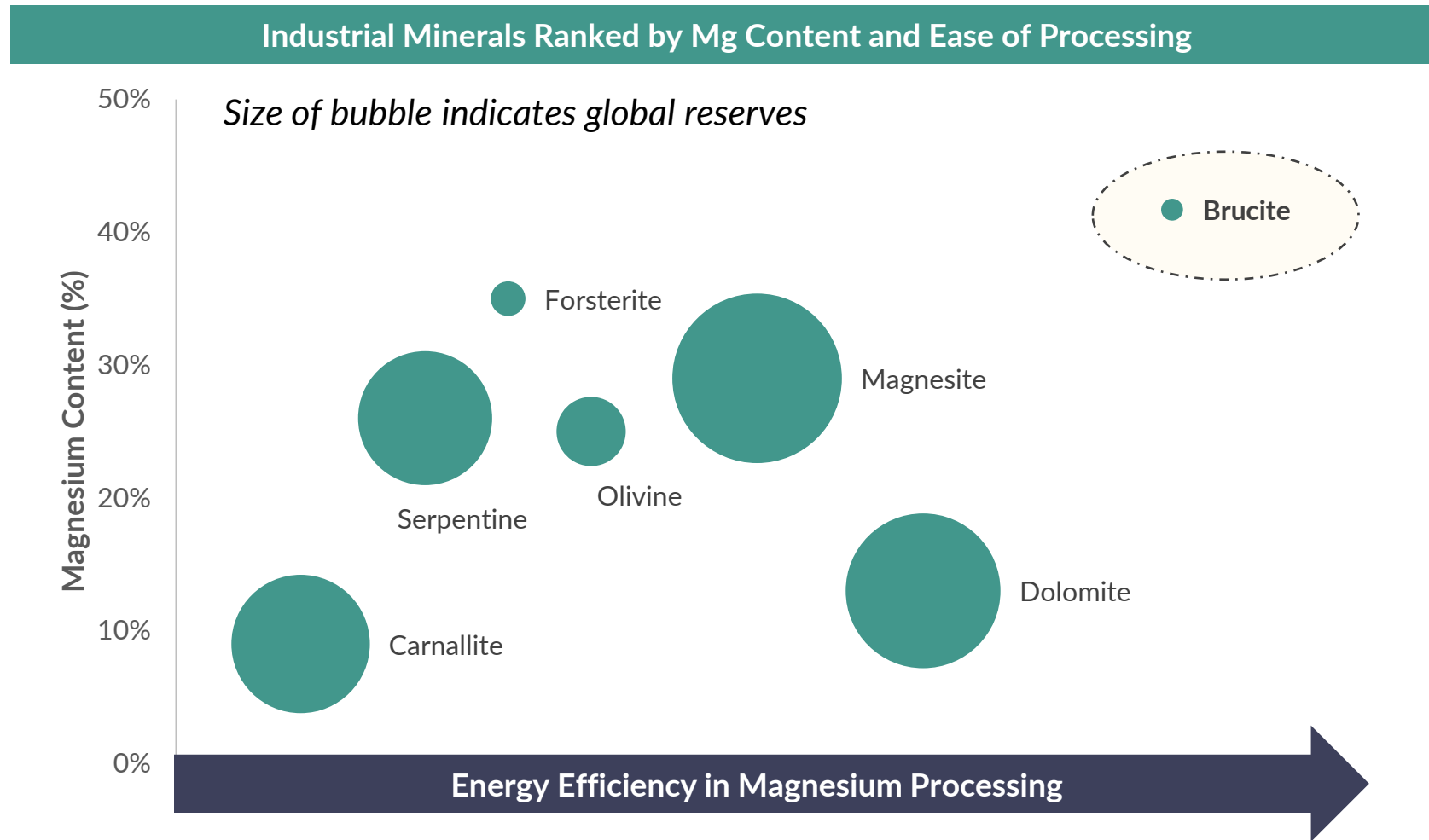
## Highly efficient operations will create competitive advantage

- Brucite is a rare feedstock with attractive qualities that will create significant competitive advantages for Mg metal production:
  - Highest Mg content among all Mg ores
  - Higher energy efficiency (+30%) in processing supporting a realistic path towards zero carbon footprint for Mg metal and by-products
- These cost advantages should provide significant differentiation versus existing magnesium processing capabilities and competitive projects today

## De-Risking

- Brucite concentrate and other mining products can be processed to produce various chemical compounds of magnesium
- These chemical compounds can be further processed in various products: soil amendments, fertilizers, hygiene treatments for big livestock, feed, flame retardants, mineral binders, gas desulfurization, water treatment, etc.
- These products will offer a sustainable supply alternative for a variety of industries: construction materials, agriculture, cables, refractory materials, environmental treatment solutions, marine transportation, paint, etc.

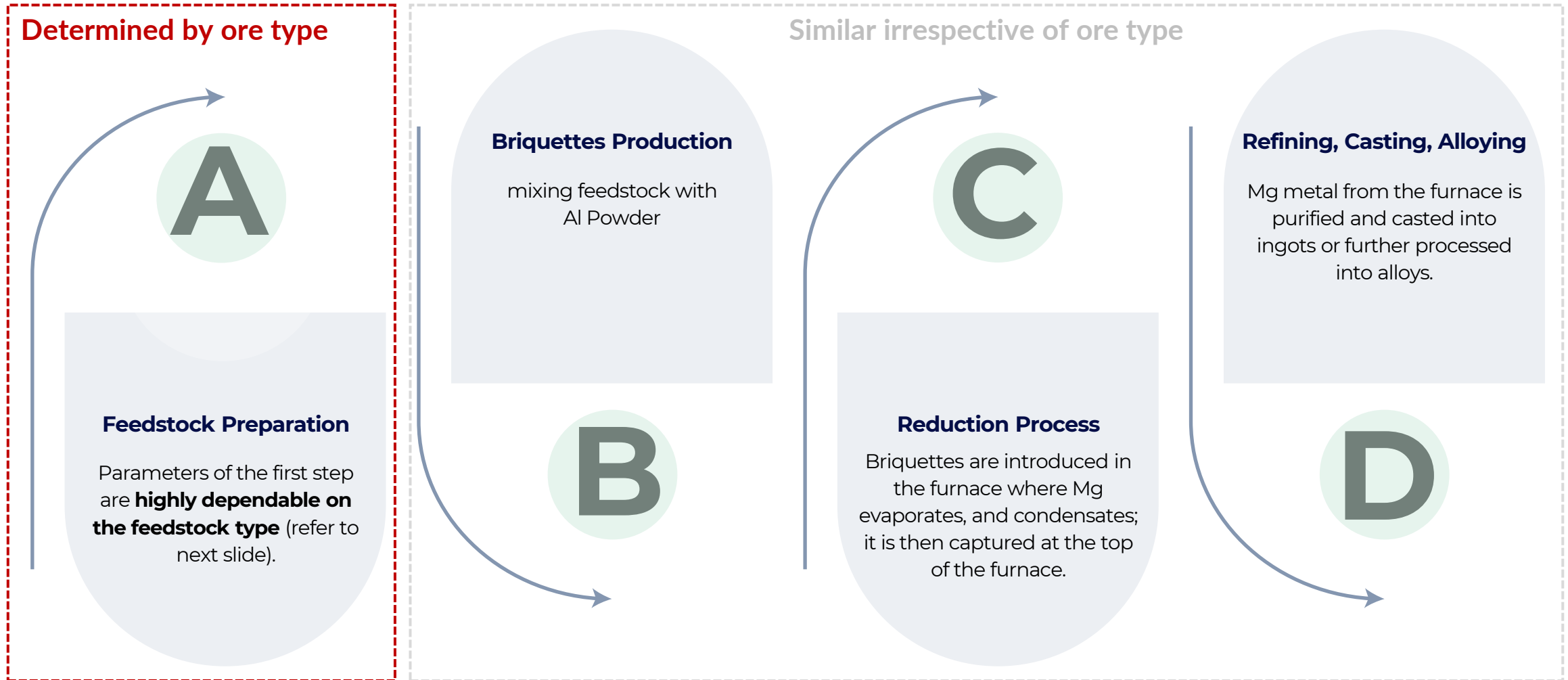
# Brucite is a rare industrial mineral with highly attractive qualities as a feedstock for magnesium metal production



Source: British Columbia Ministry of Energy, Mines, and Petroleum Resources; VerdeMg estimations.

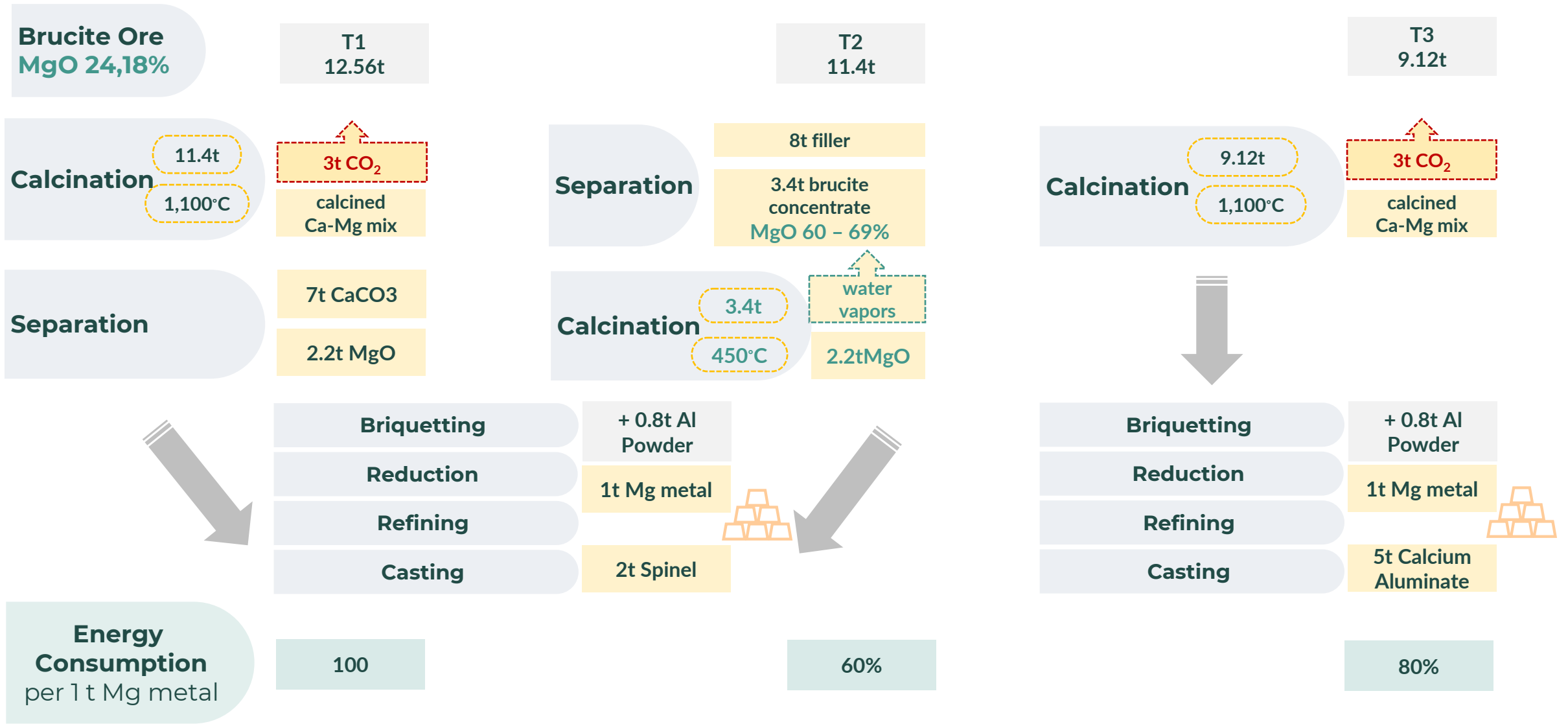
# Magnesium metal production – Aluminothermic Reduction Process

Depending on the type of ore, the Mg metal production process is slightly different. **Brucite ore has a big competitive advantage:** the weight of calcined material is 3x lower; calcination temperature is 2.5x lower; zero CO<sub>2</sub> emissions; smaller furnace required.



# Magnesium metal production – Pilot Industrial Test

inputs  
outputs

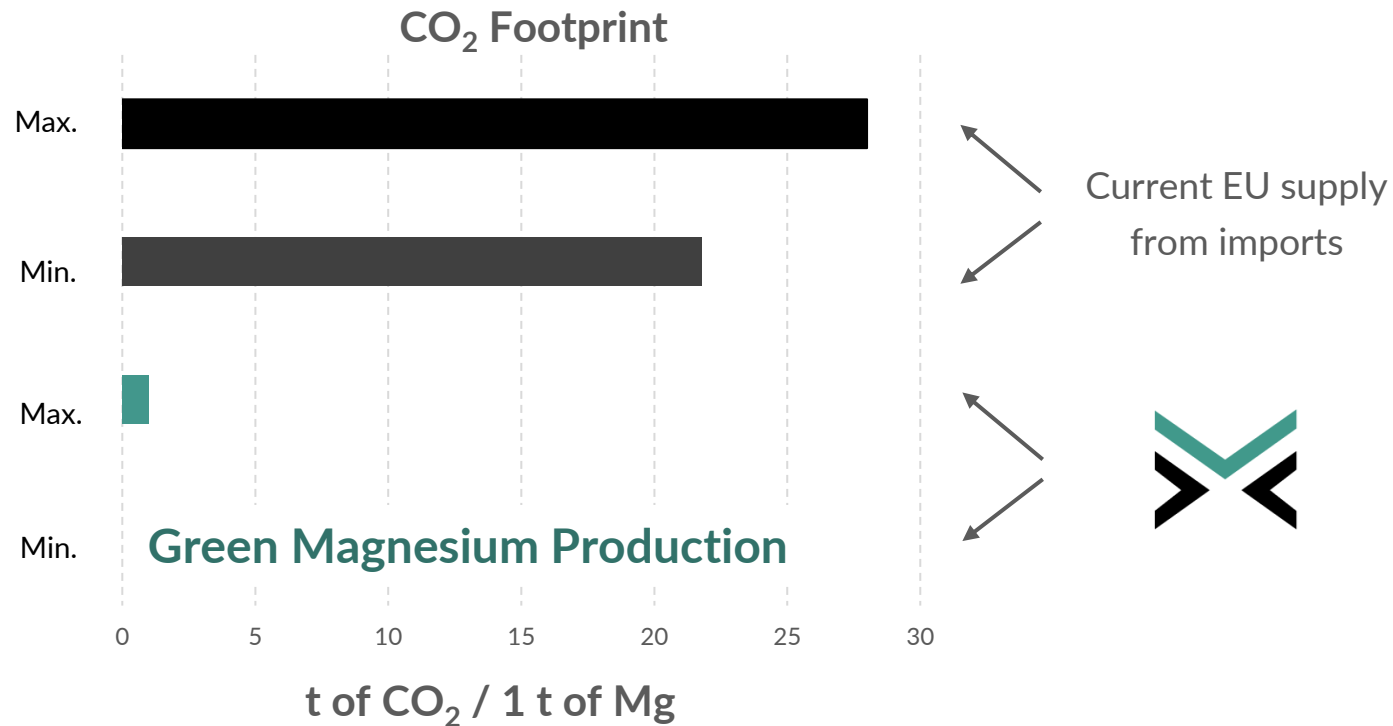


!!!

!



# ALT – sustainable technology



The aluminothermic reduction technology (ALT), while a known process, has not been implemented at industrial level, being unable to compete with the Pidgeon process, due to higher Capex and Opex.

Under the new paradigm of climate change and the need to create shorter and more robust supply chains for the EU industry, the technology becomes feasible.

- The aluminothermic reduction technology confirmed direct emissions below 3 mt of CO<sub>2</sub> / 1 mt of Mg during tests. This can be further reduced in various ways below 1 t of CO<sub>2</sub> / 1 t of Mg.
- A 90kt/year Mg smelter will generate **3.5 mm t/yr of CO<sub>2</sub> savings**:
  - ✓ 2.5 mm t compared with imports
  - ✓ 1.0 mm t by using Al scrap as reductant

# SmelterCo. Industrial Test



# Environmental, Social and Governance



# Sustainability & Social Impact

Verde Magnesium aims to have the highest standards of ESG and Sustainability

**EU's Green Deal** - Plan to further cut emissions by at least 55% by 2030. By 2050, Europe aims to become the world's first climate-neutral continent.

- Verde's Mg supply will green and accelerate electrical vehicles development

**EU Industrial Strategy** - Twin transition towards climate neutrality and digital leadership in an ever-changing world.

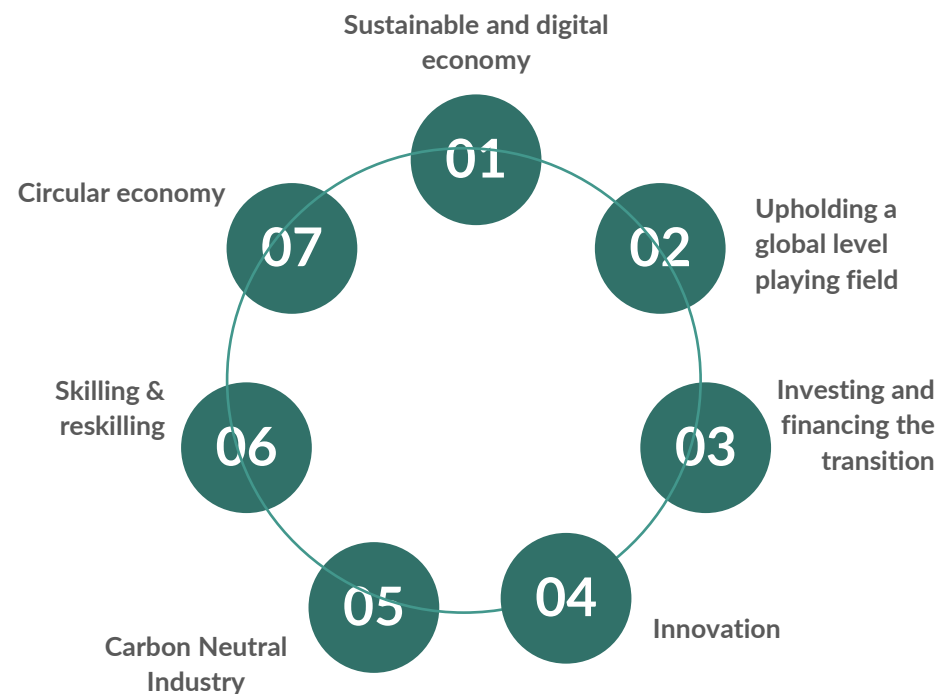
- Verde's Mg production will insource resilient industrial activities to the EU

## CRM Act

- Verde will radically reshape one of the EU's most exposed SRM (Mg metal)

## VerdeMg's social impact

- Creation of new and well paid direct (c. ~1,500) and indirect (up to 10,000) jobs.
- Incentivize further public and private investments for development of the local community
- Enhance development of local infrastructure, improve the quality of education and culture
- Enhance development of current activities: tourism, agriculture, forestry, etc.
- Promote and secure the continuation of local traditions: specific agri products, handcraft works, etc.
- The transformation of the local small & isolated village and its small underdeveloped local community into a niche top industrial center within EU industrial ecosystem.
- 5-10x investment multiplication factor on long term is generally estimated for this type of projects.



# ESG - MineCo

Global awareness of climate change, the “circular economy”, biodiversity, sustainability, human rights and the growing importance of ESG policies are, collectively, shining a spotlight on responsible sourcing in global metals industries.

The target is to extract the ore and prepare the feedstock for a local Mg smelter, in an environmentally friendly manner.



- An update of the ESIA in line with EBRD performance standards is undergoing. It will be executed in two stages which are in line with the operational plan; 1<sup>st</sup> stage to be finalized May/June 2025, 2<sup>nd</sup> stage to be finalized Q2 of 2026.
- MineCo will implement a **comprehensive approach to monitoring, preventing, and minimizing environmental impacts**, which will be documented and reported in compliance with **Romania’s Environmental Protection Law** and with:
  - **Towards Sustainable Mining** (“TSM”) standards
  - **EU Directive 2011/92/EU** on the assessment of the effects of certain public and private projects on the environment

- Fully permitted in the past, including the social license to operate; thus, we do not expect to encounter significant opposition. The initial permitting process was carried out by the team of experts contracted by VerdeMg. Re-authorization should be facilitated by existing documentation, expertise and the success of the initial authorization.
- **Minimization strategies** will focus on restoring the ecosystem post-extraction. The Project will develop a detailed reclamation plan to rehabilitate mining sites, including reforestation and soil stabilization efforts.
- Our business plan includes support for local **community projects**. Thus far, MineCo financially supported online education during pandemic, the construction of a chapel in the village, sponsored a local sports event.
- New rounds of discussion with the local community will follow shortly. MineCo is involved to better understand the needs of the community aiming to engage in local projects such as: educational, health, sports and support entrepreneurial initiatives.

# ESG - SmelterCo

Global awareness of climate change, the “circular economy”, biodiversity, sustainability, human rights and the growing importance of ESG policies are, collectively, shining a spotlight on responsible sourcing in global metals industries.

The target is to produce green Mg metal locally, in the EU, in an environmentally friendly manner.



- ESIA in line with EBRD performance standards is undergoing.
- SmelterCo will implement a **comprehensive approach to monitoring, preventing, and minimizing environmental impacts**, which will be documented and reported in compliance with **Romania’s Environmental Protection Law** and with:
  - **UN Sustainable Development Goals** standards; or
  - other relevant sustainability standard in processing industries

→ VerdeMg’s project will impact the local communities through various channels. Once we’ll select the location of the SmelterCo, we will engage consultations with the local community regarding:

- their concerns and needs
- creation of direct and indirect jobs
- training for future jobs
- infrastructure
- local initiatives
- future projects

# Team



# Highly experienced management team with strong international board

World class management team with experience in big-auto procurement, mining, and rare track-record in Mg metal supported by a board and sponsor with diverse international corporate and governmental connections

## BOARD

**Dr. Bernd Martens**   
*Chairman of the Board*

**Dr. Andor Lips** 

**Sorana Baci** 

**Jonathan Winer** 

## EXECUTIVES

**Alexandru Rosu**   
*CEO*

**Ilhan Goknel**   
*VP Metallurgy*

**Gelu Maracineanu**   
*CTO*

**Serghei Gheorghe**   
*Commercial Manager*

## SPONSOR

**Jacques Tohme** 

**Katherine Ireland**  



**ING** 



AUTORITATEA NAȚIONALĂ DE REGLEMENTARE  
ÎN DOMENIUL MINIER, PETROLIER ȘI AL STOCĂRII  
GEOLOGICE A DIOXIDULUI DE CARBON



**esan**



**Goldman Sachs**

**Centerbridge**



# World class Board of Directors with diverse experience



**Dr. Bernd Martens**

- Audi AG, Board of Management, Head of Procurement and IT 2012-2020
- Volkswagen AG, SVP of New Product Management (within Procurement), 2005-2012
- Volkswagen do Brasil, Director of procurement, 2002-2005  
Director of Product Planning and Product Management, 1997-2002
- Roland Berger, Project Manager in Automotive, 1995-1997
- Mercedes-Benz AG, PhD student
- University of Kaiserslautern  
Studies in Industrial Engineering



**Dr. Andor Lips**

- European Commission. External Expert, 2010 – 2020
- Eldorado Gold. European Strategy & Corporate Sustainability Manager
- Lydian Intl. Technical Director
- ING Bank NV. Senior Banker mining finance
- Commodity Discovery Fund. Fund Manager
- PhD and MSc in Geology from University of Utrecht, the Netherlands, Fellow of the Institute of Mining Minerals and Metallurgy



**Sorana Baci**

- EBRD, Senior International Advisor, 2017-present
- World Bank, External Advisor
- Secretary of State, Romanian Ministry of Economy, 2015-2016
- OMV Petrom, Strategy&Corporate Development Director
- Porsche Financial Group, Board Member
- ING Bank, Investment Banking & Strategy, 1997-2004
- BCom, Academy of Economic Studies Bucharest, MA Economic Policy Management, McGill University Canada



**Jonathan Winer**

- Regulatory attorney specializing in national security law and cross-border regulation
- Senior Counselor at APCO
- Former U.S. Special Envoy for Libya
- Former U.S. Deputy Assistant Secretary of State for International Law Enforcement
- In 2016, received the highest award granted by the Secretary of State, for “extraordinary service to the U.S. government”
- Former Counsel to United States Senator John Kerry

# Management team with significant magnesium and metals experience



**Alex Rosu**  
CEO

- Alex Rosu has 20 years of experience in natural resources sector, serving as a regional head for Amerocap and deputy CEO for a European refinery. Alex has good business development experience in emerging markets having negotiated large commercial and M&A contracts in energy and commodities.
- BA, Academy of Economic Studies, Bucharest



**Ilhan Goknel**  
VP Metallurgy

- Ilhan is a mining engineer with great expertise in non-ferrous mineral projects, from his 30+ year career.
- He was the former Project Manager and Plant Manager of the Esan, Turkey Magnesium Mining and Processing; the sole such asset built outside China in the last 20 years.
- MSC, Mining Engineering, Technical University of Istanbul and RWTH Aachen



**Gelu Maracineanu**  
CTO

- Gelu has over 30 years of international experience in mining projects. He was the former GM of the fully permitted predecessor project to Verde Magnesium.
- Gelu is also a former President of NAMR with great knowledge of Romania's geology, industry legal frame, NAMR procedures.
- PhD, Petrosani Mining University, Romania



**Serghei Gheorghe**  
Commercial Manager

- Serghei has 30 years of expertise as a top commercial executive mainly in primary metals (non-ferrous) production and mining.
- He was the Procurement Manager and Board Member of Romanian Aluminum Smelter, VIMETCO-ALRO, being also involved in the alumina refining and bauxite mining activities of the Group.
- DSC Structural Engineering - Brasov University, MSC Engineering - Bucharest Polytechnic University

# Meet the Financial Sponsor & Project Promoter

## About Amerocap (VerdeMg's financial sponsor)

Amerocap is a differentiated, private equity investor with emphasis on energy, natural resources and defense sectors.

### Investment Focus

- underinvested assets / areas
- de-risking complex, special situations
- energy, mining, defense

### Investment focus shift from Oil & Gas to CRMs

Amerocap's long roots in Romanian natural resources led it to sponsor the launch of Verde Magnesium, first by investing in the Magnesium project, and subsequently developing graphite and rare earths under the same team and strategy.

### Relevant expertise in natural resources projects

Amerocap has established itself as a credible acquiror or commercial partner to some of the largest private energy groups and governments around the world:



## VerdeMg's Metallurgy VP developed the sole Mg Smelter outside China this century

- Our VP Metallurgy, Ilhan Goknel, was the Project Manager and Plant Manager of Esan, Turkey, which developed the sole Mg smelter built outside China in the last 20 years (real picture below).
- Currently, the Esan plant is operating, producing and selling 15kt of Mg p.a. primarily to the US.

### About Us

- World class board and management team with experience in big-auto procurement, mining, and rare track-record in Mg
- US/UK equity sponsor with track-record in building natural resources ventures, having transacted with energy supermajors and Western governments
- \$400m in further institutional financial backing
- EU backed financing under discussion (EIT Raw Materials, ERMA)

**Verde Magnesium LTD**

16 Berkeley Street, Londra,  
W1J 8DZ, UK

Jacques Tohme, co-founder / sponsor  
jtohme@amerocap.com

**S.C. Verde Magnesium SRL**

SVirgil Plesoianu 84, Sector 1,  
Bucuresti, Romania  
[www.verdemg.com](http://www.verdemg.com)

Alexandru Roșu, CEO  
arosu@verdemg.com



# Contact

This document is being furnished on a confidential basis solely for the information of the person to whom it has been delivered on behalf of Verde Magnesium SRL. Each person accepting this document agrees to return it to Verde Magnesium SRL promptly upon request. Any distribution or reproduction of all or any part of this document or divulging its contents other than as specifically set forth herein is unauthorized. This document is not an offer to sell and is not a solicitation of an offer to subscribe to any investment(s) or vehicle structure.

**The contents of this document should not be considered as investment, legal or tax advice. In making an investment decision, the recipient must rely on their own examination of the opportunities and the terms of any future offering, including the merits and risks involved.**