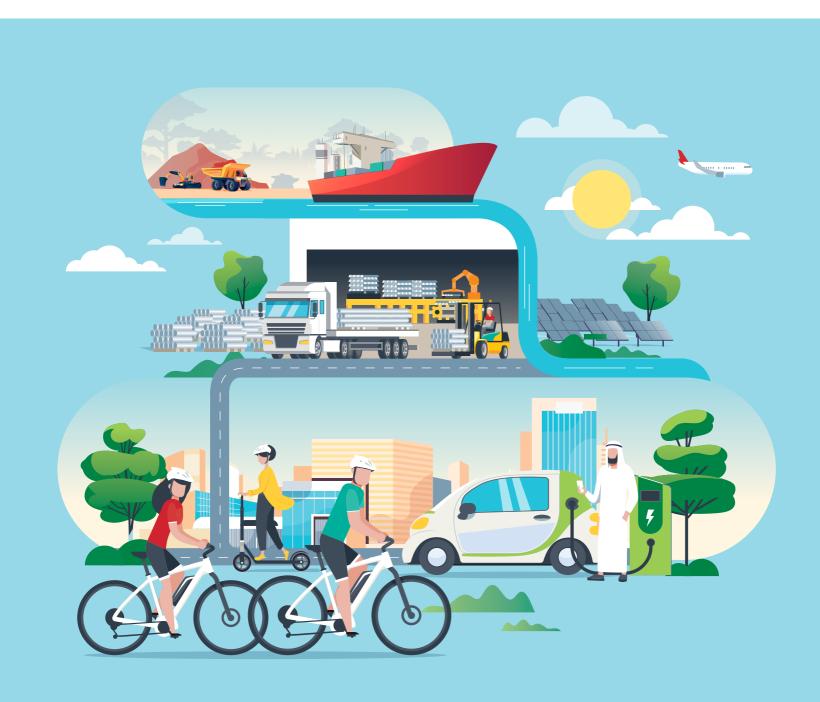




EGA 2022 Sustainability Report

Together, innovating aluminium to make modern life possible



Together, innovating aluminium to make modern life possible

Aluminium makes modern life possible, from the smartphone in your hand to the plane you fly in, to the buildings where you live and work. As economies grow and living standards rise, industry experts expect that demand for aluminium will increase. The unique properties of aluminium, its strength, lightness, durability, conductivity and infinite recyclability make it the ideal solution for many of the challenges that we need to address for a more sustainable future.

But the production of aluminium is not without the potential for negative impacts. At EGA, we recognise that in order to be part of a sustainable future, it is important we consider both how aluminium is used and how aluminium is made.

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01



Introduction



Introduction

About this report

Welcome to Emirates Global Aluminium's 2022 sustainability report.

All organisations must do their part to support a resilient environment and society. Businesses around the world can be instruments of change having a key role to play in safeguarding our planet's systems and social cohesion. Now, more than ever, transparency around sustainability efforts is business critical.

At EGA, we recognise the need for transparency in order to build stakeholder confidence and substantiate claims related to our sustainability performance. This is why EGA publishes an annual sustainability report.

This report has been prepared in accordance with the Global Reporting Initiative (GRI) Standards¹ and disclosure requirements identified by the Aluminium Stewardship Initiative (ASI) Performance Standards². We have also considered disclosure recommendations of the Task Force on Financial Disclosures (TCFD)³.

Although 2022 is the focus of this report, in some instances we have also referred to data pertaining to key aspects of our business from 2018-2021 in order to illustrate trends in performance⁴.

To ensure appropriate content and data quality, the professional auditing firm Bureau Veritas independently assured disclosures from selected key performance areas, including our most material sustainability topics. Bureau Veritas's assurance statement is provided in the appendix of this report.

For more information on EGA's sustainability activities and performance, please contact sustainability@ega.ae.

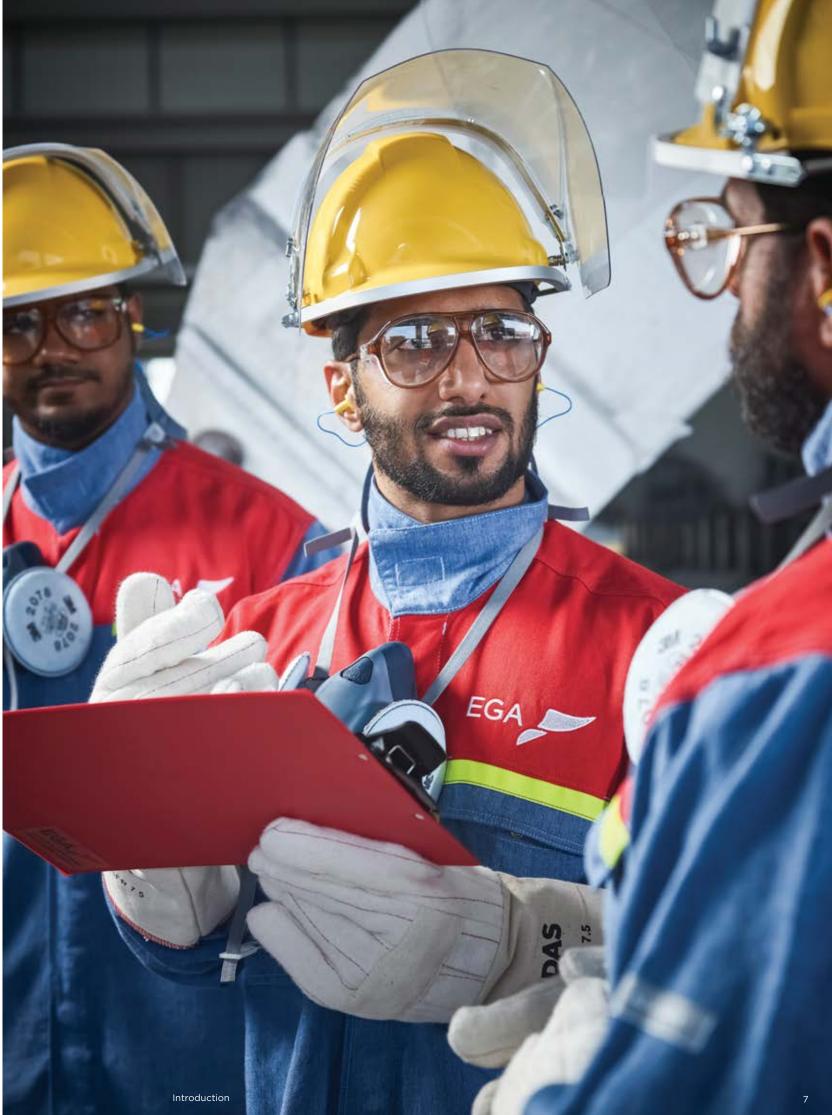
Our report covers the three aspects of sustainability vital to meeting the expectations of our stakeholders and ensuring a sustainable business, safeguarding the environment, social responsibility and good governance.



¹ GRI is an independent, international organisation that helps businesses and other organisations take responsibility for their impacts by providing a global common language to communicate those impacts.

² The ASI Performance Standards define environmental, social and governance performance standards for sustainability issues specific to the aluminium value chain.

³ The Task Force on Climate Related Financial Disclosures (TCFD) recommends specific climate related disclosures associated with governance, risks, opportunities, management approach and relevant metrics and targets. ⁴ EGA has published an annual sustainability report every year since 2018, each report is available on our website at: https://www.ega.ae/en/sustainability/our-approach





Managing Director's statement

for future generations.

Throughout 2022, we were all witness to the consequences of climate change. From the flooding and monsoon rainfall in Pakistan to wildfires in Europe, records continue to be broken.

The changing climate is bringing about a disturbing pattern of more frequent and severe storms, heatwaves, droughts, and other extreme weather occurrences spanning every continent. These events leave a trail of life-altering devastation in their wake, impacting individuals, infrastructure, and ecosystems.

Furthermore, troubling patterns persist in terms of global biodiversity decline, entrenched poverty, and gender disparity.

All of these changes represent threats to our planet economic stability and the legacy we leave for future generations. Every organisation across every industry must choose to lead, be led or fall behind in addressing these challenges.

Working towards net zero greenhouse gas emissions and fully aligning our organisation with the global sustainability standards for the aluminium industry remain commitments that are shared and that resonate deeply with our senior executive team and Board of Directors. Throughout the past year, we have shown continued progress on this journey, a testament to the dedication, hard work, and innovative approaches of our employees, our valued suppliers, our industry partners, and all stakeholders involved.

The urgency for change and concerted efforts to address global environmental and social challenges has never been more evident. We must collectively commit to sustainable practices and innovations to safeguard our planet and its communities for now and

I'm proud of the exemplary level of dedication in 2022 that has led to our bauxite mine becoming the first facility in Guinea to achieve Aluminium Stewardship Initiative (ASI) Performance Standard certification. The ASI Performance Standards set the bar for environmental, social, and governance practices specific for the aluminium value chain. With alignment being confirmed by an independent third party. Our achievement marks the first ASI certification for a mine on the African continent and is a testament to the power of teamwork and shared values.

Also, in 2022, we increased our production of CelestiAL, the world's first aluminium produced using solar power. In addition, we unveiled ambitious plans to construct a 150,000 tonne per year aluminium recycling facility, the largest aluminium recycling facility in the UAE.

In the communities where we operate, EGA's dedicated community relations and corporate social responsibility teams continues to foster long-term partnerships. In the UAE, our initiatives support entrepreneurship, advocate aluminium recycling and inspire young minds to pursue careers in STEM fields. In Guinea, we have engaged with over 6,000 local community members to identify projects that enhance livelihoods and social well-being, reflecting our commitment to creating lasting positive impacts.

Abdulla Kalban Managing Director



Chief Executive Officer's statement

In 2022, EGA demonstrated excellence across our business to achieve operational, financial and sustainability priorities and position our company to deliver on our purpose: together, innovating aluminium to make modern life possible.

The health and safety of our employees, contractors and the communities that we are a part of is always our first priority. Our goal is not just zero harm, but to eliminate the risk of harm while fostering mental wellbeing. In 2022, our safety performance continued to exceed global industry benchmarks, however there was a slight uptick in lost time injuries and our total recordable injury frequency. Incidents remind us that we must never become complacent and we can never take safety for granted. At EGA, safety is everyone's responsibility and we will continue to be unrelenting in our efforts to ensure a strong safety culture is embedded everywhere that we work.

In 2022, we continued to progress our roadmap to net zero greenhouse gas emissions by 2050, announcing a major initiative with Abu Dhabi National Energy Company PJSC, Dubal Holding and Emirates Water and Electricity Company that will unlock significant further development of solar power generation capacity in Abu Dhabi, progress power asset and generation optimisation and further decarbonise EGA's aluminium production. We also produced close to 57,000 tonnes of our CelestiAL brand. We were the first in the world to produce aluminium commercially using solar power, starting in 2021.

We respect our neighbours and are committed to positively engaging with local communities wherever we operate. Our intent is to maximise the positive benefits of our presence while carefully mitigating any potential adverse impacts. Our operations in Guinea provide an opportunity to contribute to the economic development of this nation whilst ensuring a responsible and lasting positive social and environmental impact. In 2022, we pursued Aluminium Stewardship (ASI) certification at our Guinea Aluminium Corporation (GAC) operations to obtain independent and public verification of both what we do well and to better understand where we can improve. We are proud to have achieved the first ASI certification issued to any entity in Guinea, being also the first ASI certification issued to any mining entity on the African continent.

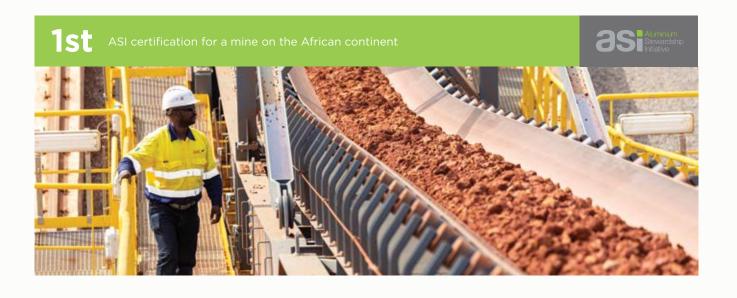
Our corporate governance practices provide a foundation of value creation to ensure suitable control mechanisms underpin the business's sustainable and responsible long-term growth. In 2022, we updated our Code of Ethics to further strengthen concepts such as supporting diversity & inclusion, ensuring these concepts are well embedded within our organisation and that relevant training is provided to all employees. Furthermore, in 2022, we made substantial enhancements to the control mechanisms governing our procurement practices, reinforcing the environmental and social due diligence aspects of vendor selection.

We continue to promote gender diversity through our business and advocate for women's role in industry. The EGA's Women's Network continued to support women within EGA and in September 2022, EGA became a signatory to the United Nations' Women's Empowerment Principles. We have increased our target for the proportion of women in supervisory positions to 25 per cent by 2025 and are aiming for 15 per cent of all positions at EGA to be held by women by 2026.

I would like to thank our EGA team members for their efforts and contributions this year. I also want to thank our shareholders and community members for their continued feedback, confidence and support. As we continue to pursue our sustainability initiatives, we remain committed to transparent and accurate reporting.

Abdulnasser Bin Kalban Chief Executive Officer

2022 Sustainability highlights



9 31%

Reduction in NO_v emissions intensity in the UAE compared with 2021

04.38%

Reduction in GHG emissions intensity from smelting and casting operations

Q 2%

Reduction in SO₂ emissions intensity from our smelting operations







680.2%

Increased in recycling of hazardous waste for UAE operations





Reduction in energy intensity associated with metal production



Q 20.3%









15%

Supervisory and management roles held by women





6,700+

Students participated in our school outreach program





Zero



085.6%

Employees in Guinea are Guinean nationals



Spent on community investment in Guinea



6,000+

People engaged through community engagement consultation and forums





Spent on local procurement in the UAE



About Emirates Global Aluminium

Emirates Global Aluminium is the world's largest 'premium aluminium' producer.

EGA was formed in 2014 through the merger of Emirates Aluminium and Dubai Aluminium, and our history stretches back to the 1970s when Dubai Aluminium was founded. Headquartered in the UAE, we are owned equally by Mubadala Investment Company of Abu Dhabi and Investment Corporation of Dubai. EGA operates two smelters in the UAE, one in Abu Dhabi and one in Dubai. Each has its own anode production facilities, casthouses and captive power plant, smelters are also connected to the grid, enabling access to solar energy. In addition, we operate an alumina refinery in Abu Dhabi and a bauxite mine in Guinea.

Where we are located

● EGA operations ◆ EGA regional offices







EGA 2022 Sustainability Report



Guinea Alumina Corporation (GAC)

Bauxite mine and export facilities

- 14 Million tonnes of bauxite in 2022
- Includes mine, rail infrastructure (much shared with existing operators) and export port
- One of the largest greenfield investments in Guinea in the last 40 years



Al Taweelah (EGA)

Al Taweelah alumina refinery

A USD 3.3 billion development making alumina refining a new industrial activity for the UAE
Met 47 per cent of EGA's alumina needs in 2022
The site is the size of 200 football fields

Smelting, casting, anode production, power and water

- Commissioned in 2009, second phase in 2013
- 1,266 Reduction cells in three potlines
- Nine casting stations producing more than
- 1.5 million tonnes of aluminium
- 3,500 MW natural gas power plant
- 3.75 Million gallons per day capacity desalination plant
- The site is the size of 555 football fields
- Site includes our head office



Jebel Ali (EGA)

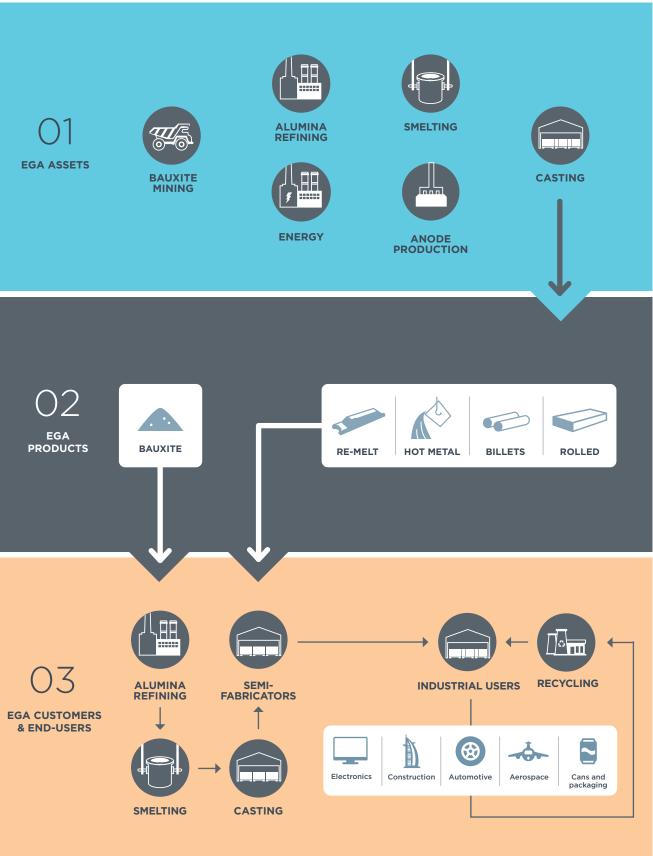
Smelting, casting, anode production, power and water

- Commissioned in 1979, with eight separate expansions since then
 1,577 Reduction cells in seven potlines
- 12 casting stations producing more than 1.1 million tonnes of aluminium in 2019
- <u>2,974 MW power</u> plant
- 30 Million gallons per day capacity desalination plant
- The site is the size of 250 football fields



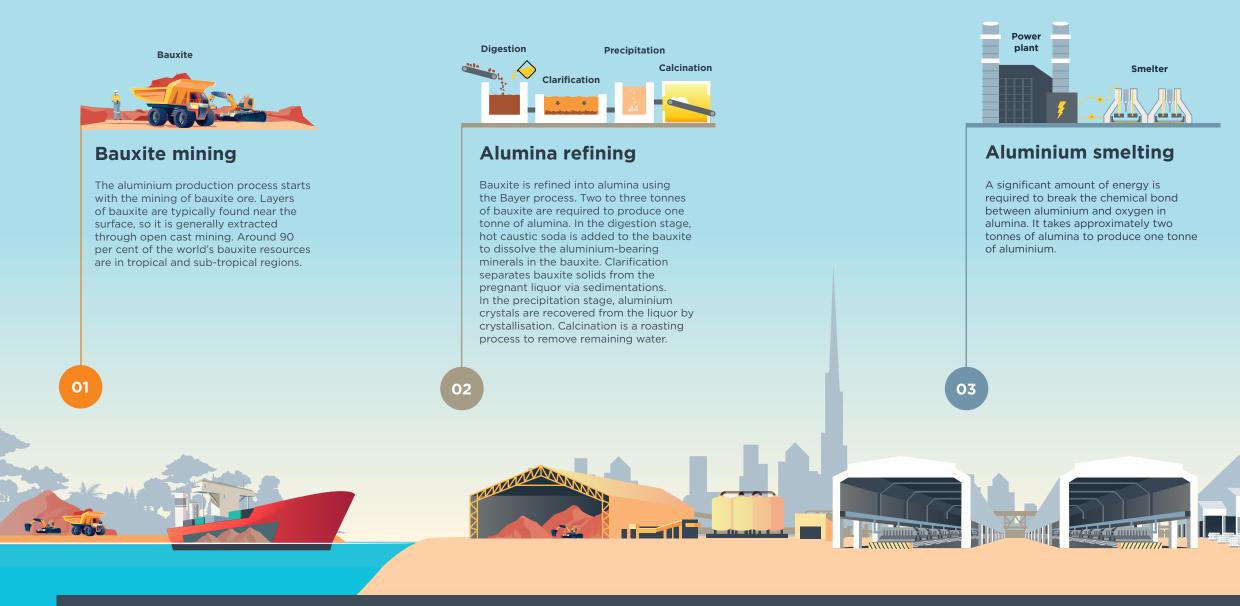
EGA's role in the aluminium value chain

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Introduction

Story of aluminium





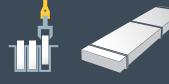
sow ingots

High profile

sow ingots



In sheet ingot casting, cast aluminium slabs are either: heated and passed through a sequence of rollers until either the required plate thickness is obtained or until the metal is thin enough for cold rolling; or cut into plates.



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Casting

Aluminium is then transferred to the casthouse, where it is made into products using several different methods. Alloys are added in many of our products, according to customer specifications, before the solidification stage.



In **billet casting,** cast aluminium billets are heated and either: forced through a steel dye by the extrusion process producing profiles; or forged, producing different products such as wheels and automotive parts.

04



EGA also supplies **molten**

metal to nearby customers. Receiving aluminium in molten form eliminates the need to use high energy to re-melt it before use. We transfer molten metal by truck in preheated 14.5 tonnes crucibles which can keep the metal liquid for up to 18 hours at temperatures of around 780°C.

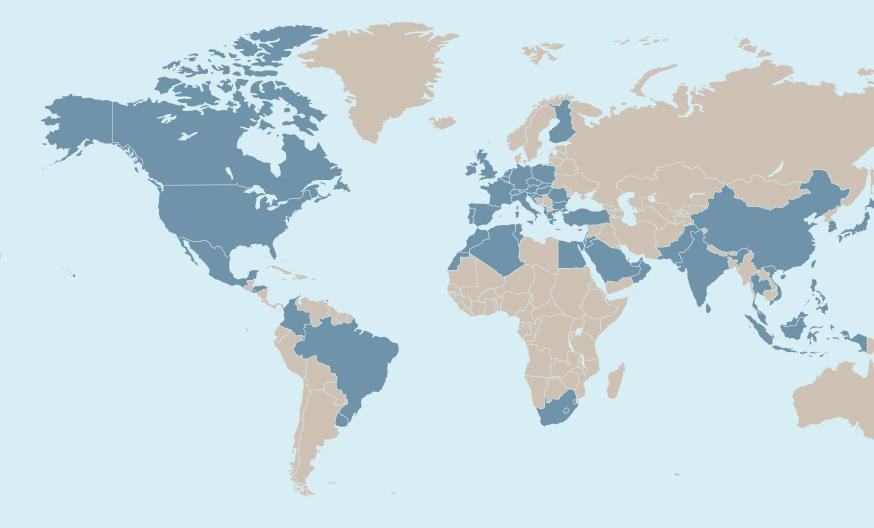


Quality products

EGA is the world's largest producer of 'premium aluminium'. Premium aluminium includes ingots, billets and sheets that have been alloyed or enhanced, or are of a very high purity. We create these products to customer specifications for use in the automotive, aerospace, electronics, packaging and construction industries.

EGA's customers also benefit from our technical expertise, as we help customers determine which specification and alloys can achieve best cost-performance balance for intended applications. EGA supplied primary aluminium to 443 customers in 58 countries in 2022, producing 2.74 million tonnes of cast metal.

At EGA's wholly-owned bauxite-mining-andexport subsidiary in Guinea, we exported a total of 14 million metric tonnes of bauxite ore. EGA is one of the largest bauxite suppliers in the world to the third-party market, exporting to Asia, Europe and the UAE.



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The Sustainability wave is already disrupting our industry. Established players are being challenged as what it takes to be successful in the aluminium value chain is changing.





Soren Jakobsen Director - Strat. Marketing Special Proj Marketing & Sales

Our AI Taweelah alumina refinery exceeded its nameplate capacity by almost 15 per cent, delivering 2.43 million tonnes of alumina to EGA's smelters.

EGA began production of CelestiAL solar aluminium in 2021. In 2022, we produced 57 thousand tonnes of CelestiAL, an increase of 46 per cent from the previous year. EGA has supplied metal to BMW Group since 2013. EGA's CelestiAL metal covers almost half the annual requirements of Plant Landshut, the BMW Group's only production facility for light metal casting in Europe. During the year, EGA also started to supply CelestiAL solar aluminium to Mercedes-Benz parts maker, Hammerer Aluminum Industries and Kobe Steel to make automotive body sheets for Nissan.

2022 metal production

CAST METAL PRODUCED (million tonnes)

VALUE ADDED PRODUCTS

AVERAGE PURITY RATING

2022 raw material production

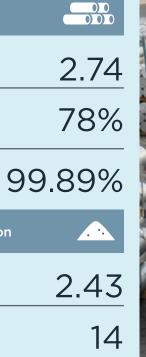
ALUMINA PRODUCED (million tonnes)

BAUXITE EXPORTED (million tonnes)

Introduction

EGA's primary aluminium was shipped to

443 customers in 58 countries



around the world in 2022



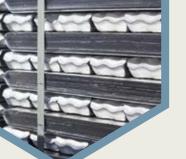


Bauxite ore

Bauxite is the ore from which aluminium is derived and is refined into alumina, the feedstock for aluminium smelters. GAC's bauxite has one of the highest ratios of alumina to silica, as well as relatively low boehmite. These properties make it suitable for processing in a wide range of refinery operating conditions, from low to high temperatures as well as double-digestion refineries at comparably low operating costs.

Re-melt aluminium

EGA primarily supplies high-purity and foundry-remelt products to manufacturers in the aerospace, automotive and electronics industries.





For the packaging and printing industries, we produce rolled products as sheet ingots, which are used to make foil and lithographic printing plates. The automotive industry also uses EGA's lightweight aluminium sheet ingots to manufacture vehicles.

Billets

EGA supplies billets to end-users in industries including transportation and automotive, construction, engineering and consumer durables.





Molten metal

EGA delivers molten metal to nearby customers including Ducab Aluminium Company in Khalifa Economic Zone Abu Dhabi (KEZAD). Molten metal is delivered in sealed trucks via a dedicated hot metal road.' This direct delivery of molten metal eliminates customers' need to re-melt the metal upon receipt from EGA, thereby significantly reducing customers' energy consumption.

Low carbon products



Made using solar power



Made using other low-carbon power e.g. nuclear

Recycled aluminium, produced from responsibly-sourced scrap

CELESTIAL-R MINIMAL-R

Low-carbon aluminium enriched with recycled aluminium

Our vision, mission and values



A clearly defined vision, mission and values are essential for long-term success. It is essential to provide both internal and external stakeholders with clarity on both intent and how an organisation plans to achieve its objectives.

At EGA, wherever we work and whatever our task, we are united by our purpose and our mission.

Our purpose

Together, innovating aluminium to make modern life possible.

Our mission

To generate value from mining to metal.

The very idea of UAE becoming a major aluminium producer was a bold innovation. Sheikh Rashid brought together people form our country and around the world to make it a reality.

What do our purpose and mission mean today?

They mean we have more to do - for the world, for societies in which we operate, for us all as EGA's people, and for our shareholders.



- For the world
- Building deep customer partnerships to grow the use of the metal of the future.
- Embedding sustainability in everything we do.

For our societies

- Driving sustainable economic growth.
- Innovating the future of aluminium production.

For our people

- Putting safety first and always.
- Becoming a talent-driven organisation.

For our shareholders

- Delivering competitive returns.
- · Growing our business for the future.

We have bold aspirations in each of these areas. which we must fulfil in the decades ahead.

Our culture is the bedrock on which we build. Everyone at EGA helped define the values that we collectively believe are essential.



Safety & sustainability

We always put safety first. We care for our people, our workplace, our communities and our planet.

Integrity & fairness

We act with integrity and fairness with our stakeholders and each other at all times.

Ownership & teamwork

We deliver results through personal ownership, and effective team collaboration.

Innovation & continuous improvement

We create value through innovation and continuously improve our business, operations and ourselves.

producer in the Middle East to join ASI. All of EGA's **ASI** Performance Standard.



sustainability topics applicable to EGA, including:

- Business integrity
- Policy and management
- Transparency
- Material stewardship
- Greenhouse gas emissions
- Emissions, effluents and waste





EGA was the first aluminium operations are certified to the

The ASI Performance Standards set requirements for numerous

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✓ Water stewardship **Biodiversity** Human rights Labour rights

- Occupational health
 - and safety

Our sustainability approach

Aluminium's use plays an essential role in improving transport efficiencies, reducing energy consumption and global greenhouse gas emissions, improving product longevity and reducing demand on natural resources.

We recognise that making products that help meet social and environmental challenges is not enough. It also matters how responsibly those products are made.

The production of aluminium is not without its challenges. Among others these include landuse change required for mining activities, the production of high volumes of waste during alumina refining, the energy intensity of the smelting process and the associated emissions. All need rigorous, robust and innovative management to ensure responsible production of aluminium.

Strong corporate governance, a focus on environmental performance and a commitment to making positive contributions to society are all part of our culture at EGA. But there are always improvements we can make.

Our bold aspirations

At Emirates Global Aluminium, we aim to embed sustainability in everything we do and aspire to be measured among the world's most responsible metals and mining companies. Our bold commitments drive innovation and collaboration that make change possible and hold us accountable to our progress.





Net zero greenhouse gas emissions by 2050

We are committed to reaching net zero greenhouse gas emissions by 2050. Our roadmap addresses each of the six main sources of our greenhouse gas emissions plus nature-based sequestration for the final emissions that are likely to remain unavoidable. Increased recycling will also play a role in reducing the carbon intensity of our metal. Read more about our roadmap in the A Transition to Net Zero section of this report.



Produce only ASI Certified products by 2030

To ensure EGA is addressing all relevant environmental, social and governance challenges of the industry, we have aligned our approach to sustainability management to standards developed specifically for our industry by the Aluminium Stewardship Initiative (ASI). We are aiming to produce only ASI-certified products by 2030.

The ASI Performance standards represent a consensus on best practice for safeguarding the environment, social responsibility and good governance through the aluminium value chain. Aligning with the ASI standards means tackling sustainability topics we believe are important at EGA and important to international civil society groups, end user of aluminium and community representatives from around the world.

Aligning our approach with the ASI performance standards means conducting our business with a high level of integrity, ensuring we have effective policies and procedures in place to support sound management of ESG issues and includes transparent disclosure. We are well on track to achieve this goal.

- **2017** EGA was the first organisation in the Middle East to join ASI.
- **2019** EGA achieved facility-level certification for our smelting and casting facilities in Al Taweelah, making EGA the first organisation in the Middle East to achieve facility level certification.
- **2021** EGA achieved facility-level certification for our smelting and casting facilities in Jebel Ali, meaning that now all EGA smelting and casing facilities are ASI certified.
- **2023** EGA's bauxite mining subsidiary, Guinea Alumina Corporation, achieved the first certification in Guinea.

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The world needs a metals and mining sector that is addressing the climate crisis, safeguards biodiversity, upholds human rights and that stands up for integrity and accountability. We are extremely proud to hold the first ASI-certification for a mine in Africa, I hope our achievement will inspire other mining entities across Africa and beyond to start the journey of self-assessment, measuring, monitoring, engaging, collaborating, improving and ultimately getting recognised.



Steven Bater Manager - Sustainability

A transition to net zero

In order to avert the worst impacts of climate change, it is imperative that collectively, we all work to limit our planet's warming to less than 1.5 degrees Celsius. This requires net zero greenhouse gas emissions worldwide by mid-century. The United Arab Emirates has announced a national strategic initiative to reach net zero by 2050. EGA is playing its part in meeting this challenge with our commitment to reach net zero greenhouse gas emissions by 2050. This commitment relates to our scope 1, 2 and 3 emissions⁵.

EGA has developed a roadmap to achieve this vital goal, engaging with both internal and external engineers, technologists and economists to ensure that what we are planning for the short, medium and long term can be technically and commercially viable.

⁵ Scope 1, 2 and 3 greenhouse gas emissions as defined World Business Council for Sustainable Development.

EGA 2022 Sustainability Report

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In the crucible of the aluminium industry, we confront real-world challenges that require pragmatic and occasionally transformational solutions. From mitigating environmental impacts caused by extraction to navigating complex supply chains, we're on the frontline of issues that test our ingenuity and commitment to sustainable practices. EGA is no longer just about the quality of our metal, it's about forging a more responsible and resilient industry, one that both our current stakeholders and future generations can be proud of.





"

Salman Abdulla Executive Vice President ESG & Sustainability



EGA's commitment is to reach net zero greenhouse gas emissions from our operations and supply chain by 2050

Not all the solutions will lie with EGA alone and we recognise that we must work in partnership with others. The UAE's ambitious plans to decarbonise its electricity generation are important for us to achieve our commitment, as is the development of the role of 'green' hydrogen.

Key aspects of our net zero roadmap

Bauxite mining



Our bauxite mining subsidiary Guinea Alumina Corporation (GAC) generates the electricity it needs to power fixed equipment, offices, accommodation and other requirements from two small diesel-fired package power plants. GAC is reviewing other potential electricity sources including solar and hydroelectricity, as well as how to reduce its energy needs. Mobile mining equipment at GAC is diesel-powered. GAC is exploring light vehicle electrification and the adoption of biofuels for heavy equipment.

Electricity generation

EGA currently uses natural gas to generate almost all of electricity required in our industrial processes in the UAE, with some electricity exchanged with the grid. Electricity generation accounts for more than half of all the greenhouse gas emissions that result from our activities. EGA has already announced an initiative under which we would integrate with the grid, with the objective of sourcing an increasing proportion of renewable and low-carbon energy. In 2021, EGA became the first company in the world to produce aluminium commercially using solar power.

Alumina refining

The Bayer process of refining bauxite into alumina requires thermal energy in the form of steam. EGA currently uses natural gas turbines to produce electricity, and makes steam using their heat. Potential solutions include the electrification of boilers using renewable energy, solar thermal boilers, technologies such as mechanical vapour recompression, or the use of 'green' hydrogen to meet thermal needs. The UAE is expected to be globally-competitive in 'green' hydrogen given its geographic comparative advantage in solar power development and the existing export infrastructure in the country. EGA's demand could accelerate the development to 'green' hydrogen in the UAE.

Smelting

The Hall-Héroult process, which has been used to make almost all the world's aluminium for more than a century, involves the consumption of carbon anodes resulting in emissions of carbon dioxide and perfluorocarbons, a potent greenhouse gas. These emissions must either be eliminated or captured and prevented from reaching the atmosphere. Although novel smelting and carbon capture technologies have been invented, there remain technical and commercial challenges that must be overcome before they become common. These potential solutions or others could be further developed in the years ahead. Baking kilns used to manufacture anodes and heating furnaces required for EGA's casthouse currently utilise thermal energy derived from natural gas. For these thermal energy needs, replacing natural gas with 'green' hydrogen is seen as the way forward.

Casting

Natural gas is currently used to heat furnaces in our casthouses, and this could be replaced with 'green' hydrogen.

Recycling

In addition, EGA expects to grow its business in recycling. As demand for aluminium is expected to grow by between 50 per cent and 80 per cent by 2050 according to the International Aluminium Institute, primary aluminium will still be required to meet demand well beyond mid-century. However, the role of recycled aluminium is expected to grow. EGA is planning to build the company's first recycling facility in the UAE, and expects to explore further opportunities in recycling over the years ahead.

Supply chain

The most significant sources of emissions in our supply chain are the production of raw materials such as alumina, as well as shipping. However, there are greenhouse gas emissions associated with almost all goods and services EGA needs, from hand tools to business travel. We intend to work with existing and new suppliers to address these emissions, using our purchasing power to drive reductions.

Nature-based sequestration

While EGA's roadmap envisages a substantial reduction in EGA's greenhouse gas emissions, completely eliminating greenhouse gas emissions may not be feasible, even beyond 2050. EGA has started to develop a portfolio of natural sequestration projects for these unavoidable emissions and is exploring options including mangroves and sea grass in the UAE. As a global company, EGA could develop projects around the world, either alone or in partnership with others such as non-governmental organisations.

Aluminium from the desert sun

Aluminium production is energy intensive with electricity generation accounting for more than 60 per cent of the global aluminium industry's greenhouse gas emissions. Across the world, much of this energy is derived from fossil fuels, with attributable greenhouse gas emissions, or hydropower which has the potential to be devastating for local natural ecosystems.

The sunny climate of the UAE and its extensive tracts of desert provide an excellent opportunity for largescale development of solar power. The UAE receives very high average hours of sun per day, and there are minimal impacts from land use change compared to more temperate regions.

EGA is the first company in the world to produce aluminium commercially using the power of the sun. We began production of this metal, which we market under the product brand, CelestiAL, in early 2021. The use of solar power significantly reduces the emissions associated with aluminium smelting.

In 2022, we sourced 810,000 MWh of solar power enabling us to produce more than 57,000 tonnes of CelestiAL. The rapid expansion of both solar and nuclear energy in the UAE will provide EGA with a significant increase in production capacity for low carbon products and help us on our way to our net zero commitment.

In 2022, BMW Group continued to be the largest customer for CelestiAL. During the year, EGA has also started to supply CelestiAL to Mercedes-Benz partsmaker, Hammer Aluminium Industries and Kobe Steel to make automotive body sheet for Nissan.

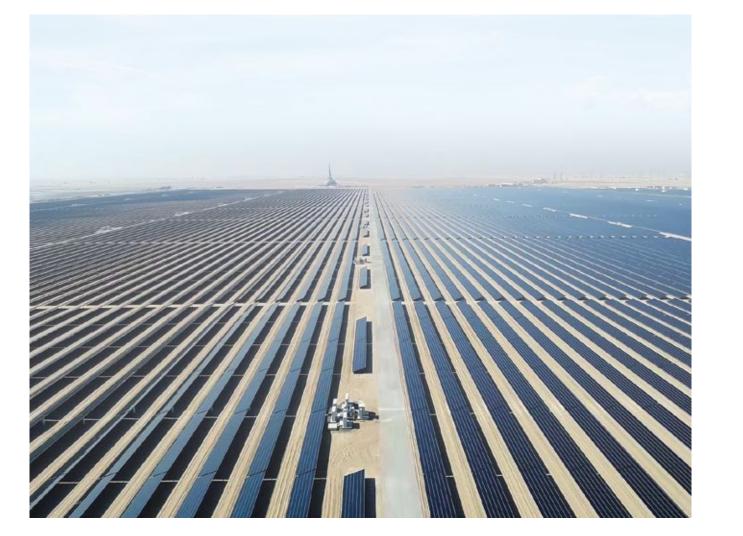


In 2015, the United Nations adopted the Sustainable Development Goals (SDGs) as a universal call to action to end poverty, protect the planet and ensure peace and prosperity for all. EGA contributes toward the SDGs relevant to our industry.



Ensure healthy lives and promote wellbeing for all at all ages.







Ensure inclusive and equal education opportunities for all in order to promote lifelong learning.



- We continue to provide healthcare for our employees, contractors, and their family members. This includes offering medical insurance and operating clinics staffed by qualified doctors and nurses. We took a significant step by opening our medical centre to the public, the sole healthcare facility within the KEZAD area.
- During the first half of the year, we continued to operate medical centers on-site, offering free RT-PCR tests and rapid antigen testing, conducting over 150,000 tests and administering 800 vaccines. As cases decreased, we eased some of the strict measures from 2021 and 2020 but remained vigilant, urging caution for anyone showing cold or flu-like symptoms.
- In 2022, we provided 3,700 medical check-ups to employees. We also provided 45,000 hydration tests to ensure people working on our sites remained suitably hydrated.
- We organized several educational health campaigns, addressing kidney health with urologist consultations, dental health with a mobile clinic. breast cancer awareness with survivor stories, and physiotherapy with live sessions. These campaigns engaged more than 1,500 participants.

- Education is a key focus for our community engagement and development projects. In the UAE. this includes enhancing science, technology engineering and mathematics education at schools, as a major employer of professionals in these fields. In 2022, over 6,700 students participated in our school outreach programmes to foster a passion for STEM.
- In Guinea, we continued with our long-running support of the Belikindi vouth cooperative, who in 2022 trained a further 32 young women in modern sewing techniques for the production

of personal protective equipment (PPE) used in the mining industry.

- We also contributed towards an advanced automotive training centre in the town of Boke. In 2022, 23 students, including 5 women, successfully graduated. The second cohort of 25 students started the program in December of 2022.
- We also offer a variety of training and development programmes to thousands of our employees every year to help people reach their full potential.



Promote inclusive and sustainable economic growth, employment and decent work for all.



- EGA has played an important role in the economic development of the UAE for decades. We directly employ over 6,500 people and our aluminium is one of UAE's biggest exports.
- Our goal is to attract and retain top talent by offering competitive salaries and benefits. We want to provide high-quality recruits with growth opportunities and a positive work environment to retain talented employees for the long term.
- In Guinea, at full production, we estimate that our operations contribute toward a five per cent boost to Guinea's economy, providing around 3,000 jobs in the country.
- We also prioritise the local sourcing of goods and services in an effort to boost local economies. Our 2022 spend included USD 146.9 million in Guinea and USD 2.18 billion in UAE.



Take urgent action to combat climate change and its impacts.





Build resilient infrastructure, promote sustainable industrialisation and foster innovation.



- EGA's in-house research and development (R&D) department has an established track record of increasing productivity, reducing costs, boosting resource efficiency and minimising environmental impact.
- R&D investment has been part of EGA's approach since we first started production, and we now benefit from more than 25 years of home-grown improvements. Over the years, we have developed and industrialised eight reduction technologies and filed 40 patents related to aluminium smelting enhancements with five new patents filed in 2022.



Sustainably manage forests, combat desertification, halt and reverse land degradation, halt boidiversity loss.





Ensure sustainable consumption and production patterns.



- EGA is at the forefront of exploring technical and commercial viability of transforming significant waste streams from the aluminium sector into useful products for other industries.
- In 2022, 100 per cent of our total in-year generation of SPL was recycled by the UAE cement industry.
- EGA has a dedicated R&D group tasked with identifying ways of converting bauxite residue waste material into useful products, reducing or eliminating the need for storage and unlocking bauxite residue as a new material resource for the UAE.



Strengthen the means of implementation and revitalise the global partnership for sustainable development.



- EGA has developed a roadmap to reach net-zero emissions by 2050, engaging with both internal and external engineers, technologists and economists to ensure that what we are planning for the short, medium and long term is technically and commercially viable.
- Our roadmap addresses our emissions from all aspects of our organisation including power generation, smelting, casing, refining, mining, supply chain and also considers the role of recycled aluminium and nature-based sequestration solutions.
- In 2022, we furthered plans to construct a 150,000 tonnes per year aluminium recycling facility. We have also declared our intention to establish a UAE-based solar-power silicon manufacturing facility.
- In 2022, EGA initiated

 a physical climate risk
 assessment to develop a
 greater understanding of the
 type and severity of longer term change, and therefore a
 greater understanding of the
 extent and scale of adaptation
 investment that may be
 required for both our assets in
 the UAE and in Guinea.
- In Guinea, we have continued our conservation work and our commitment to no net loss for biodiversity with a positive gain for critical habitats.
- In 2022, we were able to continue with remediation efforts for several areas that were cleared of vegetation as part of the construction phase, restoring land coverage of 1,150,000 m² using species of local origin grown in our own nursery and well exceeding the 2022 set target of 1,000,000 m².
- Also in 2021, we continued our conservation efforts associated with the critically endangered hawksbill turtle that nest at the shoreline adjacent to our facility in Al Taweelah in the UAE. Since 2011, nearly 106 turtles have laid eggs and almost 7,000 baby turtles have hatched at EGA's Al Taweelah beach.

- We regularly collaborate with established academic and industrial institutions in the UAE and internationally to address key industry challenges, and problem solve sustainable solutions for the aluminium industry.
- EGA has also been involved in multi-stakeholder engagement process looking into the future development and proposed updates to the ASI performance standards.
- We are an active member of the International Aluminium Institute (IAI), a global

industry association devoted to the aluminum sector. Our engagement with this organisation encompasses knowledge sharing and the opportunity for collaborative initiatives aimed at improving both the production and utilisation of aluminum.

• EGA is also an active member of the Gulf Aluminium Council (GAC), an organisation that offers a platform for collaborative efforts and addressing shared challenges within the regional aluminum industry.



Economic value generated and distributed

EGA has played an important role in the economic development of the UAE for decades. Our aluminium is one of UAE's biggest exports and we directly employ over 6,500 people. We were also the first industrial company in the UAE to license its core process technology internationally, in a national step forward for creating value from knowledge.

In the UAE, EGA's direct, indirect and induced economic contribution totalled over \$7 billion in 2022, more than 1.4 per cent of the entire economy. This supported almost 48 thousand jobs.

In Guinea, the construction of our Guinea Alumina Corporation project was one of the largest greenfield investments in the country in the past four decades. In 2022, GAC made \$229⁶ million of direct expenditures for suppliers based in Guinea.



Figure 1: Direct economic value generated

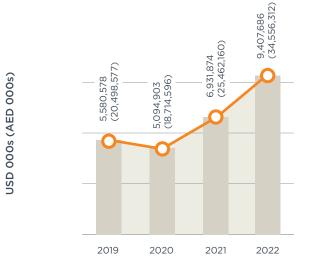
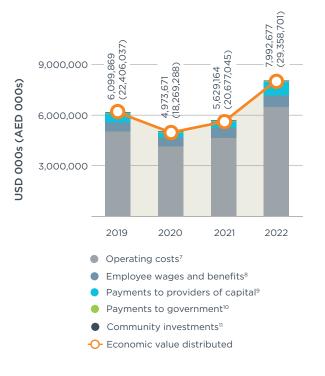


Figure 2: Economic value distributed





In 2022, EGA achieved a record revenue of AED 34.6 billion (USD 9.4 billion), an increase of 36 per cent compared with the previous year.

We operate planned and targeted community investment programmes for all of our sites in both the UAE and Guinea. We work with numerous stakeholders, including community representatives, non-governmental organisations, educational institutions and respective governments. We believe that the best way to maximise our positive impact is through grassroots community engagement initiatives that increase economic opportunity, enhance opportunities for education and ultimately improve quality of life.

Further details regarding our community initiatives are provided within section 3 'Social Responsibility'.

⁶ Spend on suppliers is calculated based on the accrual accounting.

⁷ In our 2020 report, we incorrectly reported that since starting work in Guinea, our community investment totalled USD 54 million due to an administrative error.

⁸ Operating costs include cost of goods sold, sales and distribution costs and general and admin expenses.

⁹ Employee wages and benefits comprise the total costs for EGA employees and staff directly contracted by EGA.

¹⁰ Payments to providers of capital are the payments made to EGA shareholders and lenders.

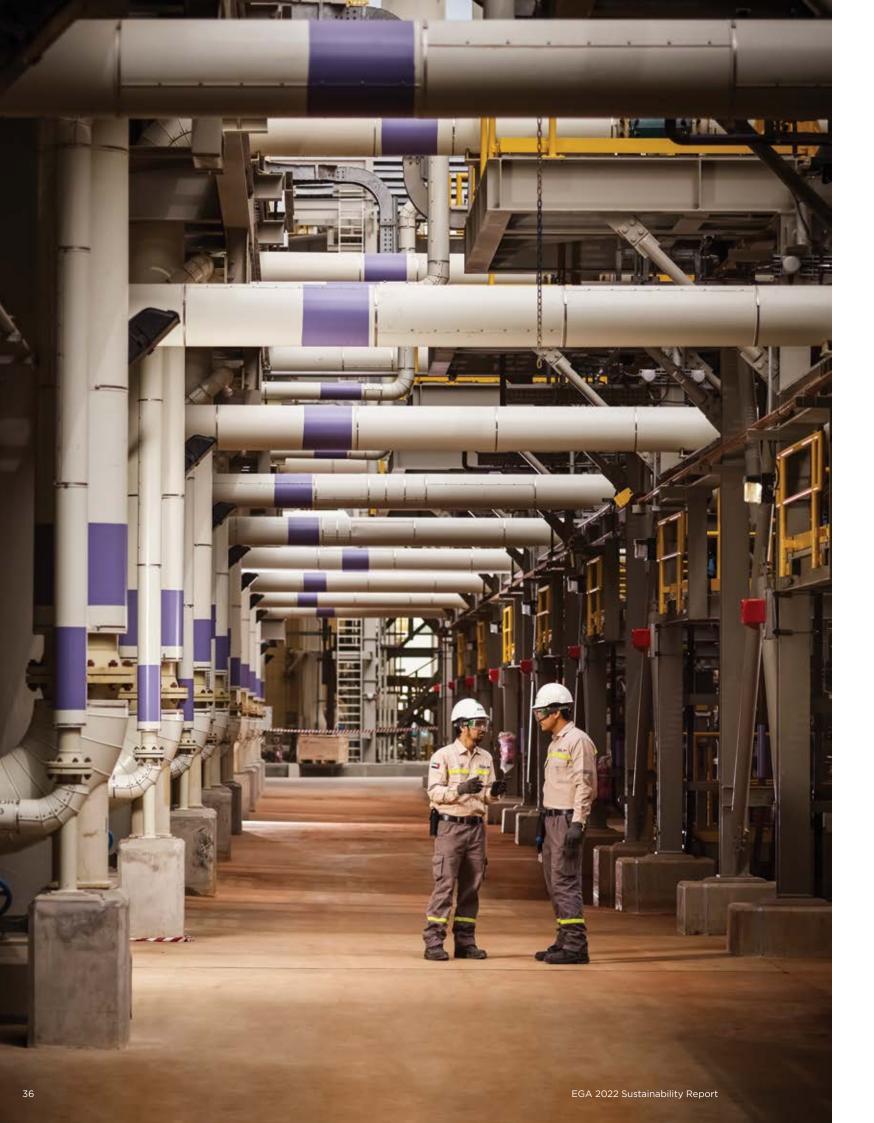
¹¹ Payments to government are tax expenses/returns paid by EGA's international subsidiaries

(AED 000s)

USD 000s

Figure 3: Breakdown of community investments



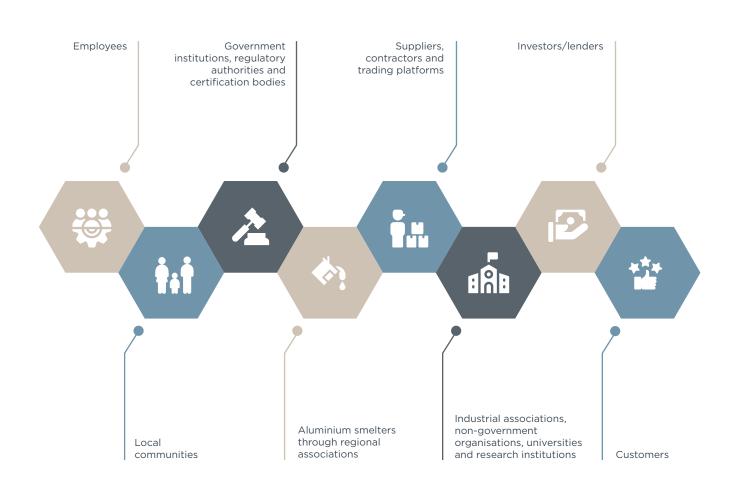


Our material topics

Sustainability spans a broad spectrum of topics. Deciding what to include and to what extent in a sustainability report is a crucial part of the reporting process. It is essential to engage with an organisation's stakeholders during the identification of relevant disclosures in order to ensure alignment with both their interests and priorities, ultimately boosting credibility.

At EGA, we adopt the Global Reporting Initiative's materiality principle whereby no one decision-maker or department decides on appropriate report content. Each year, we engage with a broad range of internal and external stakeholders to help us report on the topics that matter most to our stakeholders and our business.

Our stakeholders



In 2022, we identified 17 distinct sustainability topics informed by the GRI Standards and Aluminium Performance Standards, third-party rating agencies and industry trends. Our stakeholder engagement exercise solicited input from both internal and external stakeholders to prioritize these 17 sustainability topics. The purpose of this exercise being to identify topics that were perceived by our stakeholders as having the most significant impacts and that also substantively influenced assessment and decision-making.

Internal stakeholders that were consulted included key decision-makers and influencers throughout EGA. External stakeholders included international and local customers, government agencies, local communities NGOs, industrial associations, certification bodies and suppliers. In 2022, we engaged with a total of 368 stakeholders.

Results of the materiality analysis

The scores of respondents for each of the 17 topics were averaged and plotted as a 'materiality matrix'. Internal stakeholder results were plotted against the x-axis; external stakeholder results were plotted against the y-axis¹².

2022 Materiality matrix



Topics scoring above the median value on both the x and y-axis were considered the 'most material' for 2022.

¹² For comparison against previous years' material topics, please refer to our published 2021 report available at https://www.ega.ae/media/3183/ega-2021-sustainability-report-en.pdf

EGA 2022 Sustainability Report

While the stakeholder engagement process allowed us to rank topics in terms of the level of perceived materiality, it was clear from stakeholder scoring that none of the 17 topics were considered irrelevant to EGA's operations. We have therefore also disclosed on topics identified as very important or important with the level of detail provided in the disclosure determined by the level of importance attributed by our stakeholders.

Disclosure expectations specific to the aluminium industry are also identified by the ASI Performance Standards. These expectations have been defined through multi-stakeholder engagements and multiple public consultation exercises. Our 2022 report covers all disclosure requirements of the ASI Performance Standards that are relevant for EGA's operational facilities.



In 2022, we engaged with Bureau Veritas to perform independent, credible assurance and provide an objective and impartial opinion on the disclosures made within our report. The scope of this process included assurance of key performance metrics applicable to the most material topics as identified through the materiality analysis described above. This external review helps to ensure consistent, objective and accurate reporting of our sustainability performance. The techniques employed and outcomes of this assurance process have been incorporated into the report authored by Bureau Veritas, which can be accessed in the Appendix of this report.

To ensure alignment with relevant standards, oversight of the materiality analysis and assurance process is conducted by EGA's sustainability team and approved by EGA's Senior Sustainability Manager.







Safeguarding the environment

Safeguarding the environment

Our approach to environmental management

Mining and industrial processes have the potential to cause significant environmental consequences if not managed responsibly.

At EGA, activities with potential environmental impacts are overseen by a dedicated team of in-house environmental specialists. Working together, our environment and operations teams are responsible for managing all necessary controls, monitoring plans and audits as well as finding opportunities for continuous improvement.

Across all operations and project sites. EGA actively identifies potential environmental risks and suitable controls. Our management plans establish requirements for impact assessment, monitoring, suitable operating procedures, avoiding impacts and ensuring an appropriate level of mitigation where necessary.

In the UAE, all of our operational facilities are managed through our environmental management system that includes sitespecific environmental management plans developed in accordance with regulatory requirements and technical guidelines issued by the relevant environmental regulators¹³. All of our facilities in the UAE are also frequently audited by representatives from environmental regulators and third parties¹⁴ to confirm the suitability of our environmental monitoring and controls.

All of our smelting and casting facilities are certified against the ASI Performance Standards and in 2022, we made preparations to certify our refinery in Al Taweelah¹⁵.

Environmental management systems and performance standards

Aluminium Stewardship Initiative

- Jebel Ali smelting and casting
- Al Taweelah smelting and casting
- GAC bauxite mine and export facilities
- Al Taweelah alumina refinery

ISO 14001:2015

- Jebel Ali smelting and casting
- Al Taweelah smelting and casting
- Al Taweelah alumina refinery

IFC Performance Standards and World Bank Guidelines

• GAC bauxite mine and export facilities





EGA became the first company in the world to produce aluminium commercially using solar power under the new product name "CelestiAL". The CelestiAL metal inspired the wider aluminium value chain, our customers, and end users to believe the mission to net zero is possible.



Eiman Al Obaidli Environment – Senior Manager

In Guinea, during the design of our mine and export facilities, potential environmental impacts were identified through a detailed environmental and social impact assessment. This assessment was prepared in accordance with the International Finance Corporation (IFC) Performance Standards, Equator Principles, the African Development Bank's Integrated Safeguards System and regulatory requirements of the Guinean government¹⁶.

Additionally, in Guinea, we have developed a sitespecific Social and Environmental Management System complemented by a series of detailed

¹³ Including federal and emirate level authorities.

⁴ Including ISO and ASI audits.

¹⁵ ASI certificates and summary reports are available at https://aluminium-stewardship.org/about-asi/asi-members/emiratesglobal-aluminium-pjsc

website https://disclosures.ifc.org/project-detail/ESRS/24374/guinea-alumina-corporation



plans for air quality, biodiversity, dredging, noise control, soil management, water management, rehabilitation and reforestation. We have been operationalising our management system since the mine was first commissioned in 2018. An independent third party regularly monitors our activities in Guinea to ensure that we are fulfilling our commitments under the IFC Performance Standards and Equator Principles.

We have aligned our Guinea bauxite mining operations including port and rail operations with the ASI Performance Standards with the first audit conducted in December 2022. On completion of the audit process, successful certification was confirmed and publicly announced in February 2023. We are proud to receive the first ASI Certification issued to an entity in Guinea and the first ASI certification for a bauxite mine in Africa.



The first ASI certification issued to an entity in Guinea

Protecting air quality

Power generation and industrial processes associated with aluminium smelting can adversely impact air quality if not adequately managed. In the UAE, protecting air quality is a key focus area for our environmental management system. We monitor emissions and local ambient air quality to ensure the effectiveness of our controls and regularly communicate the results to relevant environmental regulators.

Potential air quality impacts from EGA's mining and export facilities in Guinea are predominantly associated with dust generation from the movement and the processing of large quantities of earth and rock, as well as emissions from mobile equipment, blast operations and power generation. Suitable monitoring locations have been determined to ensure our control measures are sufficient and the potential for local impacts minimised.

Nitrogen oxides from power production in the UAE

Exposed to high temperatures, nitrogen and oxygen react to produce nitrogen oxides (NO₂). EGA's NO, emissions are predominantly a result of the combustion of natural gas at our power stations.

In 2022, our total NO, emissions reduced by approximately 31 per cent when compared with 2021. This was primarily due to the commissioning of our new H-class power block at our facility in Jebel Ali, substituting several older, less efficient gas turbines¹⁷ for much of the year. This new Siemens SGT-8000H combined-cycle unit is the most efficient power block in the UAE and the first to serve the global aluminium industry.

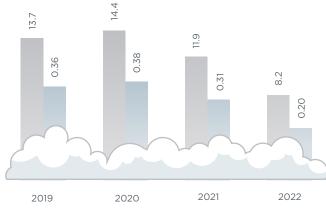
Historically, our reliance on older turbines at Jebel Ali hindered our ability to meet the NO_v emission thresholds established by the environmental regulator in Dubai. In 2022, we encountered operational disruptions with the H-class power block, which necessitated unexpected usage of older, less efficient turbines. Consequently,



In 2022, our NO emissions reduced by 31%



Figure 4: NO, emissions from power plant operations in UAE¹⁸



Total NO, emissions (thousand tonnes)

• NO_x emissions intensity (kg/MWh of power from power plant)

we were unable to meet the emission thresholds mandated by the environmental regulator. However, it is anticipated that in the future, the implementation of a more efficient H-Class power block will significantly reduce our reliance on older gas turbines, enabling us to operate well within the regulatory thresholds.

the requirements for aluminium production. Previously reported NO, emissions that are published in past sustainability reports were underestimated due to incorrect exhaust mass flow conversion. As a result, the NO₂ emission increased by 20.2%, 15.2% and 16.1% in 2021, 2020 and 2019, respectively, while NO, emission intensity increased by 24.0%, 15.1% and 16.1% in 2021, 2020 and 2019, respectively. The graph provided herein has been updated with the adjusted, correct values. These updates had no material impact.

Sulphur dioxide from anode production and smelting in the UAE

The raw materials used to manufacture anodes used in the aluminium industry contain sulphur. As anodes are consumed at high temperatures during the reduction of alumina to form aluminium, sulphur reacts with oxygen to produce sulphur dioxide (SO₂). SO₂ is also produced given the high temperatures involved in the manufacture of anodes at our anode baking kilns.

We control our SO₂ emissions through specifications set for the sulphur content of the raw materials used in the anode production. Also, an integral parameter of our smelting process is to minimise anode consumption during the electrolysis process. At our facility in AI Taweelah, we operate a wet scrubbing system¹⁹ at several potlines, able to remove up to 92 per cent of SO₂ from our emissions.

In 2022, our overall SO₂ emissions increased by four per cent compared to 2021. This rise in total SO₂ emissions was attributable to the overall increase in aluminium production.

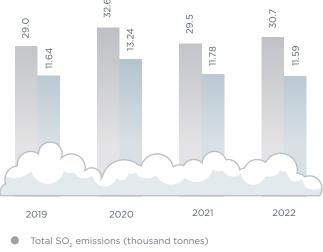
The emission intensity per ton of aluminium has decreased by nearly two per cent. The reduced sulphur content in raw materials and efficiency improvements in our scrubbing systems led to a decrease in emissions per ton of aluminium.

Furthermore, in 2022, we continued our ongoing program of major refurbishments at our anode baking kilns. These refurbishments allow us to further improve our anode baking process and further control associated SO₂ emissions.



¹⁹ In wet scrubbing systems, compounds are removed from a gas stream and transferred to a liquid, minimising emissions to the atmosphere. ²⁰ Emissions data are direct readings from analysers or manual balance estimations. The historic data was updated with monthly averages, previously quarterly. The graph was updated with the adjusted values. These updates had no material impact.

Figure 5: SO, emissions from anode production and smelting operations in UAE²⁰



SO₂ emissions intensity (kg/t Al)

NO_v and SO_v emissions from mining operations in Guinea

In Guinea, our principal gaseous emissions are NO, and SO₂ associated with the use of diesel for power production, vehicles, incineration, and other mining equipment.

As part of our impact assessment and management planning for our mining operations, we have conducted an evaluation to better understand and mitigate potential local impacts caused by our blasts and vehicle emissions. These assessments have not only provided valuable data but have also helped us identify suitable locations for air quality monitoring stations. By proactively addressing these concerns, we aim to ensure the well-being of the local community and minimize any adverse effects on the environment.

During much of the construction phase of GAC, we were largely dependent on the use of diesel-powered mobile generators to produce power. We have since commissioned two diesel-powered package power plants, centralising the production of power and improving overall efficiency. As with most mines in the region there is a heavy reliance on diesel for energy production, however GAC continues to investigate options to transition towards more sustainable and efficient sources of energy.

¹⁷ The intent is to take older, less efficient gas turbines offline and make them available for emergency standby. ¹⁸ Emissions data are direct readings from analysers. The total NO₂ emissions depend predominantly on electricity generation to meet

Fluoride emissions from smelting operations in the UAE

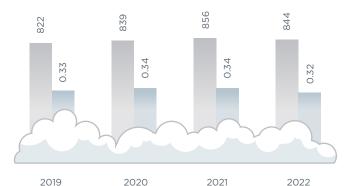
During the smelting process, the electrolyte chemistry composition is important. The aluminium industry uses cryolite-based electrolytes consisting of a fluoride salt to which it is necessary to add aluminium fluoride to maintain optimal chemistry and maximise resource efficiency. A consequence is the generation of fluoride emissions.

Emissions from our smelters are treated at a series of gas treatment facilities where we operate dry scrubbing systems²¹ to remove fluorides.

In 2022, our fluoride emissions intensity decreased by almost six per cent compared to 2021. This improvement is attributed to increased efficiencies in our gas treatment facilities, predominantly due to our efficient dry scrubbing system, as well as operational enhancements associated with smelting operations.

Total fluoride emissions decreased by 1.4 per cent compared with 2021 figures despite the increase in metal production.

Figure 6: Total fluoride emissions from smelting operations in UAE²²



- Total fluoride emissions (tonnes)
- Fluoride emissions intensity (kg/t Al)

In addition to direct emissions monitoring for fluoride, we also regularly conduct continuous ambient air quality monitoring as well as vegetation material sampling in and around our smelting facilities to reaffirm the suitability of our monitoring efforts and control measures.



Dust management from alumina refinery operations in the UAE

Bauxite is a relatively inert sedimentary rock that is refined to yield alumina. However, handling significant volumes of dry bauxite can result in the generation of substantial amount of airborne dust.

At EGA, we use numerous control measures to minimise the release of bauxite dust including automated dust suppression systems, covered conveyors and storage areas. Our ambient air monitoring stations enable us to assess dust levels, aiding us in determining the effectiveness of our control measures. In 2022, we did not exceed any internal or external thresholds established for dust emissions related to our refinery operations.

EGA is committed to protecting the environment wherever it operates including maintaining high air quality. We monitor emissions and local ambient air quality to ensure the effectiveness of our controls and regularly communicate the results to relevant environmental authorities.



Noura Omar Al Nagbi Environment - Superintendent

²¹ In our dry scrubbing system, we apply high volumes of powdered alumina to exhaust gases at extremely high speeds. The subsequent fluoride-enriched alumina can then be returned to the smelting process.

²² Emissions data are derived from direct readings from a site analyser, laboratory analysis of manual stack sampling and/or mass balance estimations. For previous reports, historic data has been derived using quarterly averages, data presented herein uses monthly averages. This change in reporting method has had no material impact.



Dust management from mining operations in Guinea

During mining operations, the handling of large quantities of earth and the movement of heavy vehicles across exposed subsoils pose a significant risk of generating substantial amounts of dust.

For our operations in Guinea, we have a comprehensive dust suppression system that considers how we potentially impact neighbouring communities and sensitive habitats, recognising the importance of addressing the increased risk of dust generation during the dry season.

Our access roads are regularly sprayed with water to minimise dust generation from vehicle movements, and we also operate dust suppression systems at our crushing and loading facilities.

Continuing our commitment from previous years, in 2022, we continued to monitor the effectiveness of our dust suppression efforts by employing mobile air quality monitoring equipment. These readings were taken from both within our operational areas and the surrounding local communities. Furthermore, we conducted training sessions for several members of the local community, empowering them to identify excessive dust generation associated with our activities. We also provided them with contact details, enabling community members to promptly report any concerns to our dedicated environment team. By fostering open communication and actively involving the community, we strive to address any potential issues and ensure a healthier environment for all.

Conserving energy

Home grown technology

The production of aluminium is an energy-intensive process. The chemical bond between aluminium and oxygen in alumina is very strong with a significant amount of energy being required to break this bond and produce elemental aluminium.

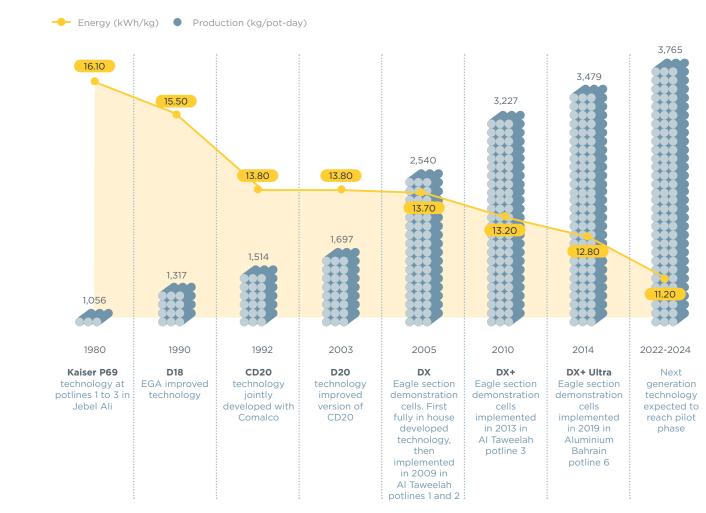
Producing more aluminium with less energy is important from both a commercial and an environmental perspective, and has been part of EGA's ethos since the foundation of our organisation more than 40 years ago.

EGA's in-house research and development (R&D) department has an established track record of increasing productivity, reducing costs, boosting resource efficiency and minimising environmental impact.

R&D investment has been part of EGA's approach since we first started production, and we now benefit from more than 25 years of home-grown improvements. Over the years, we have developed nine technologies ready to be industrialised and we have filed 40 patents related to aluminium smelting enhancements with five new patents filed in 2022. Since 1990, EGA's technology development has more than doubled the size of the reduction cell that is technically and commercially viable. Our technology development, and earlier work that started in the 1980's, has significantly reduced the amount of electricity required to produce each tonne of aluminium by 37.5 percent, improving both cost and environmental performance.

Our latest industrialised technology, DX+ Ultra, has more than doubled the productivity of our first D18 technology developed in 1990. In 2022, EGA successfully started up DX+ Ultra reduction cell technology with a modified lining at 500kA, the first time this amperage has been achieved in the Middle East. Increasing amperage offers the potential to increase aluminium production, reducing the cost per tonne of building new reduction cells and improving the productivity of the existing ones. Pushing amperage to 500kA is expected to boost production by five per cent compared with the current maximum operating amperage in EGA.

In 2022, EGA's overall average energy intensity for smelting aluminium was 13.87 kwh/kg Al. With our next generation of smelting technologies, we are hoping to be able to achieve an energy intensity value of well below 11.5 kwh/kg Al.



Exporting energy-efficient technology solutions

EGA has signed an agreement with INALUM's Kuala Tanjung smelter granting EGA the exclusive right to licence its UAE-developed technology to INALUM for the Indonesian company's brownfield aluminium smelter expansion. This licence also gives EGA the right to invest in the project and offtake metal. These types of agreements give us

Figure 7: Evolution of technology - energy and production

an opportunity to promote in-country value, work with local businesses and industries to promote local know-how, help other organisations in the aluminium industry reduce energy consumption and develop the UAE's knowledge-based economy.

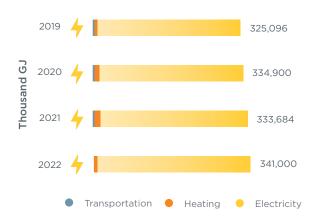


Energy consumption in the UAE

In 2022, our overall energy consumption in the UAE increased by 2.2 per cent compared to 2021, primarily driven by increased metal production.

In contrast, our energy intensity decreased by 3.4 per cent, thanks to our conservation and efficiency initiatives. These concerted efforts resulted in a notable reduction in energy consumption, totalling over 18.3 million gigajoules.

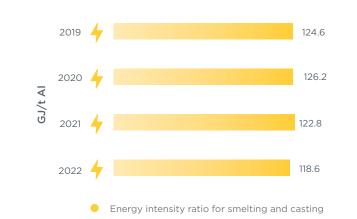
Figure 8: UAE energy consumption from non-renewable resources





Energy intensity for smelting and casting reduced by **3.4%**

Figure 9: EGA smelting and casting energy intensity²³



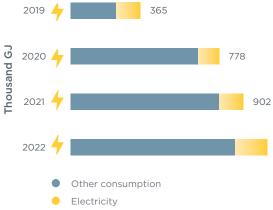
²³ Energy intensities are calculated taking into consideration fuel consumed during power generation including efficiencies and thermal loss.

Energy consumption in Guinea

In Guinea, the bulk of our energy consumption is associated with the use of site equipment, vehicles, the operation of our site offices and welfare facilities.

Compared to the previous year, we observed an increase in our energy consumption of 13.8 per cent. This rise can be attributed to adjustments we made in response to varying site conditions, including

Figure 10: Guinea energy consumption from non-renewable resources²⁴



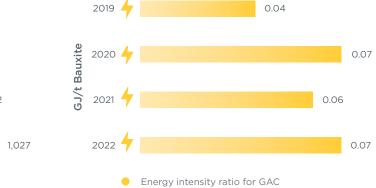


20 per cent.

increased traveling distances, processing and handling demands. These changes posed certain challenges, resulting in a reduction of approximately 11 per cent in bauxite mined for the year. Increased energy consumption together with this lower tonnage resulted an increase in our energy intensity of aproximately 16 per cent.

2019 /

Figure 11: Guinea energy intensity



²⁴ Total Bauxite mined in 2022 was down by approximately 11 per cent, but total Bauxite sold and shipped increased in 2022 by over

Greenhouse gas emissions

Greenhouse gas emissions in the UAE

Carbon dioxide released to the atmosphere from fuel consumption at our natural gas power plants accounts for the majority of our greenhouse gas emissions. However, there are several other sources of greenhouse gas emissions associated with the production and consumption of anodes and the electrolysis process.

In 2022, our total scope 1 greenhouse gas emissions increased in part due to the increase in metal and alumina production compared with 2021²⁵. Additionally, we encountered unforeseen disruptions at our power generation facilities, which contributed to this emissions increase.

Perfluorocarbons (PFCs) are a group of potent greenhouse gases produced during the smelting process with a global warming potential thousands of times higher than CO₂. In 2022, the intensity of our PFC emissions decreased by 44 per cent compared with 2021. This was predominantly due to improved performance at AI Taweelah operations and rectification of issues observed in 2021 associated with anode quality, voltage design and power outages.

EGA's PFC emissions are already significantly lower than the global average due to EGA's technology and operational controls. In 2022, our PFC intensity was 94 per cent lower than the global industry average²⁶.

Historically, we have produced little in the way of scope 2 emissions given that we generate the majority of our power at each of our own facilities in the UAE. Nevertheless, we have previously been accountable for scope 2 emissions as a consequence of energy exchange agreements with the local electricity grid.



Our PFC emissions are 94% lower than the global industry average

Figure 12: Total direct (scope 1) greenhouse gas emissions in UAE²⁷

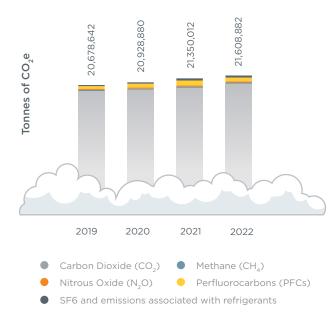
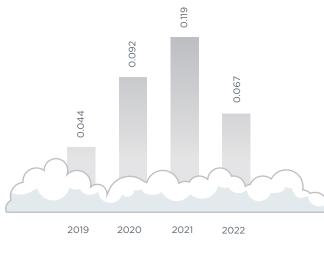
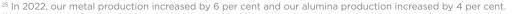


Figure 13: PFC emissions intensity



PFC emissions intensity (tCO₂e/t Al)



²⁶ IAI referenced for the global industry average as of 2021.

²⁷ Global Warming Potential (GWP) for CO₂, CH₄, and N₂O are based on the Intergovernmental Panel on Climate Change (IPCC) 2nd assessment report, 1996. Standards used for estimation are GHG Protocol (revised edition) developed by WRI and WBCSD, the IAI addendum developed for the aluminium sector by the International Aluminium Institute (IAI, 2006) and the IPCC Guidelines.



In 2022, we achieved a significant milestone by completely eliminating all scope 2 emissions for the first time in our history. This was achieved through sourcing all imported power from renewable energy sources in the UAE. This accomplishment is directly attributed to the UAE's rapid and ongoing investments in low carbon energy sources within the country²⁸.

The elimination of our scope 2 emissions, in conjunction with the commissioning of the new H-class power block along with several operational efficiencies, resulted in a reduction in the GHG intensity of our metal by 4.4 per cent compared with 2021. However, given the growth in metal and alumina production in 2022 relative to 2021, our total greenhouse gas emissions in the UAE increased by approximately one per cent.

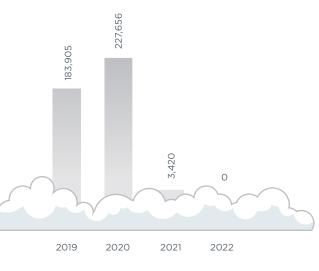
The GHG intensity (scope 1 and 2) of our metal remains significantly lower than most aluminium producers, being approximately 41 per cent lower than the published global industry average²⁹.

²⁸ Identification of origin being confirmed through attribute tracking standards established by the International Renewable Energy Certification Standard Foundation (I-REC Standard). ²⁹ IAI referenced for the global industry average as of 2021 (data taken for anode manufacturing, smelting, and casting and excluding indirect ancillary materials and transportation)



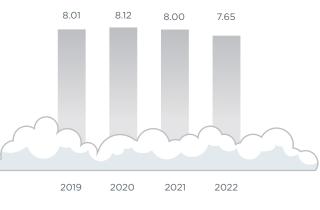
The GHG intensity of our metal is 41% lower than the global industry average

Figure 14: Total indirect (scope 2) greenhouse gas emissions in UAE



• Scope 2 (Tonnes of CO,e)

Figure 15: Greenhouse gas emissions intensity for our metal (scope 1 and 2)

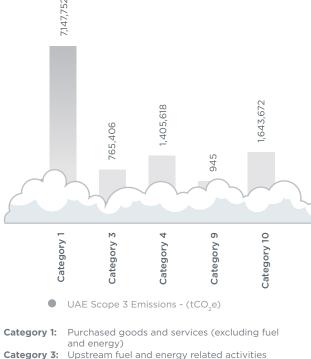


Average greenhouse gas emission intensity for EGA's metal (tCO₂e/tonne Al)

The calculation of our Scope 3 inventory is a vital step in understanding emissions sources across our value chain. This process helps us identify areas where we can achieve the most significant emissions reductions beyond our own operational activities. For the calculation of scope 3 emissions we predominantly utilise secondary data emissions factors linked to materials and activity. Our intent is to gradually transition from global emissions factors to regional and, where feasible, to site-specific data with the intent of increasing data quality over time.

In 2022, our calculated Scope 3 emissions were 10.96 million tonnes from upstream and downstream categories³⁰. Approximately 70 per cent of scope 3 emissions are derived from purchased goods and services.

Figure 16: Total indirect (scope 3) greenhouse gas emissions in UAE



Category 3:	Upstream fuel and energy related acti	vities
Category 4:	Upstream transportation and distribut	tion

- Category 9: Downstream transportation and distribution
- Category 10: Processing of solid products (excluding fuel and energy)

Greenhouse gas emissions in Guinea

In Guinea, our scope 1 greenhouse gas emissions are predominantly associated with the use of diesel for electricity generation, vehicles and mining equipment. We are not connected to the national electricity grid, nor do we source energy from any third parties. Consequently, we do not contribute to any scope 2 emissions.

Despite recent improvements in power production efficiency from the use of our centralised package power plants, in 2022, our greenhouse gas emissions increased by 13.8 per cent from the previous year. This increase was due to the rise in fuel consumption attributable to increased vehicle movements and the operation of mining equipment associated with the change in site conditions compared with 2021. Although this increase only resulted in a 0.04 per cent increase in EGA's total emissions, it is still important to identify areas for improvement and strive for more sustainable practices. To date our scope 1 greenhouse intensity has reduced by over 40 per cent since 2019 due to greater awareness and continuous improvements.





³⁰ For the calculation of Scope 3 we use IAI (International Aluminum Institute) Scope 3 Calculation Tool Guidance, 2022 and the Greenhouse Gas Protocol, Corporate Value Chain (Scope 3) Accounting and Reporting Standard.

³¹ Global Warming Potential (GWP) is based on the Intergovernmental Panel on Climate Change (IPCC) 2nd assessment report, (AR2), 1996. 2019 was the first year of operations for GAC, and so we are only able to provide data for the previous three years. Scope 1 emissions have been derived from emission factors from the IPCC 2nd Assessment Report (AR2).



Reported total GHG emissions³² include EGA's activities associated with aluminium production, sourcing of goods and services, downstream transportation, processing of sold products

EGA total corporate emissions



Upon customer request, EGA is also able to supply GHG emissions data for aluminium products. This data is generated through applications of a life

Aluminium product 'cradle to gate' emissions



³² Emissions have been calculated in accordance with the greenhouse gas protocol and IAI addendum developed for the aluminium sector. ³³ Life cycle assessment conducted in accordance with ISO 14040/44.

and other activities not directly related to the production of EGA's aluminium such as the supply of water to Dubai.

cycle analysis³³ and includes emissions attribute to stages in the value chain from mine to casthouse, commonly reffered to as a cradle to gate.

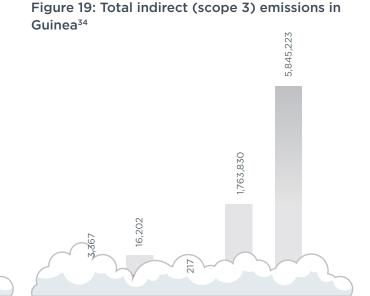
Figure 18: Greenhouse gas emissions intensity in Guinea



• Greenhouse gas emissions intensity for bauxite (scope 1) - (tCO₂e/t Bauxite)

In 2022, our calculated Scope 3 emissions were 7.63 million tonnes from upstream and downstream categories³⁴. The majority of scope 3 emissions are associated with downstream transportation and distribution and processing of sold products.







Guinea Scope 3 Emissions - (tCO₂e)

Category 1: Purchased goods and services (excluding fuel and energy)

Category 3: Upstream fuel and energy related activities

- Category 4: Upstream transportation and distribution Category 9: Downstream transportation and distribution Category 10: Processing of solid products (excluding fuel
 - and energy)

"

GAC's commitment to sustainable resource management drives our plans towards renewable energy utilisation. Through innovative pilot projects targeting electric vehicles and solar panel shelters, we actively promote sustainable practices. Additionally, we proudly support local content in waste recycling and remain dedicated to the gradual rehabilitation of our mining sites.



Bangoura Bintia Senior Environment Specialist

Greenhouse gas emissions targets

Historically, EGA has worked towards greenhouse gas reduction targets based on intensity and published our progress against meeting these targets within our annual sustainability reports. However, we recognise the importance of curtailing total emissions and that in order to avert the worst impacts of climate change it is imperative that the global economy works towards net zero emissions by mid-century.

EGA has developed a roadmap to reach net-zero emissions by 2050, and has engaged with both internal and external engineers, technologists and economists to ensure that what we are planning for the short, medium and long term is technically and commercially viable.

Our net-zero roadmap addresses our emissions from all aspects of our organisation including power generation, smelting, casting, refining, mining, supply chain and also considers the role of recycled aluminium and nature-based sequestration solutions.



³⁴ For the calculation of Scope 3 we use IAI (International Aluminum Institute) Scope 3 Calculation Tool Guidance, 2022 and the Greenhouse Gas Protocol, Corporate Value Chain (Scope 3) Accounting and Reporting Standard.



Net Zero by 2050

Our sustainability team has been involved in the ASI working group looking to develop a suitable science-based method for the determination of interim targets suitable for the aluminium sector. Once a science-based method is endorsed, we will be incorporating this within our net-zero roadmap and making our interim targets publicly available.

We intend to be open and transparent about the work we're doing to reach our targets and will be providing details regarding progress within future sustainability reports.



Water use

Water use in the UAE

In the UAE, the majority of our water use is for cooling during electricity generation. We extract seawater for this purpose, more than 95 per cent of which is returned to the sea.

We do not use any of the UAE groundwater reserves or other natural freshwater resources. We meet our freshwater needs through desalination of seawater which is subsequently used for industrial processes, steam generation, as well as for office and residential use on our sites³⁵.

We have mapped our water withdrawal, discharge and consumption rates by source and type for all of our facilities. In 2022, our total water consumption amounted to 65,280 megalitres, an increase of 2.9 per cent compared with 2021. This increase in water consumption can be attributed to the overall increase in metal production.

In order to minimise the need for desalination, we treat and recycle water from our onsite sewage treatment plants to meet our needs for landscape irrigation.

We monitor the quality of the water we return to the sea for parameters including total suspended solids, inorganic chemical parameters, temperature, salinity, and dissolved oxygen, in order to identify any discernible impacts on the marine environment or variation in normal operating parameters.

We set our thresholds for the water quality of discharged water in adherence to local regulatory requirements and with the objective of avoiding potential adverse impacts on the marine environment.

In 2022, we identified six incidents of non-compliance with these thresholds. Five from our site in Jebel Ali and one from our site in Al Taweelah. Each non-compliance was associated with salinity or temperature of discharge water. All exceedances were investigated by our environment and operational

teams to identify potential impacts, root cause and determine appropriate corrective measures. Following investigation, we were able to conclude no discernible impact to the local environment and all exceedances were addressed through adjustments in operational parameters.

We also identified sixteen incidents of noncompliance associated with a fault with our sewage treatment facilities, ten in Jebel Ali and six in Al Taweelah. Subsequent investigation and improved maintenance returned the facility to normal operating conditions with no discernible impacts to the environment.

Details of each of these non-conformances including associated monitoring data were reported to the environmental regulatory authority.

³⁵ We also supply some of the desalinated water generated at our Jebel Ali facility to local customers in Dubai. In 2022, 2,104 megalitres were supplied to local customers

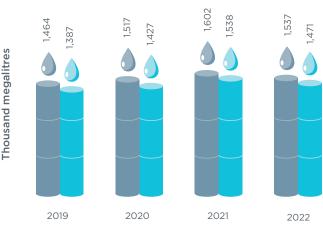
³⁶ Data derived from flow meters.



635 megalitres of water recycled and reused

Equivalent to more than 16,800 water tankers

Figure 20: Water withdrawal and discharge in UAE³⁶



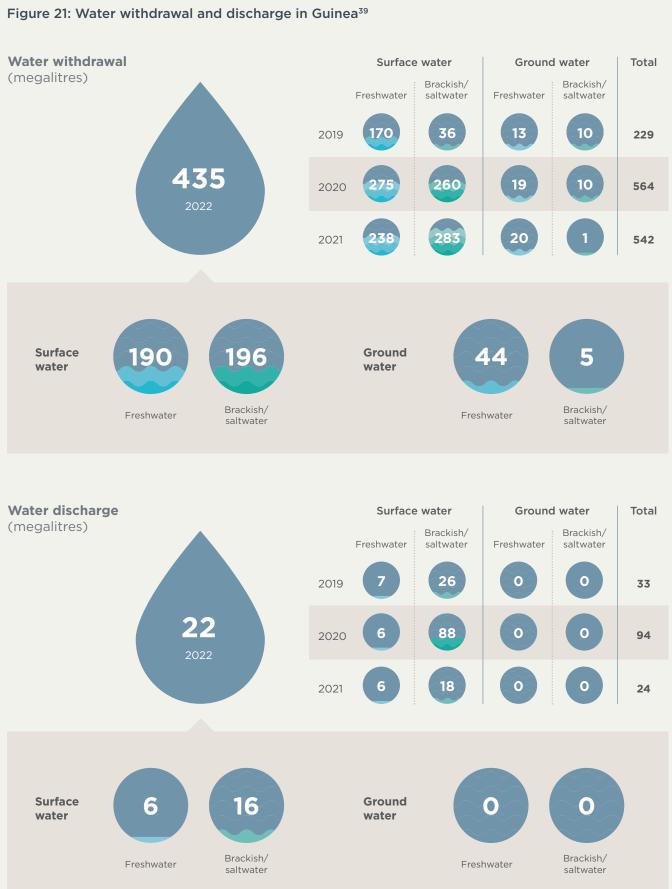
• Water withdrawal from the sea • Water discharged to the sea

EGA uses significant amounts of seawater and desalinated water for its operations activities. EGA has implemented a water quality monitoring programme to verify effectiveness of water treatment controls and compliance with local standards and also to ensure that discharge of water has no impact on the marine ecosystem.



Pascal Meilleur **Environment - Senior Superintendent** Capital Projects







Water use in Guinea

In Guinea, we manage our water-related impacts through an integrated water management plan. This plan establishes specific strategies and targets for water use, treatment and protection developed using regulatory requirements of the Guinean government Performance Standards and African Development Bank Integrated Safeguards Systems. As part of our plan, we have mapped our water withdrawal, discharge and consumption rates by source and type for both our mine site in Tinguilinta and our port facilities in Kamsar³⁷. Our main needs for water at both sites are for dust suppression and sanitation purposes.

At Tinguilinta, we meet our water needs through extraction from the Thiouladjiwol Reservoir³⁸, approximately 7 km from our mine site, and two groundwater boreholes.

In Kamsar, we meet our freshwater demands through the extraction and desalination of seawater via our onsite reverse osmosis facility. Additionally, we use brackish water for dust suppression.

In Kamsar, we discharge treated wastewater to an adjacent estuary. In Tinguilinta, we discharge treated wastewater to an adjacent semi-dry channel. Discharge from these facilities is monitored through laboratory analysis for various parameters, including dissolved oxygen, biological oxygen demand, chemical oxygen demand, nitrogen, phosphorous, suspended solids, coliforms, and residual chlorine. Results are compared against Guinean regulations and international standards.

Our overall water consumption is relatively consistent year-on-year with the only difference being brackish water from the sediment pond in Kamsar being used during the rainy season, replacing water being drawn from the sea.

In 2022, GAC's discharge monitoring revealed performance issues at both our Tinguilinta and Kamsar Sewage Treatment Plants. Nearby waterways were tested, with no material contamination identified. A review was conducted to analyze these faults. Subsequent improvements were successfully implemented, resulting in the restoration of discharges to meet regulatory requirements, but this requires ongoing oversight to address any potential recurring issues.

³⁷ Our environmental and social impact assessment has not identified any of our abstraction sites as being in areas of likely 'water stress'. ³⁸ The Thiouladjiwol Dam and Reservoir were built by the project for this purpose.

³⁹ EGA does not withdraw water from or discharge water to a third party.

Waste management

Waste management in the UAE

At EGA, the waste hierarchy is at the core of our waste management decisions. We have a comprehensive Waste Management Plan, with a long-term aspiration of sending zero process waste to landfill. In the UAE, we are exploring and developing various opportunities for our waste streams to be used as feedstock for other industries. We also stockpile waste materials at our facilities while we seek recycling options, diverting as much as we can from landfill.

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In 2022, EGA recorded its highest recycling rate. Our commitment to increasing the recycling efforts year after year is a testament to our values at EGA. We believe in a sustainable future, where every effort counts in creating a positive impact on the environment.



109.3

98.8

0.3

2021

Mohamad Zafar Environment and Waste Management -Superintendent

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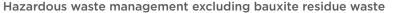
Figure 22: Waste types and disposal methods in UAE^{40 41 42 43}

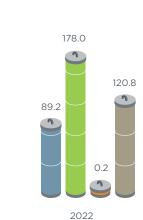


179.6

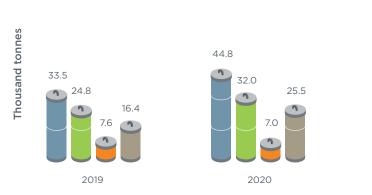
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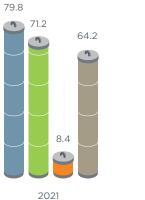




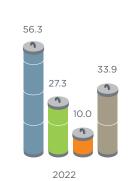


Non-hazardous waste management





200.7



⁴⁰ Excludes bauxite residue. All waste weights are measured at a weighbridge.

⁴¹ Total stockpiled includes the cumulative total of waste stored onsite in-year as well as from previous years.

⁴² Historically, we have recorded 'Recycled' data to include recovery by any other means, including waste streams that have been used by other industries as a source of fuel. For future sustainability reports we will include more in-depth breakdown of how we have diverted from disposal to fully align with GRI 306

⁴³ The 2020 and 2021 waste numbers and figures have been restated to reflect the inclusion of additional waste stream as well as the reclassification of a waste stream. As a result, for non-hazardous waste, the generation, stockpile and recycling volumes increased by 18.5%, 40.1%, and 0.0%, respectively for 2020, and 31.9%, 96.9%, and 50.2%, respectively for 2021. In contrast, a decrease for hazardous waste generation and stockpile volume was observed: 8.3% and 1.8%, respectively, for 2020, and 6.2% and 0.3%, respectively for 2021. Data presented herein has been adjusted accordingly, this adjustment has had no material impact.

Waste from the smelting of aluminium

The smelting of aluminium generates a range of hazardous waste materials. In terms of volume, the two most significant hazardous waste streams are spent pot lining (SPL) and dross.

SPL is the used inner lining of reduction cells, which needs to be replaced after several years of operation. SPL is potentially a hazardous material due to its reactive content and requires careful handling during storage and transportation. Thanks to successful partnerships we have developed with cement companies along with support from environmental agencies in the UAE, we now process our SPL and provide it as an alternative raw material for the manufacture of cement.

Total generated SPL in 2022, equating to 25,544 tonnes, was recycled by the UAE cement industry. 23,374 tonnes of SPL stored from previous years was additionally recycled by the UAE cement industry, allowing EGA to significantly reduce the onsite storage volume. Not only does the use of SPL as a raw material reduce the demand for natural resources, but given its unique characteristics, the use of SPL in the cement industry can reduce fuel demand and corresponding NO, and GHG emissions⁴⁴.

Dross is a mass of impurities that floats to the top of molten aluminium and is removed during the smelting process. In 2022, 100 per cent of EGA's dross generation was sent to a specialised recycling facility to recover any aluminium from the material. Recovered aluminium is returned to EGA's facilities, ensuring that no aluminium is wasted.

The dross recycling process also generates a salt slag by-product. A salt slag treatment facility was commissioned in 2020 close proximity to our facility in Al Taweelah. This facility treats the generated salt slag obtained through the dross recycling process, making this material available for use by the cement, steel and other industries.

emissions.



Waste from the refining of alumina

The most significant, and often challenging waste material generated during the alumina refining process is the bauxite residue. This material consists of the remaining ore fraction once alumina has been extracted through the Bayer process and comprises several metal oxides and some residual, highly alkaline compounds. The hazardous nature of bauxite residue is principally associated with this high alkalinity which, if uncontrolled, can significantly alter the chemistry of natural environments.

Globally, the most common approach to managing this material is large-scale storage in specially constructed dams and impoundments, with associated risks of environmental degradation of local watersheds and ecosystems. For decades, the industry has sought more sustainable and commercially viable methods.

At EGA, our bauxite residue is washed, pressed into a dry cake, and transported using a fleet of covered trucks to a purpose-built bauxite residue storage facility. This facility is located within an expanse of desert approximately 30 km inland from the coast in the Emirate of Abu Dhabi. It is fully lined and will be progressively sealed, with the land being made available for reuse for potential projects ranging from warehousing to a solar farm.

In 2022, we deposited 3.1 million tonnes of refinery waste at our facility, six per cent increase from 2021. The storage is not intended as our long-term solution for this waste. EGA has a dedicated R&D group tasked with identifying ways of converting this waste material into useful products, reducing or eliminating the need for storage and unlocking bauxite residue as a new material resource for the UAE.

Bauxite residue as a new material resource for the UAE



Optimised bauxite residue

(0)

For seven years, EGA has been conducting research into the potential conversion of bauxite residue into an environmentally benign raw material that could be used as a feedstock for other industries. We refer to this environmentally benign material as Optimised Bauxite Residue. (OBxR).

In 2022, we completed detailed engineering and a major cost review analysis of our pilot facility, that once commissioned will be able to convert up to six tonnes of bauxite residue into OBxR every day. This facility will implement a new hydro-metallurgical process that neutralises caustic bauxite residue into an environmentally benign raw material in a matter of hours, instead of undergoing decades-long natural processes. The first of its kind, the OBxR pilot plant has thus been aptly named Ra'ed, the Arabic word for pioneer. Construction of this pilot facility will commence in 2023, with commissioning now planned for 2024, eventually giving EGA the ability to conduct

large-scale, field-based plant growth trials using OBxR as a manufactured soil, suitable for arid climates.

Meanwhile, we also initiated the Small Soil Manufacturing & Research Facility (SSMRF) project which will provide interim capacity of up to 300 kg OBxR and up to 700 kg of soil per week. The SSMRF will provide EGA with research capability of similar precision to laboratory experiments while producing enough material for shade-house trials and small agronomic demonstration plots. It will also provide guidance for the operation of the larger Ra'ed pilot plant. A highlight of this facility will be a custom-built soil mixer that can handle sticky moist bauxite residue and mixes it with other earthen components like compost and sand into a homogenous soil mixture. In combination with our research and analytical capabilities in the laboratory, the Ra'ed and SSMRF projects enable EGA to conduct in house research at scales ranging from milligrams to metric tons.



Manufactured soils

EGA has worked with The University of Queensland's School of Agriculture and Food Science since 2017, exploring methods for the manufacture of soil from OBxR and examining its potential as a plant growth medium. We refer to this manufactured soil as Turba.

In 2022, EGA extended its partnership with The University of Queensland for a further 27 months to develop best agronomic practices for Turba in arid climates. This extension was based on the excellent work on seed germination, nutrient availability, plant growth, and water holding capacity, among others, conducted throughout 2022.

EGA also signed a new research agreement with the American University of Sharjah to continue our exploration of converting organic wastes abundantly available in the UAE into high-energy value bio-oil and acidic biochar. Biochar is a charcoal-like material used to improve soil stability and water retention that ultimately helps plants grow. The new study focuses on municipal biosolids, food waste and mixtures to produce acidic biochar and high-energy value bio-oil. In addition, the 32-month study aims at producing one of the most comprehensive Life Cycle Assessments to date with the University of Sharjah on the "food wastebiosolids-biochar/bio-oil nexus" that is based on actual experimental data. Municipal biosolids are generated at wastewater treatment plants and are well known emitters of greenhouse gases. Currently, much of the food waste in the UAE is either incinerated or landfilled, both resulting in greenhouse gas emissions. The development of biochar in the UAE will potentially find a role in EGA's future manufactured soils.



In 2022, we continued to sponsor bio-neutralisation studies of ATA bauxite residue with the University of Western Australia. Bio-neutralisation employs the use of naturally occurring microbial species to neutralise caustic-alkaline bauxite residue. The project team made excellent progress during the year, accelerating the neutralisation of bauxite residue from several days to within 48 hours using unconventional food sources to sustain the microbes in their reaction with the bauxite residue



Raw material for the steel industry

In 2022, we continued detailed investigations of the chemistry, mineralogy and physical characteristics of bauxite residue from our refinery which culminated in a technique for extracting high-quality iron ore. Further enhancements to the process at laboratory scale have shown that iron ore products can be produced with purities ranging as high as 62 per cent elemental iron content, comparable to commodity-traded iron ore fines.

Engineering in support of a pilot facility to test the base process at a small industrial scale began in 2022, and a proposal to proceed to execution was submitted for approval later in the year. The pilot facility is designed to produce thousands of tonnes of iron ore per year, and will be used to validate the process and gauge market acceptance of the product. If successful, a full-scale implementation of the process could follow, leading to up to 15 per cent of EGA's bauxite residue being converted into a valuable raw material for the steel industry.

Bauxite residue in construction products

We continued our development of a high-density, highstrength aggregate from bauxite residue combined with fly ash, another globally widespread waste material. In 2022, we engaged with potential customers for this product and based upon their feedback successfully conducted further research studies to modify the manufacturing process to better meet their requirements. Preparations to up-scale and commercialise the process, including testing at pilot scale, began during the latter half of the year.

Work on producing light-weight aggregates was restarted during the year, following the discovery of a new production technique that has given high yields and good reproducibility at laboratory scale. Products made using this new process compare very favourably with commercially available clay-based materials that are widely used around the world. Apart from construction aggregates, research also began on modifying the process to produce specialised aggregates for other applications.

Waste management in Guinea

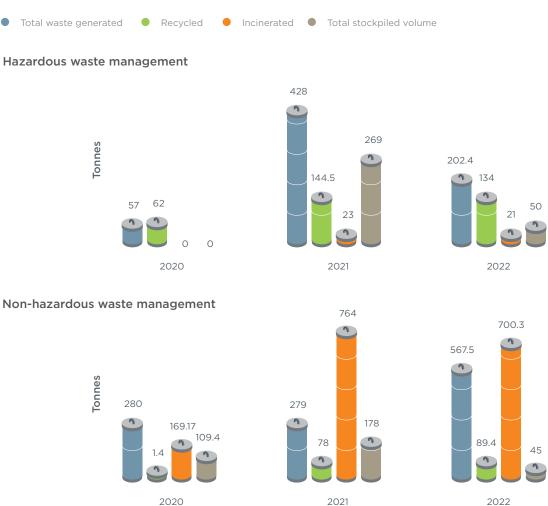
In Guinea, we consistently adhere to the waste hierarchy when making waste management decisions. We have developed a comprehensive waste management plan covering activities both at the port and mine site that is developed in accordance with both national and international standards⁴⁵.

The majority of our waste generated from mining operations is associated with the maintenance of machinery and equipment, as well as sanitary and domestic waste from offices and welfare facilities. Earth and vegetation material is reused wherever possible throughout our mine site.

In 2022, improvements in site management and clean-up activities resulted in an increase in nonhazardous, mostly construction-related, waste. Furthermore, the additional trucking distances and associated maintenance efforts have contributed marginally to an increase in maintenance-related hazardous waste.

Data regarding hazardous waste generation indicates a reduction compared with previous years, primarily attributed to improved waste recording practices and improved quality of data.

Figure 23: Waste types and disposal methods in Guinea^{46 47}



⁴⁵ Including the Equator Principles, the International Finance Corporation Performance Standards and regulatory requirements of the Guinean government

⁴⁶ Total stockpiled' includes the cumulative total of waste stored onsite in-year as well as from previous years. ⁴⁷ Weights are determined through the use of site-based industrial scales, with the exception of odd-shaped, non-bulk wastes which are estimated by volume

Some of our hazardous waste is presently stored and managed onsite as we explore potential opportunities for appropriate disposal methods, such as reuse or recycling. In 2022, we managed to recycle a significant quantity of hazardous waste following the identification of offsite hydrocarbon waste recycling facilities. Additionally, we also identified several recycling options for non-hazardous waste, eliminating the necessity for onsite storage. Sanitary and medical wastes are incinerated through an onsite incinerator⁴⁸.

Biodiversity

Biodiversity management in the UAE

In the UAE, our facilities at AI Taweelah are approximately two kilometres from Ras Ghanada, a nationally protected marine reserve, and our Jebel Ali site is approximately seven kilometres from the Jebel Ali Wildlife Sanctuarv⁴⁹. Both these protected areas support important clusters of coral, mangrove and seagrass.

At both of our operational sites in the UAE, our discharge monitoring efforts take account of these valuable conservation areas and, to date, we have not identified any adverse impacts associated with our operations after almost 40 years of operations.

In 2022, we continued our conservation efforts associated with the critically endangered Hawksbill turtle that visit the shores adjacent to our facility in Al Taweelah to lay their eggs.

To ensure EGA's operations do not disturb the beach ecosystem adjacent to EGA's Al Taweelah facility and minimise the risk of predation by any feral animals, EGA monitors the beach throughout the nesting season, conducting daily inspections, tracking nesting patterns, and installing protective buffers to keep nests safe from harm. EGA also arranges for waste that is washed up on the beach to be removed keeping the nesting site clean throughout the nesting season while also rescuing any distressed turtles that may be washed ashore.

⁴⁸ Operation of the incinerator is licensed by the local authorities and included in the scope of independent third-party audits conducted approximately every 6 months ⁴⁹ Confirmed as a wetland of international importance for biodiversity in accordance with the Ramsar Convention (an intergovernmental

environmental treaty established in 1971 by UNESCO).

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Preserving wildlife and safeguarding biodiversity is our shared responsibility. At EGA, we are committed to creating a sustainable future by protecting the ecosystems and firmly believing in the inherent right of every species to flourish.



Dr. Jasminka Jaksic Sustainability - Senior Associate

Any sick turtles or hatchlings found on the beach, EGA ensures care is provided by the Jumeirah Group's Dubai Turtle Rehabilitation Project, which in 2022 rehabilitated five juvenile Hawksbill turtles and one medium-sized green turtle during our monitoring efforts. This rescue was part of the rehabilitation programme that was in cooperation with Dubai Wildlife Protection Office, Dubai Falcon Hospital, and the Central Veterinary Research Laboratory. The turtles have since made a full recovery and been released back into the sea. In 2022, we recorded four nests and over 200 hatchlings. Since 2011, nearly 106 Hawksbill turtles have laid eggs at the EGA's Al Taweelah beach and almost 7,000 baby turtles have hatched.





Biodiversity management in Guinea

In Guinea, a thorough pre-construction environmental and social impact assessment verified that our mining concession, rail corridor, and port operations are situated near biodiversity areas of international importance. Our mining concession, covering an expansive 690 km², encompasses diverse ecosystems, including grassy and wooded savannahs, as well as gallery forests, all of which hold significant biodiversity value. Additionally, the coastal area of our port in Kamsar is home to mangroves along its shoreline. Furthermore, our assessments have confirmed that the habitats in and around our mining and port concessions support rich assemblages and important species of mammals, herpetofauna, avifauna and flora, including 23 International Union for Conservation of Nature (IUCN) Red List and National Conservation List species, such as the endangered West African Chimpanzee (Pan *troglodytes*) and critically endangered Atlantic Humpback Dolphin (Sousa teuszii).

All our biodiversity conservation work is governed through biodiversity management plans prepared in accordance with IFC Performance Standards and African Development Bank Integrated Safeguards System and made publicly available⁵⁰.

Prior to conducting any vegetation clearance, we map out plant assemblages and habitat types to fully understand the mitigation work necessary and ensure that our remediation efforts are suitably planned and financed to appropriately restore habitats once mining operations have concluded. Before clearing vegetation, we gather seeds from individual trees and subsequently cultivate them in GAC's nursery. This practice ensures that we preserve the same genetic material for future rehabilitation efforts. All of our biodiversity mitigation measures in Guinea are designed to achieve no net loss of biodiversity and a net gain for critical habitats⁵¹.

In 2022, the further development of our mine site has required clearance of 214 ha of vegetation. Prior to the clearance of any vegetated areas, we ensure pre-clearance surveys are undertaken by our environmental specialists to confirm rehabilitation plans are appropriate, that any translocation of certain species is conducted in advance and that we avoid damage to any areas of significant biodiversity value.

In 2022, we were also able to revegetate several areas that were cleared of vegetation as part of the construction of mine, railroad, pipeline and other infrastructure, restoring land coverage of 1,150,000 m² using species of local origin, such as 43,456 Afzelia Africana and 16,532 Erythrophleum guineense, grown in our own nursery and well exceeding the 2022 set target of 1.000.000 m².

The loss of biodiversity is accelerating through the diversity of our individual and collective activities. Given that the survival of human society depends on biodiversity. we must impose more restrictive rules on ourselves to reverse this trend by changing behaviour and procedures for managing biodiversity and ecosystems.



Barry Mamadou Samba Technical Field Manage MROP

During the development of our biodiversity management plans, we concluded that in order to appropriately mitigate impacts for the critically endangered West African Chimpanzee and achieve eventual net gains for this species, it would be necessary to establish a biodiversity compensation program area away from our mining concession. Thanks to close collaboration with the Guinean Office of National Parks and Wildlife Reserves, Wild Chimpanzee Foundation and IFC and Compagnie des Bauxites de Guinée (CBG) we are committed to establishing an enhanced, protected area for the West African Chimpanzee in Guinea and for this site to provide an example of global success in terms of the use of compensation in biodiversity conservation and sustainable development.

Known as the Moyen-Bafing Offset Project, activities include habitat enhancements, regular population monitoring, local community engagement and reforestation, all with the goal of increasing the local population of the West African Chimpanzee and restoration of the ecosystems included therein. On the 4th of May 2021, the president of the Republic of Guinea signed a decree establishing the Moyen-Bafing National Park, which is now protected area of 6,767 km² hosting the largest continuous population of chimpanzees in West Africa. This decree has been a significant milestone for the Moyen-Bafing Offset Project, which has now afforded both national recognition and legal protection.

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In a changing environment, there is no greater risk than standing still. We are the fruits of a drought, born of a transformation of the environment.



Haba Pierre enior Superintendent Biodiversity

The Moyen Bafing National Park was mainly designed to protect a large population of chimpanzees, representing, according to the Foundation for Wild Chimpanzees, about 3,500 individuals or about 10 per cent of the total population of West Africa. The chimpanzee is listed on the IUCN Red List as an endangered species due to the loss of its natural habitat and the pressure exerted on their populations by human activities, such as hunting and deforestation of the habitats that provide them with shelter and food.

This project also has well established socio-economic development program which aims to support local communities living near the Moyen-Bafing National Park. The program includes concrete actions to protect the park from harmful or unsustainable human activities, and to reduce the negative impacts of infrastructure development through the creation of buffer zones.

Local communities are made aware of the biodiversity conservation efforts and sustainable use of natural resources, where each year over 10,000 people benefit from the agro-ecological transition approach and subsidized social infrastructure.

The Moyen-Bafing National Park is an example of successful collaboration between the private sector, local authorities, conservation organisations and international financial corporations for the environmental protection and sustainable development. This park is now a valuable heritage for future generations.

⁵⁰ Available on the IFC project disclosure portal.

⁵¹ Critical habitats have been defined as either 1) habitat of significant importance to Critically Endangered and/or Endangered species; 2) habitat of significant importance to endemic and/or restricted-range species; 3) habitat supporting significant global concentrations of migratory species and/or congregatory species; 4) highly threatened and/or unique ecosystems; and/or 5) areas associated with key evolutionary processes.

Our response to environmental incidents

Our environmental management plans establish clear protocols for the identification, communication, classification, remediation and root cause analysis of environmental incidents. When assigning a classification to environmental incidents, we consider the magnitude and potential for adverse impacts to environmental receptors.

In 2022, EGA did not receive any fines or non-monetary sanctions for non-compliance with environmental laws or regulations.

Environmental incidents in the UAE

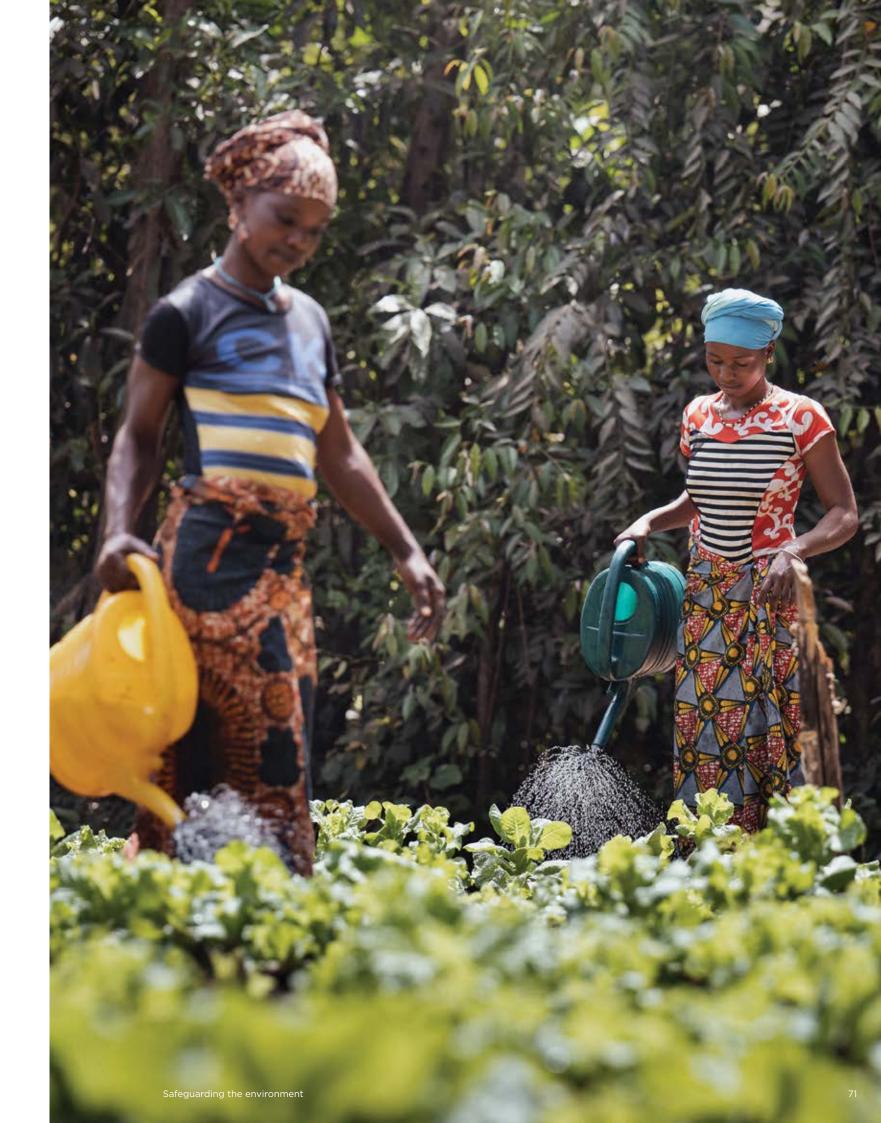
In 2022, we did not encounter any significant environmental incidents at any of our facilities in the UAE. However, we did raise several nonconformances associated with minor incidents at our facilities in the UAE, reporting each to the regulatory authorities. None of these incidents resulted in any adverse environmental impacts and were quickly remedied following control procedures defined under our environmental management system.

In 2016, we received a violation notice from the environmental regulator in Dubai related to NO. emissions originating from our power plant in Jebel Ali. This violation is primarily associated with our reliance on older, less efficient gas turbines. With the commissioning of our new H-class power block, the intent is to retire these older turbines enabling compliance with regulatory thresholds. Regrettably, due to operational disruptions associated with the new H-class power block, we were unable to meet regulatory thresholds throughout 2022. Nevertheless, we have initiated the formal process to close this violation with the environmental regulator as once the H-class power block is fully operational, we anticipate operating comfortably within regulatory thresholds.

Environmental incidents in Guinea

In early 2022, we have encountered an incident involving a diesel spill at the Thiouladji pump station at GAC. The incident was linked to the fault with the closure of diesel supply pipe resulting in spillage of diesel onto the surrounding ground. The contaminated soil was removed and sent for treatment. Furthermore, our environment team conducted an analysis of all nearby waterways, confirming absence of diesel contamination. Following the incident, a review was undertaken, identifying several areas for improvement. These improvements have since been implemented, including enhanced security measures and improved storage tank bunding.











Social responsibility

LALL LE



Health and safety management approach

At EGA, the health and safety of our employees, contractors and neighbouring communities is our top priority. Providing safe and healthy working conditions is the first commitment in our core policy⁵².

We also place significant importance on the mental health and well-being of all individuals working on EGA's premises, incorporating it into our comprehensive management systems.

We recognise that, like many industrial processes, there are numerous potential hazards associated with the production of aluminium such as exposure to noise, vibration, airborne contaminants, and dangerous materials, as well as moving machinery and working at height.

Smelting and casting activities include the potential for exposure to strong magnetic fields, high voltage, molten metal and high temperatures. Alumina refining poses hazards associated with the use of highly corrosive materials. While mining operations require large vehicular movements, the transport of heavy loads and controlled blasting.

EGA takes a proactive approach in identifying and addressing occupational hazards across all our operations and project sites and we actively involve our employees and contractors in this endeavour. Employing a hierarchy of controls, we prioritise the elimination of hazards whenever feasible, while minimising the risks associated with hazards that cannot be completely eradicated.

Occupational health and safety management systems and performance standards

Aluminium Stewardship Initiative

- Jebel Ali smelting and casting
- Al Taweelah smelting and casting
- GAC bauxite mine and export facilites
- Al Taweelah alumina refinery

ISO 45001:2018

- Jebel Ali smelting and casting
- Al Taweelah smelting and casting
- Al Taweelah alumina refinery

OSHAD

- Al Taweelah smelting and casting
- Al Taweelah alumina refinery

IFC Performance Standards and World Bank Guidelines

• GAC bauxite mine and export facilities

At each of our sites, we carry out risk identification, control identification and hazard elimination in accordance with statutory regulations and internationally recognized standards and guidelines.

Our committed safety team consistently examines safety data from all our operational and project sites, aiming to identify hazards, detect trends, identify potential concerns, uncover opportunities for improvement and determine areas that require heightened attention.

All of our facilities in the UAE operate according to an occupational health and safety management system certified to the International Organization for Standardization's ISO 45001:201853.

All our Abu Dhabi operational management systems are also developed to ensure alignment with Abu Dhabi's Occupational Safety and Health Centre's (OSHAD) System Framework. While all of our smelting and casting facilities in the UAE have been confirmed as meeting the ASI Performance Standards⁵⁴.

Our mining operations in Guinea adhere to occupational health and safety management systems that have been developed in alignment with various internationally recognized standards and guidelines. These include the International Finance Corporation Performance Standards, World Bank Guidelines, Equator Principles, African Development Bank's Integrated Safeguards System, as well as regulatory requirements set by the Guinean government.

⁵² Our core policies are published on our website https://www.ega.ae/en/about-us/our-policies-and-certifications



In the UAE, as well as conducting regular internal audits of our management systems, we are frequently audited by independent third parties against the requirements of ISO 45001:2018, OSHAD and the ASI Performance Standards.

Our Guinea operations are regularly inspected by an independent third party, to ensure that we adhere to the International Finance Corporation Performance Standards.

EGA's occupational health and safety management systems and associated safety controls are extended to all EGA employees and the directly supervised contractors⁵⁵ we work with. Indirectly supervised contractors are required to work to a health and safety system compliant with EGA's core requirements, as defined in our Responsible Sourcing Standards with risk assessments and operating procedures being reviewed by EGA's specialist safety teams.

⁵³ Our certificates are published on our website, see: https://www.ega.ae/en/about-us/our-policies-and-certifications ⁵⁴ Certificate and public summary report is available for review at https://aluminium-stewardship.org/about-asi/asi-members/emirates-

⁵⁵ Directly supervised contractors include workforce who are not EGA employees but whose work activities are directly controlled by

alobal-aluminium-pisc

EGA's health and safety procedures

Safety is a shared responsibility at EGA, where everyone working on EGA's premises is empowered to identify and propose safety-enhancing methods and raise safety concerns without the fear of retaliation. We provide various channels for suggestions and concerns, including dedicated reporting lines, smartphone applications, open suggestion schemes, toolbox talks, safety steering committees, virtual town hall meetings, regular safety meetings, and face-to-face interactions with our specialised safety teams. Our commitment extends to incorporating any improvements or updates to risk identification procedures, as well as implementing necessary controls and requirements for hazard elimination based on concerns or suggestions raised by our colleagues. Our safety teams provide guidance

throughout this process. Regardless of their position, every EGA employee has the authority to refuse or stop any activity that is deemed unsafe. We convey this message as part of our induction and safety refresher training.

Task-specific safety training requirements are communicated to staff and directly supervised contractors through appropriate, tailored training events with refresher courses, at a frequency relevant to the degree of risk⁵⁶. Training needs are identified according to assessment by EGA's safety professionals and effectiveness is monitored in accordance with our occupational health and safety management systems.

Figure 24: Safety training in 2022 (total number of attendees at safety courses)



EGA Life Saving Rules



⁵⁶ All safety training is free of charge and is provided during paid working hours.



EGA actively engages as a member of Health, Safety and Environment committees in industrial associations including the International Aluminium Institute and the Gulf Aluminium Council. This affiliation allows us to share performance data and gain insights from industry best practices.

Each incident at EGA is investigated by an appointed investigation team that consists of area management, subject matter experts and our specialist safety team, with investigations being reviewed by area managers and safety leaders. Our focus is the welfare of any injured parties, root cause analysis and suitable prevention. Our intention is to do whatever is necessary to ensure that nobody is hurt in the same way again.

At EGA, we aim to record all incidents and near misses no matter how small so we can track our performance accurately and continually improve the safety of our workplace.

For serious injuries, investigations are reviewed by our Executive Committee and the Technical and Projects Committee of our Board.

While robust safety systems, controls and training are essential, we believe that these alone are not enough. We work hard to instil a safety-focused culture that engages everyone who works for or with our organisation.



Safety performance

Safety performance in the UAE

In 2022, despite the increase in production we continued to record a low number of injuries with our total recordable injury frequency rate being 63 per cent lower than the industry average⁵⁷.

In 2022, we encountered zero fatalities at any of our operational facilities in the UAE.

Most of the safety incidents that occurred in the UAE involved either no injury or only minor injuries treatable by first aid, the main types of injuries were hand and finger injuries often associated with the use of hand tools. However, one of our contractors⁵⁸ and one of our employees suffered high-consequence iniuries⁵⁹.

One of our contractors sustained a fracture and laceration on his left foot while performing maintenance on a conveyor system. Unfortunately, while working, he accidentally stepped through an open inspection window and onto a moving conveyor. Prompt first aid was provided at our onsite medical facilities, after which our colleague was transported to the hospital. X-rays confirmed fractures in his leg and foot, necessitating surgical intervention. His wounds required long-term treatment, but fortunately, he made a full recovery after undergoing physiotherapy. Eight months after the incident, our colleague was able to resume normal duties.

In response to this incident, we conducted a comprehensive investigation specifically focused on the task being carried out at the time of the injury. As a result, we have implemented additional safety measures to improve the design and understanding of the conveyor isolation process during maintenance activities. We have also enhanced lighting conditions, installed new access points and working platforms. Furthermore, we have reviewed and updated all operating procedures and risk assessments related to the task performed during the incident.

⁵⁷ Industry average derived from data available from the International Aluminium Institute 2022. ⁵⁸ Directly supervised contractor working directly under EGA's health and safety management systems. health status within six months

EGA's mental health and well-being programme awarded as best in class

In 2022, our mental health and well-being programme was recognised at a regional human resources summit, the GOV HR Awards.



We made significant improvements in our mental health and wellbeing programme for employees amid the difficulties posed by the COVID-19 pandemic. Subsequently, over 170 of our employees have now received training to become "mental health first-aiders" and advocates, thereby supporting the availability of professional mental health resources within the workplace. Moreover, a volunteer-driven initiative conducts awareness sessions and workshops on critical mental wellbeing concerns. The aim being to promote the importance of prioritising mental health and eliminating any associated social stigma.

The second high-consequence injury occurred during a routine housekeeping task when, unexpectedly, an anode rod fell from a four metre high conveyor, striking the employee on his left side. Our colleague was immediately transported to the hospital, where x-rays revealed a leg fracture that required surgical intervention. It took over six months of rest and recuperation, but thankfully our colleague made a full recovery and was able to resume normal duties.

In response to this incident, we conducted a comprehensive investigation that focused on reviewing the securing mechanisms used for anode rods and assessing our existing controls for activities carried out near moving equipment. As a result, we have implemented improvements to our operating procedures and risk assessments, particularly emphasising the elimination of the risk of falling objects. We have also initiated a review process to identify a suitable technology, such as the installation of cameras and sensors, that can automatically disable the conveyor in the event of an improperly secured anode rod.

"

I feel immensely proud to be part of EGA's **Occupational Health and Safety Governance** team. At EGA, health and safety is integrated through all the levels in the business. There is no compromise when it comes to the safety and health of our resources - the real assets - people. EGA leadership ensures establishment of robust OH&S management systems, initiatives, programmes, provision of resources, best trainings and awareness to our people so that health and safety performance at EGA is of a very high standard.



Bhagyalaxmi Maruti uperintendent - Safety

Figure 25: UAE safety statistics

Working hours⁶⁰ (thousands)



4,557

20,338

2019

29

11

40

Employees Directly supervised contractors Total

Total Recordable Injuries (TRI)⁶¹

Employees Directly supervised contractors Total

Lost Time Injuries (LTI)⁶²



1 4

Employees Directly supervised contractors Total

Total Recordable Injury	2019
Frequency Rate (TRIFR)63	

Employees	1.84
Directly supervised contractors	2.41
Total	1.97

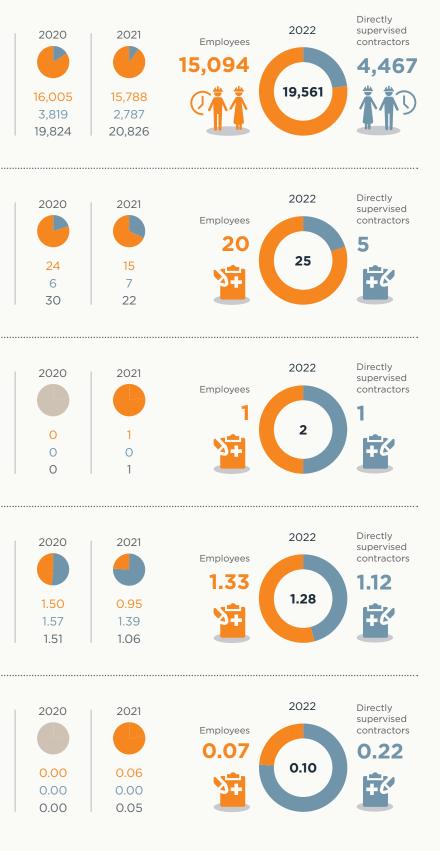
Lost Time Iniurv Frequency Rate (LTIFR)64

	0.19
ors	0.22

2019

Employees Directly supervised contracted 0.20 Total

⁶⁰ Working hours for employees have been calculated according to total hours paid. ⁶¹ Total recordable injuries is the sum of all work-related injuries and illnesses during the reporting period and includes any fatalities, lost time injuries, medical treatments or incidents leading to restricted work activities. ⁶² Lost time injuries is the sum of all work-related injuries or illnesses that result in an affected individual temporarily being unable to perform any regular job or restricted work activity on a subsequent scheduled workday or shift. ⁶³ Total recordable injury frequency rate is the total number of recordable injuries per million hours worked during the reporting period. ⁶⁴ Lost time injury frequency rate is the total number of lost time injuries per million hours worked during the reporting period.



Safety performance in Guinea

Despite the increase in production, in 2022 we continued to record a low number of injuries with our total recordable injury frequency rate in Guinea being 46 per cent lower than the industry average65.

In 2022, we had zero fatalities at any of our operational facilities in Guinea.

During 2022, most safety incidents involved either no injury or only minor injuries treatable by first aid. The main types of injuries being common hand and finger injuries often associated with manual handling.

However, two of our contractors suffered more serious injury.

One of our contractors was injured in an accident while refilling a fire engine with water, resulting in a fall from a height of three metres. The Emergency Response Team provided initial care and support prior to our colleague being taken to hospital where it was confirmed that he had suffered a fracture to his leg that required surgery. Thankfully, after three months of rest and recuperation, a full recovery was made and we welcomed our colleague back to work.

In response to this incident, we established a project team to conduct an investigation, identifying and reviewing all tasks and locations where working at height was required. Subsequently, the project team implemented a comprehensive range of new controls for working at height including modifications to enable activities to be conducted from ground level, the installation of guarded work platforms and revisions to standard operating procedures. We have also worked on increasing the level of understanding and awareness across the workforce through a series of toolbox talks, safety circulars and hands-on, practical-based workshops.

"

GAC's successful safety culture is not just about avoiding incidents, it is about creating an environment that empowers employees to speak up, share ideas, and work together to identify and address potential safety hazards.



Amadou Bachir Barry Safety - Officer

The second incident involved a high consequence work related injury⁶⁶ for a contractor who sustained a fracture to his foot while performing maintenance on the primary crusher⁶⁷. The maintenance was being conducted during a planned shutdown, during which the crusher's rollers and other moving parts were isolated and locked in place. While conducting maintenance on one of the rollers, the mechanical isolation dislodged causing the injured person to lose his balance and subsequently trap his foot. The Emergency Response Team provided initial care and support prior to our colleague being taken to the hospital where it was confirmed that his had suffered a fracture which required surgery. A full recovery will require more than six months rest and recouperation, nevertheless a full recovery is anticipated.

Our investigation identified that the mechanical isolation dislodged due to some of the vibration effects from maintenance activities. As a result of this incident, we conducted a comprehensive review of all the checks and approvals related to the mechanical isolation required for crusher maintenance. Consequently, we have implemented much stricter procedures and provided associated training to significantly reduce the probability of a similar accident occurring in the future.

Raising awareness on the dangers of working at height

In 2022, we conducted working at height safety training sessions adopting a visual and practical approach, rather than traditional in-class delivery.

Participants were trained on how to identify the 'fall factor' from certain situations, the correct way to secure a safety harness as well as the importance of safe access and egress using

A continued focus on driver safety



The potential for road traffic accidents involving our staff and our contractors is one of the key safety risks associated with our operations in Guinea, not just within our facilities but also for our colleagues travelling to and from work and between our sites.

⁶⁵ Industry average sourced from ICMM 2021. (https://www.icmm.com/en-gb/research/health-safety/benchmarking-2021-safety-data)

⁶⁶ Classified as high consequence as recovery to pre-injury health status is to take longer than six months.

⁶⁷ A crusher is a machine used in mining to reduce the size of large rocks or ore into smaller pieces.

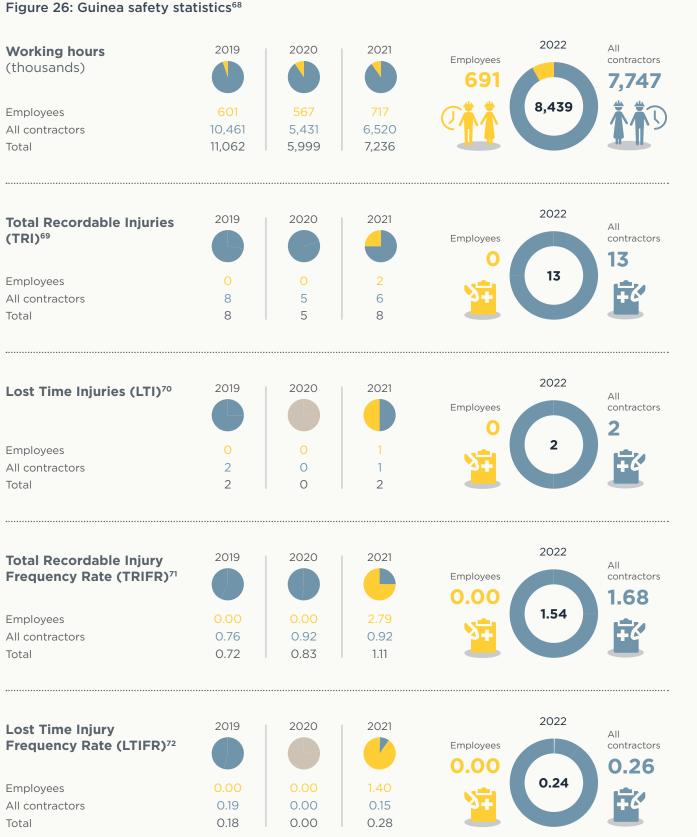
stairs and ladders. The training culminated in a realistic and impactful scenario where dummies were dropped from heights, with and without fall protection, to demonstrate the importance of safety protocols. This approach allowed for participants to learn and apply their knowledge through hands-on application while increasing awareness of the potential risks associated with working at heights.



In 2022, we worked with an international training provider to develop and launch a comprehensive road safety programme. The programme placed a high priority on revising GAC's driving practices and procedures,

as well as assessing the skills of existing drivers, from basic skills to "assisted driving," which involved specialised trainers coaching drivers in defensive practices in real traffic scenarios.

The programme also included a component focused on upskilling our own staff to be able to train others. Six trainees successfully completed this "Train the Trainer" course, acquiring the skills necessary to conduct proper training and assessment of drivers' competency.



⁶⁸ We have reported safety performance in Guinea for all contractors, considering that the majority of the key operational works are undertaken by indirectly supervised contractors.

⁶⁹ Total recordable injuries is the sum of all work-related injuries and illnesses during the reporting period and includes any fatalities, lost time cases, medical treatments or incidents leading to restricted work activities.

⁷⁰ Lost time injuries is the sum of all work-related injuries or illness that result in an affected individual temporarily being unable to perform any regular job or restricted work activity on a subsequent scheduled workday or shift.

⁷¹ Total recordable injury frequency rate is the total number of recordable injuries per million hours worked during the reporting period. ⁷² Lost time injury frequency rate is the total number of lost time injuries per million hours worked during the reporting period.





Keeping people healthy

Our continued response to COVID-19

During 2022, all our doctors, nurses, clinic staff, and occupational health and safety professionals in both the UAE and Guinea continued the fight against COVID-19, all being instrumental in safeguarding the health of everyone at EGA. During the first half of 2022, we continued to operate on-site medical centres specifically to assist in our response to the pandemic providing reverse transcription-polymerase chain reaction (RT-PCR) tests and rapid antigen testing at no cost to the individual, conducting more than 150,000 tests and administering more than 800 vaccines.

Throughout the year, as the number of cases started to diminish, we started to remove some of the stricter control measures that we had previously enforced during 2021 and 2020. However, we continue to monitor the number of cases in the countries where we operate and continue to promote caution should any of our colleagues or co-workers demonstrate any cold or flu-like symptoms. EGA's Medical Department manages a broad range of healthcare matters, including preemployment physicals, health surveillance, and addressing acute and chronic illnesses. They prioritize employee safety during the summer's heat, employing proactive health promotion and advanced equipment. This commitment reflects EGA's core principle of providing excellent medical care.



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Dr. Mohammed Firdouse Chief Medical Officer EGA Medical Centre

Healthcare in the UAE

We operate our own clinics in Al Taweelah and Jebel Ali staffed by a team of nearly 60 qualified doctors, nurses and other medical professionals, where we assess and attend to the health of our employees. Services at our clinics are also made available to family members of our employees and contractors. Over the last two years we took a significant step by opening our medical centre to the public, distinguishing ourselves as the sole healthcare facility within the expansive KEZAD area.

At our clinics we provide a comprehensive array of healthcare services catering to a wide spectrum of needs. Our services encompass primary healthcare, addressing day-to-day medical concerns and the ongoing management of chronic medical conditions. Additionally, we implement conservation programmes through our occupational health to safeguard the well-being of our employees while at work. These occupational health programme include a noiseinducing hearing loss prevention programme and annual periodic medical assessments tailored to each employee's specific exposure and risks. Our utmost priority is to ensure our staff's continued fitness and well-being while proactively identifying any early signs of potential health issues. In 2022 we provided more than 3,700 medical check-ups to employees, underscoring our commitment to their health and safety.

Heat-related illness is a common risk for industries working with molten metal, especially in hot climates. In the UAE, heat-related illness is classified as an 'occupational disease'. In 2022, we achieved our long-standing target of zero instances of heat-related illness. We attribute this to extensive campaigns that we run each summer on heat stress and hydration, reaching both employees and contractors.

As with every year, we promote health and hydration awareness during the summer months in the UAE, reminding everyone working at our sites to regularly hydrate, take regular breaks and immediately take rest should anyone suspect any symptoms of heat-related illness.

In 2022, we conducted more than 45,000 hydration tests to ensure people working on our sites remained suitably hydrated. Our goal is zero cases of heat-related illness. We have decades of experience in managing working safely in hot conditions, controlling exposure times and making sure our employees and our contractors remain hydrated.

Employee Assistance Programme helpline available 24 hours a day, 365 days a year. CONFIDENTIAL | FREE | MULTILINGUAL









Health promotion campaigns in the UAE

Throughout the year we run a series of highly visible health awareness campaigns in the UAE for our employees and contractors.

In 2022, as part of efforts to continue to provide the best possible healthcare and support, we ran a number of campaigns focusing on education and the importance of health check-ups. This included a



Figure 27: Heat-related illness cases in UAE



Figure 28: Occupational disease rate (ODR) in UAE⁷³



⁷³ ODR is calculated per million work hours. These figures contribute to EGA's TRIFR in the safety section.

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HOW TO GET IN TOUCH



kidney screening campaign with opportunity for a consultation with a urologist specialist, a dental health campaign with a mobile dental clinic, and a breast cancer campaign where participants listened to survivor stories, and a physiotherapy campaign with live consultation and therapy sessions. Over 1,500 people participated in the campaigns.

Healthcare in Guinea



In Guinea, we operate on-site clinics at both Kamsar and Tinguilinta, staffed by qualified doctors, critical care paramedics and nurses. Our principal mining contractor also operates a fully equipped clinic available to all staff at our mine site.

Our on-site medical facilities offer a range of essential services, including emergency medical care and response, primary and chronic healthcare, evaluations of periodic and pre-deployment medical findings, health education, infectious disease management, monitoring, and control, as well as laboratory services. These facilities ensure that comprehensive medical support is readily available to address diverse healthcare needs. In 2022, we performed over 2,000 medical consultations at our on-site medical facilities, and we are proud to report that we recorded zero occupational diseases amongst GAC's employees and contractors.

To ensure comprehensive medical support, we have continued partnerships with local medical centres, including Anaim Hospital in Kamsar and Clinique Ambroise Pare in Conakry. These collaborations enable us to access additional medical resources and expertise when needed. Moreover, our prescribed health insurance provider offers an international emergency medical evacuation service for severe cases. The availability of efficient medical evacuation services is crucial, particularly in remote or difficultto-reach locations, to ensure a timely and effective response to medical emergencies.



We provide medical health insurance coverage to all our employees, ensuring that they have access to incountry medical facilities without being burdened by financial concerns related to their medical treatment. This coverage enables employees to utilise available healthcare services and facilities with confidence, knowing that most of their medical expenses are taken care of.

Our clinics continued to provide physical examinations and screening tests to all new personnel and visitors. Additionally, we conduct regular checkups to assess ongoing fitness for work and identify any early indications of health issues among our staff. In 2022, we conducted over 1,800 medical inductions and 922 periodic medical check-ups for both employees and contractors, ensuring their health and well-being are prioritised.

In 2022, our medical teams provided health awareness sessions through a series of toolbox talks. Topics included the importance of good nutrition, mental health, hypertension, diabetes, first aid, snake bite response, COVID-19, HIV/AIDS and cancer screening. Through active engagement, we strive to foster a culture of well-being and hygiene that benefits everyone involved.

We fully recognise the importance of infectious disease monitoring, management, and treatment. Working closely with our medical service provider, we actively monitor and track international disease outbreaks and significant health concerns that may affect the region in which we operate. We also work directly with the Guinea National Health Department to track any potential health concerns within Guinea as well as the wider region. These partnerships enable us to respond promptly and effectively to any health issues that may arise and minimise potential impacts for our employees or local communities. We also acknowledge the significance of regular health checks for frequent travellers, aligning with the guidance of the World Health Organization (WHO) and the Centre for Disease Control and Prevention (CDC). As a result, we have maintained mandatory medical screening and COVID-19 testing for our employees who frequently travel. This approach ensures their well-being and mitigates the potential transmission of infectious diseases. By adhering to these measures, we prioritize the health and safety of our employees while proactively addressing the risk of disease spread.

Malaria is endemic to Guinea. In response, we have implemented a comprehensive malaria control programme that includes various preventive measures. These measures encompass mosquito fogging, larvicide usage, prevention of standing water, distribution of mosquito nets, bite prevention strategies, and awareness programmes for all employees.

On suspicion of a malaria case, we perform rapid tests to promptly detect and treat the infection. In 2022,



we conducted more than 500 malaria rapid tests. Additionally, our on-site laboratory offers innovative, accurate, efficient yet simple microscopic testing⁷⁴ for definitive diagnosing of malaria and other blood-borne parasites.

For all confirmed cases of malaria, we administer treatment promptly in adherence to the standard practice guidelines outlined by the World Health Organization (WHO). Each case is managed individually, aiming to achieve the most beneficial outcome according to the individual needs of the patient. In 2022, the encountered cases of malaria were predominantly of mild to moderate nature, displaying positive responses to both primary and secondary treatment regimens, as required.

We also provide malaria travel kits for employees who may be required to travel to remote areas with limited access to appropriate malaria test and treatment facilities. These kits consist of a malaria rapid test, medication for the treatment of malaria and associated symptoms, as well as the emergency contact details for our clinics.

Engaging with communities

As part of EGA's core policy, we respect our neighbours and are committed to positively engaging with local communities wherever we operate to maximise the benefits of our presence while mitigating potential adverse impacts.

We operate planned and targeted community engagement programmes across all of our sites in both the UAE and Guinea. We work with numerous stakeholders, including community representatives, non-governmental organisations, educational institutions and respective governments.

In Guinea, we have long recognised that the development of our mining operation would result in land-use changes and potential community disruption. With this in mind, we actively seek to minimise these impacts and where they are unavoidable, we have developed and implemented plans to alleviate, mitigate, or compensate.

We believe that the best way to maximise our positive impact is through grassroots community engagement initiatives that increase economic

opportunity and improve quality of life. Successful projects have included infrastructure upgrades, local business engagement, educational programmes, and employing community members where possible within our operations.

We also take into consideration the potential indirect impacts of our operations, such as increased migration to local towns and communities as economic opportunities in these areas increase.

All of our community impact assessments and project planning in Guinea are undertaken in accordance with the International Finance Corporation's Environmental and Social Performance Standards, Equator Principles, the African Development Bank's Integrated Safeguards System and regulatory requirements of the Guinean government. Associated studies, engagement plans, community investment strategies, closure and rehabilitation requirements, policies and reports are made publicly available on the IFC website⁷⁵, with implementation regularly monitored⁷⁶ by an independent third party to ensure that we are meeting our commitments.



75 For more information, please visit the IFC Project Information Portal website: https://disclosures.ifc.org/project-detail/ESRS/24374/guineaalumina-corporation

⁷⁶ Approximately every six months.



Community engagement in Guinea

In Guinea, EGA's social and human rights impact assessments⁷⁷ have confirmed that no indigenous people⁷⁸ are likely to be affected by our operations. However, areas of our bauxite mine's concession area, as well as the land required for its associated port, rail and other infrastructure facilities, overlap with pre-existing villages and communities.

As part of the assessment process conducted during the planning phase, we confirmed that our project required the resettlement of more than 270 households. Land acquisition, compensation, community engagement and resettlement plans were all prepared in accordance with IFC's Environmental and Social Performance Standards to ensure that any disruption was minimised and people's lives were not adversely affected.

We have been open and transparent in this process, engaging with communities in advance and ensuring free prior and informed consent for any relocation while making all resettlement action plans publicly available via the IFC⁷⁹ website.

To date, we have built 489 new houses, 13 new schools, eight new health facilities, 80 new groundwater boreholes, 604 solar pumping devices,

and protected over 100 hectares of agricultural land from saltwater intrusion. All of our community relocation projects also include livelihood restoration measures focused on land-based means of support in line with the rural and agricultural setting of the area.

We have set up multiple committees with a distinct focus on close collaboration with affected communities and local authorities during the entire resettlement planning and implementation process. These committees serve the purpose of identifying potentially vulnerable groups, overseeing compensation payments, and providing valuable guidance on resettlement site planning and housing design.

In 2022, we held 1,388 community engagement consultations and forums, engaging with 6,016 local community members, keeping them informed of our planned activities, the potential for foreseen impacts, proposed mitigation activities and to help us identify projects that could positively contribute towards an improved quality of life, beyond just impact mitigation.

⁷⁷ In addition to our human rights impact assessment in Guinea, we also conduct human rights impact assessments for new projects in the UAE

⁷⁹ For more information, please visit the IFC Project Information Portal website: https://disclosures.ifc.org/project-detail/ESRS/24374/guinea-

in accordance with the ASI performance standards. ⁷⁸ As defined by IFC's Environmental and Social Performance Standards alumina-corporation

Livelihood and social investment projects are identified through community-engagement forums and overseen by a steering committee, including representatives from local communities. In 2022, projects benefited more than 250 people with women accounting for over 75 per cent of the beneficiaries. Projects included the following:

- 1. Agroforestry projects, including:
 - A beekeeping project where 11 community members received bee hives, protective equipment and training sessions in honey harvesting techniques. The first harvest of 40 litres of honey was achieved in 2022.
 - The creation of a market garden promoting the self-employment of 63 community members. The project included technical training, agricultural equipment, and provided 15 tons of market garden produce for sale in 2022.
- 2. Distribution of agricultural materials and equipment to over 76 community members to enhance livelihood activities.
- 3. Training on financial management to encourage proper investment of compensation payments was provided to 200 people.

- 4. An agriculture project developing land for rice cultivation which included three shelters. More than 70 community members received over 300 kg of seeds and rice processing kits along with training on agriculture technical techniques.
- 5. The construction of a new community centre was completed in Sinthiourou Thiouladji providing a space for gatherings, skill development and capacity-building in the area. The centre includes a sewing training room equipped with sewing machines promoting education and selfemployment of 10 women trainees.
- 6. The Groupe of de Solidaritéy d'Epargne et de Crédit (GSEC) programme supporting community member social-economic activities through savings and credit programmes. GSEC has supported 30 existing and 124 new businesses. Beneficiaries receive capacity-building sessions in market research, marketing and accounting.





- 7. A community-based nurseries project to provide native species necessary for GAC's rehabilitation needs generating a viable business with revenue for 59 young men and 81 women. In 2022, more than 90,000 plants comprised of eight local species were produced. In addition to the direct revenue generated, some of the community members received employment in the rehabilitation process, protecting their natural resources. The generated revenue is used to build infrastructure including a solar panel powered water distribution system as well as additional working tools and seeds.
- 8. The construction and operation of smoking houses for locally caught fish. The infrastructure development was coupled with training on fish smoking techniques and financial management. In 2022, 5,000 kg of smoked fish was produced and the project diversified to smoke cassava and okra among other produce. In an effort to enhance visibility of local products, GAC sponsored members' participation in a national exhibition of local products in Conakry.
- 9. Two agriculture development projects have been implemented to ensure food security and support socio-economic development in the region of Boké. More than 180 members across seven localities received training on agricultural techniques and environmental considerations, spurring the creating of seven small businesses.
 - Market garden pastures were developed in three localities and in 2022 generated 12.5 ton of vegetables.
- More then 31,000 pineapple plants were planted in 2021 as part of a fruit cultivation project. The first crop of pineapple is anticipated for 2023.

We benefit from strong community support. This translates into a general atmosphere of harmony around our operations and is the result of GAC's strategy of maintaining an ongoing dialogue with all the communities affected by its mining operations.



Alhassane Sakho Community Relations - Manager

The resettlement has been an opportunity for everyone, especially us women, in terms of support and assistance in developing income-generating activities. The women and girls of Belikindy have been at the centre of all the programmes implemented by GAC. These days, we live in more comfortable homes with our families.





Diamilatou Diallo Community Member



Community health

Since we first embarked on our mining project in Guinea, we have run health awareness campaigns, reaching more than 6.000 people across dozens of surrounding local communities. Themes for these campaigns are designed to address the specific needs of the community and are therefore planned in close coordination with the community.

In 2022, our community health initiatives included the distribution of 5,000 mosquito nets among 27 nearby villages and GAC subcontractors' employees aiming to help combat the prevalent threat of malaria in the region. The GAC community relations team in collaboration with the GAC Clinic and care centre representatives, conducted communication and sensitisation sessions and prevention training, raising awareness and emphasising the importance of hygiene practices. As part of our internal efforts, we hosted a corporate toolbox talk on malaria prevention for all GAC and subcontractors' employees.

Improving career opportunities

Since 2014, GAC has trained more than 600 people from communities in Guinea through a series of vocational programmes designed to improve opportunities and career prospects, including by giving people the skills to start their own businesses.

In 2021, in collaboration with the development finance institution, DEG⁸⁰, we opened a USD 1 million advanced automotive training centre, located in the city of Boké near our bauxite mining concession. The centre is supporting local Guineans seeking a future career in mechanics. Capable mechanics are highly sought after and valuable employees in the Guinean mining industry. Some graduates from the automotive training centre are expected to choose to start their own vehicle repair businesses, contributing to broader economic development and creating employment opportunities for others.

In 2022, 23 students, including five women, successfully graduated from the training centre, with twelve students being directly employed as mechanics within mining companies and professional garages. The second cohort of 25 students started the programme in December of 2022.

We also continued with our long-running support of the Belikindi youth cooperative, which in 2022 trained a further 32 young women in modern sewing techniques for the production of personal protective equipment (PPE) used in the mining industry. We, as well as our subcontractors, have subsequently started to source some PPE from the Belikindi youth cooperative.

GAC, as a main sponsor of the Mining Symposium in Guinea, promotes the automotive training centre and the sewing centre activities through

exhibitions, workshops and in 2022 a fashion show presenting all PPE produced by the Belikindi youth cooperative. The symposium is an opportunity to market the skills and products being developed as well as identify the potential partnerships to continuously enhance the operations and quality of the programme. Through GAC's advocacy efforts, Belikindi village has obtained internet coverage by Orange, and is now reachable at anytime.

Security practices in Guinea

As part of our human rights risk assessment, we have considered the potential for negative interactions between the community and security personnel. Security for our operations is provided by both an external security provider and our own security staff, all of whom have been trained to follow the Voluntary Principles on Security and Human Rights⁸¹.

Crisis scenarios and security responses that could create or exacerbate community tensions are reviewed with planned mitigation measures to ensure GAC understands its role and that staff are appropriately trained. Training components include relevant Guinean and international laws and the UN principles concerning the use of force and arms.





My training at Cepernunez allows me to use modern equipment in the maintenance of light vehicles and I can say that at the end of this training, I will be competitive on the job market.



Dienaba Caroline Olemou econd Cohort Trainee

If there is a project with which I am delighted, it is the support provided to the Cooperative Belikindy Couture "COBEC" a sewing programme. In two years, we've graduated from a face mask to mining uniforms. It is more than gratifying, it is an achievement for GAC and the beneficiaries of this project.



Alpha Mamadou Diallo Senior Officer Community Project

Before the sewing programme project, we were sitting at home and now we have a job. We learnt a lot about sewing uniform, hat protector, flags, and many items used by mining companies. In the near future, we could produce and generate revenues without depending on our parents or relatives. We thank GAC and its partners for the initiative.



Fatoumatou Kante General Secretary - Cooperative Bélikindi



Community engagement in the UAE

In the UAE, EGA maintains a dedicated corporate social responsibility team responsible for actively engaging with local communities. The primary objective of these interactions is to gather valuable feedback and gain a comprehensive understanding of how we can contribute to enhancing their quality of life. These engagements are conducted through multiple channels, including direct meetings with local communities, regulatory authorities and non-profit organisations.

As part of our CSR priorities, EGA commits to engage with local communities to understand their concerns and develop a community investment plan relevant to the neighbouring community needs. In my role, I take ownership and support EGA's efforts to translate this commitment to improve the lives of the community around us.



Khawla Mohamed AlHosani Corporate Social Responsiblity Senior Officer

"

Updating our community needs assessment

In 2022, we updated our community needs assessment for both our sites in Al Taweelah and Jebel Ali with the intention of gathering further insights and understanding of the requirements of the local community. The assessment process involved conducting interviews with approximately 1,000 residents from both sites.

Our CSR team recognised the importance of considering the perspectives and opinions of various stakeholder groups residing in the community. By encompassing a wide range of stakeholders, such as residents of different age groups, genders and nationalities, the assessment sought to obtain a comprehensive understanding of the community's needs and preferences.

During the interviews, residents were asked about their experiences, concerns, and aspirations related to living in Jebel Ali and Al Samha (the closest residential communities to EGA's facilities in the UAE).

The assessment covered a broad range of topics, including but not limited to environmental impacts, health and safety considerations, infrastructure requirements, employment opportunities, community services and social integration.

The data collected from the interviews were reviewed to identify common themes and any key concerns to help guide decision-making and prioritise EGA's future initiatives. These will actively contribute to the local community and will commence in 2023.

Engineer the Future



EGA first launched the school outreach programme in 2017, collaborating with Emirates School Establishments⁸² and working with Edutech⁸³ to provide training through a series of workshops to promote understanding of science, technology, engineering and mathematics-related subjects (STEM) among UAE high school students.



⁸² In 2021, the Emirates Schools Establishment was established as an independent government entity that manages and operates public schools in UAE. It oversees the implementation of policies, strategies and standards related to the education sector ⁸³ Transforming education with hands-on and technology-based learning solutions in educational campuses and organisations across the Middle East

EGA 2022 Sustainability Report



In 2022, our school outreach programme included the "Engineer the Future" educational outreach programme, specifically targeting students in grades 9 to 12. The programme is intended to serve as a bridge between classroom learning and industry practices, with EGA representatives conducting visits to secondary schools offering interactive learning experiences that cover various themes ranging from sustainability to innovation. The intent is to foster a passion for STEM subjects among students, encourage innovative thinking, and provide them with real-world exposure to the industries associated with science, technology, engineering, and mathematics.

The programme provides students with a hands-on interactive learning experience through a series of workshops and an open-stage event intending to actively engage students in STEM-related activities and discussions. In the 2022-2023 academic year, we provided training for 6,767 students from 24 schools.

The programme also includes a design challenge, providing the opportunity for students to apply their knowledge and creativity by developing innovative concepts. Students can form teams and choose from various competition themes, including sustainable mobility, architecture and product design. To participate, students are required to develop a project portfolio and submit it for evaluation. Twenty finalist teams are selected to work on developing prototypes, which are then assessed by a panel of relevant experts. During the application process, EGA provides mentoring support, with a group of 20 EGA mentors guiding the students through the technical aspects of their projects. Winning projects included a design and model prototype for an aluminum-based solarpowered cargo train, as well as a design and model prototype for a hotel that blends into the unique desert landscape of the UAE.

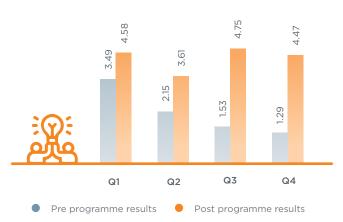
Great content and great approach to inspire the students. This kind of a programme is much needed in our schools.

Eng. Samia Umm Kulthoom School

Figure 29: Students who participated in the 'Engineer the Future'







Q1: Your current interests in STEM fields

Q2: Your current interests in learning problem-solving and critical thinking techniques

Q3: Your current interest in pursuing a career path in STEM fields **Q4:** Your knowledge of aluminium production process





Entrepreneurship programme

In 2022, we launched the EGA Ramp-Up programme to support the development of entrepreneurs in the UAE. This programme aims to provide practical support and coaching to entrepreneurs who are focusing on sustainability, new technology, human capital development and social advancement. The overarching goal is to establish these businesses as potential future suppliers to EGA.

EGA Ramp-Up seeks to attract a diverse range of aspiring and recently established entrepreneurs. In Phase 1, which commenced in 2022, we conducted a three-month campaign that featured informative online courses on effective entrepreneurship. These courses equip participants with the necessary knowledge and skills to successfully establish and manage their businesses. The campaign resulted in over 600 applications, with 32 per cent of the applicants being female entrepreneurs.

Also in 2022, EGA signed a Memorandum of Understanding (MOU) with the Ministry of Economy

under the Entrepreneurial National programme representing the endorsement and support of the Ministry for our programme's objectives and initiatives.

In the next phase of the programme, selected startups will receive comprehensive training opportunities and gain access to EGA's network of experts and mentors. This support system will assist start-ups in navigating challenges and accelerating their growth. Eligible start-ups that align with EGA's strategic objectives may also have the opportunity to receive financial rewards and explore collaboration opportunities with EGA.

The implementation of the EGA Ramp-Up programme reflects our commitment to nurturing the entrepreneurial ecosystem in the UAE. By providing valuable training, mentorship, and collaboration opportunities, our aim is to empower entrepreneurs and contribute to the growth and diversification of the UAE economy.

Aluminium recycling

In 2022, EGA alongside beverage producers, can-makers and waste management companies, developed the UAE Aluminium Recycling Coalition. The coalition aims to encourage UAE consumers, particularly in regard to beverage cans, to participate in aluminium recycling. Recognising that individual decisions on waste disposal influence collection rates, the coalition seeks to raise awareness and promote recycling efforts.

The coalition consists of EGA, Abu Dhabi Waste Management Company (Tadweer), Aujan Coca-Cola Beverages Company, BEEAH Tandeef, Pepsi-bottler Dubai Refreshment, CANPACK, Crown Bevcan EMEA, DULSCO Group and RECAPP by Veolia.

As its initial project, the coalition plans to support a study conducted by the International Aluminium Institute on aluminium recycling rates and behaviours within the UAE. This study aims to comprehensively evaluate the potential for improvement and identify viable solutions. The International Aluminium Institute, a global industrial association for the aluminium industry, is undertaking similar studies worldwide.

The coalition also anticipates providing support to the government in developing regulations and policies pertaining to aluminium recycling. Furthermore, it aims to collaborate with the government to advance the establishment of aluminium recycling infrastructure.

Also in 2022, EGA partnered with RECAPP to facilitate the promotion of aluminium recycling within schools and universities across the UAE.

The initial phase of the project focuses on 12 educational institutions located near EGA's operations in Abu Dhabi and Dubai. RECAPP, as the implementation partner, will oversee the establishment of recycling drop-off points strategically positioned for convenient access by students. The objective is to generate greater interest and awareness among young individuals regarding the importance of recycling.



Gender diversity

In 2022, EGA demonstrated its dedication to fostering gender equity by becoming a signatory member of the United Nations Women's Empowerment Principles. This commitment aligns with our broader objective of promoting gender equality within our organisation and beyond.

Also in 2022, we surpassed our expectations for female participation in our CSR programmes. We have integrated targets in our CSR programmes to reach at least 50 per cent female participation in our Engineer the Future programme and 30 per cent in our entrepreneurship programme. In 2022, we surpassed both of these targets by working with Emirates Schools Establishment as well as making specific efforts during advertising and awareness campaigns to attract a greater female audience.

To further advance gender equality in the UAE, we engaged in fruitful discussions with multiple community stakeholder groups. These constructive dialogues involved esteemed organisations such as UN Women, the Gender Balance Council, the General Women Union, and the Dubai Women Establishment. By engaging with these influential entities, we aimed to explore actionable ways in which EGA could further support gender equality in the UAE, particularly within heavy industry.

Volunteering

EGA promotes volunteering opportunities among the EGA workforce. Volunteering opportunities could include support work in local communities, humanitarian work to support overseas disasters or involvement with our CSR projects that promote STEM education, entrepreneurship or recycling.

EGA offers volunteering opportunities for all its employees. As part of its commitment to community involvement, EGA provides designated time during work hours for employees to engage in volunteer activities.

Community grievance management

EGA has a formal grievance mechanism at all of our locations in both the UAE and Guinea, giving anyone within the community the opportunity to raise concerns or queries associated with our environmental and social performance. Our aim is that our grievance process provides the community with easy access and enables us to find effective solutions to any complaint quickly.

In the UAE, we have a dedicated phone line accessible 24/7 with details published on our website⁸⁴. Calls are monitored and picked up by our in-house dedicated corporate social responsibility team. In 2022, EGA in the UAE did not receive any complaints from the community.

In Guinea, we have established a network of community liaison officers within local communities who are able to record any grievances and raise them directly with GAC's community relations team. We also provide a dedicated phone line accessible 24/7 with details made available on posters distributed within and nearby local communities. We register and investigate all complaints to understand the problem and find the best solution available.

Social responsibility

Figure 31: Volunteering efforts in the UAE during 2022



In 2022, we received 160 grievances, mainly associated with land access, physical resettlement and compensation. 148 grievances are resolved and the remaining are actively being worked on in collaboration with the complainant, relevant specialists, engineering teams and local authorities as required. Our target is to address complaints within 30 days. In 2022 of the closed grievances eight exceeded our 30 days resolution target. These grievances were of a complex nature and included mostly repair of technical defects requiring outside contractor support (including roof and ceiling repairs to infrastructure).

> **Dedicated hotline for** community feedback for complaints in the UAE

+971 2 509 4535

Dedicated hotline for community feedback for complaints in Guinea

+224 611 11 1134

Working at EGA

We prioritise the well-being and professional growth of our employees, aligning with our four core values: Ownership and teamwork, Integrity and fairness, Safety and sustainability, and Innovation and continuous improvement. These values form the foundation of our commitment to creating a positive work environment, fostering equity, promoting employee well-being and encouraging collaboration among teams. By upholding these values, we strive for the overall success of our business and the satisfaction of our workforce.

Our goal is to attract and retain top talent by offering competitive salaries and benefits. We want to provide high-quality recruits with growth opportunities and with a positive work environment to retain talented employees for the long term.

To ensure employees' overall happiness and wellbeing, EGA offers a variety of benefits at our UAE operations. Our employees are entitled to life insurance, health insurance, medical check-ups, parental leave and compassionate leave.

In Guinea, our human capital policies and procedures are aligned with associated $\rm ILO^{85}$ and $\rm IFC^{86}$ performance standards. Most of our employees are members of one of the national trade unions for the mining sector, and 100 per cent of GAC's employees are covered by collective bargaining agreements⁸⁷. GAC has established a rapport with the unions in the company and meets with their representatives guarterly to prevent and resolve any potential workrelated issues⁸⁸.

Freedom of association and collective bargaining are restricted under UAE law. Nevertheless, at all levels of our organisation, we encourage open communication and support colleagues in sharing their concerns and ideas for improving our working environment and the well-being of our staff. In the UAE, we also provide a dedicated employee care centre managed by a contracted third party. The primary purpose of this facility is to support our entire staff by addressing any inquiries, concerns or problems related to their employment in EGA.

We value our employees' viewpoints highly and actively encourage feedback through employee engagement initiatives.

During 2022, we implemented the "Mashura⁸⁹ Pulse" survey, which occurs once a year, aiming to concentrate on specific dimensions of employee engagement. This survey serves as a valuable tool for consistently gathering insightful feedback, fostering enhanced engagement and communication within the organisation.

By conducting this survey once a year, we aim to gain valuable insights that can guide us in making improvements and fostering a more engaging and cohesive work environment.

In 2022, Mashura Pulse was conducted with a focus on various dimensions, including sustainable engagement, the role of leaders, Najah⁹⁰, safety and sustainability, ownership and teamwork, integrity and fairness, and innovation and continuous improvement. These dimensions provide valuable insights into different aspects of our organisation and allow us to assess and enhance various areas of our operations.

To ensure impartiality and protect confidentiality, we enlisted the services of an external provider specialised in conducting engagement surveys to administer all our Mashura Pulse surveys. This approach ensures an unbiased and confidential process throughout the survey administration.

Following each survey, the main findings are shared with our executive committee as well as with all leadership teams in all functions. Each function is then supported with an action planning workshop whereby they identify and lead actions for improvement, with regular updates given to the executive committee.

In 2022, we collected feedback from over 6,000 staff members across all of EGA's operational facilities. Subsequently, we developed and executed actions based on the insights and recommendations identified from this feedback, which included:

• Enhanced learning opportunities, related leadership programmes and access to a range of online

⁸⁵ International Labour Organization

⁸⁷ In Guinea, minimum notice periods regarding operational changes and provisions for consultation and negotiation are specified in collective bargaining agreements

⁸⁸ Federal Law no. 3 of 1987 (as amended).

⁸⁹ Mashura is an Arabic word meaning consultation or advice. It refers to the process of seeking guidance, advice, or counsel from others, often with the intention of making informed decisions or solving concerns.

⁹⁰ Najah is an Arabic word meaning success or achievement

People are in the heart of everything we do in EGA. Providing a wide variety of opportunities and customised development programmes to our employees is essential to ensure continuous capability building and growth for our people.



Laila Mohamed Saif Director - HC Strategy & Operations

learning platforms to foster a mindset of career growth and ownership.

- Improved visibility of departmental updates via newsletters, townhalls, team events and Q&As fostering more transparency aimed at creating closer collaboration with leaders and team members.
- A variety of team building activities focused on collaboration, knowledge sharing and relationship building.
- Increased dialogue on topics such as diversity and inclusion related to the values of integrity and fairness.
- Improved leadership visibility and engagement with the rest of the organisation via walkabouts, open-door practices and visits to the shop floor, giving employees opportunities for direct communication on thoughts and ideas.

Furthermore, in 2022, EGA organised a number of townhall sessions to actively seek feedback from employees and provide responses to their inquiries, ensuring a platform for open communication and transparency.

Executive remuneration

At EGA, senior executives pay is determined in accordance with our Executive Compensation policy, which details entitlements around fixed pay, short term incentives and allowances. EGA does not currently operate any sign-on bonuses or recruitment incentives; however, executives can be included in the company's long term incentive, subject to Board approval. The longterm incentive is a formal plan that is administered

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Employee rights form the cornerstone of a fair and respectful organisation. Treating employees with dignity and justice is not only a moral obligation but also a guarantee of success and prosperity for any organisation." with her profile picture provided previously.



Damba Camara Human Capital- Operations Manager

"

through a plan document which includes terms and conditions. Those terms and conditions include clawback conditions.

Each executive is assigned a job level in EGA's grading structure depending on the job evaluation of the position. Each level has a corresponding salary scale which is used to determine fixed pay. Variable pay is primarily focused on two main variables, the short-term incentive and the long-term incentive. Both incentives are driven by the company's individual and functional performance scorecards. ESG goals related to environment, people and sustainability are represented in each programme based on Board Approved scorecards which are set each year. The long-term incentive program is based around 3-year performance period and ESG measures currently make up 30 per cent of the total award.

All remuneration policies for EGA Executives are approved by the EGA Board after receiving endorsement from the Human Capital Committee (a sub-committee of the board). The EGA Board is comprised of members from outside of EGA as well as EGA Executives. The Human Capital Committee is comprised of members from outside of EGA as well as the Managing Director of EGA. The Board Members are primarily representatives of the organisation's shareholders.

Independent remuneration consultants are retained by the organisations reward and human capital leadership to support in the design, benchmarking and implementation of any changes to executive pay structure. Additionally, benchmarking analysis on executives pay is conducted regularly through retained third party providers.

⁸⁶ International Finance Corporation

Figure 32: Employee retention in the UAE⁹¹

Figure 33: Employee retention in Guinea



⁹¹ All employment statistics are calculated based on the number of FTE's as of Dec 31st 2022. The exception being the attrition rate which is calculated based on the sum of total FTE's for each month of the year, divided by 12.

⁹² In EGA, minimum notice period regarding operational changes is 3 months.

Our UAE residential facilities

Our residential facilities in the UAE are located in Jebel Ali and provide homes for more than 2,000 people, providing accommodation for both employees and contractor staff that work at our UAE facilities. These residential facilities in have been in operation since the early days of operations in Dubai.

However, during the peak of the COVID-19 pandemic, in April 2020, the government imposed travel restrictions between Abu Dhabi and other Emirates as a measure to curb the virus's spread. Given that some of our staff and regular contractors at AI Taweelah reside outside the Emirate of Abu Dhabi, we made the decision to provide temporary accommodation available in Abu Dhabi to ensure their continued ability to commute to work. As a result, in 2020, we secured rental accommodations on Al Saadiyat Island in Abu Dhabi and facilitated the transition for both our employees and contractor personnel. As government restrictions have eased and the pandemic threat diminished, in 2022, we completely phased out the use of the Al Saadiyat accommodation facilities.

For our long-term facilities in Jebel Ali, and during the usage of accommodation facilities at Al Saadiyat, we adopted proactive measures to collect feedback from residents. This approach helps us gain insights into areas where we can enhance our facilities and address any concerns raised by residents. In response to residents' feedback, we have updated air conditioning systems at our accommodation facilities in Jebel Ali, provided free laundry services that include delivery, continued to provide maintenance teams available on call for seven days a week and free high-speed internet access for all residential areas.

At our recreational facility in Jebel Ali, we have always provided substantial recreational facilities for residents, including a swimming pool, golf course, tennis courts and cricket ground. We also provide residents with a transportation service to reach recreational destinations in Dubai. All residents have access to free, 24-hour medical care at our onsite clinics staffed by qualified doctors and nurses.

"

The residential area is my second home, a home away from my home in India. I am a camp resident throughout my service in EGA for the past 27 years in EGA. The facilities of the residential area are world-class and comfortable. I enjoy the recreational activities, flexible transportation, and different country cuisines, which one cannot experience living in the city. I can get all the connections with nature in one place without having to travel far. The manicured gardens, the playground, and the beach offer a sense of peace and relaxation.



Chidambaram Mahalingam Senior Technician - Production Control Casthouse

In the last 18 years day to day, my experience at residential is getting better as we have peace of mind. I adore the amenities offered, the kindness shown to us, and at EGA Residential Area we are ONE.



Shahid Aziz Technician - Casting Casthouse

My ten years of residential experience have shown that cleanliness is outstanding, the services provided are pleasing as is the greenery at our accommodation.



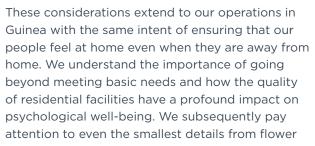
Nino Elizaga Agabin Operator - Rodding Room Carbon and Port

Our EGA Jebel Ali residential area facilities include:



• Swimming pool

- Golf course
- Cricket ground • Men and ladies gym
- Billiards
- Hockey field
- Badminton court
- Football ground
- Tennis court
- Basketball court for men and women
- Volleyball court
- Music room
- Ladies' indoor games facility
- Gardening club
- Fishing pier
- Local supermarket
- BBQ area
- Laundry facility
- 24-hour reception Free Wi-Fi
- Medical clinic
- ATM
- Mail room



beds to setting up a mountain bike workshop such that residents can enjoy the neighbouring countryside.

In 2022, we upgraded our residential site at Tinguilinta, including the addition of a swimming pool, updates to our gym, renovations of our canteen, and improvements to accommodation facilities.

Diversity, equity and inclusion

At EGA, we proudly welcome employees from diverse corners of the globe. We are a global organisation with a global workforce comprised of over 80 different nationalities. We embrace and celebrate the wealth of perspectives, ideas and cultures that such a diverse workforce brings.

We support the shared goals of both Guinea and the UAE to enhance the skills and employability of their respective citizens, thereby unlocking their full potential for contributing to the national economy. In both Guinea and the UAE, we have taken concrete steps to realise this commitment by setting local recruitment objectives aimed at increasing the representation of locals within our workforce. Our Emiratisation and Guineanisation programmes provide well-defined pathways for career progression through structured development and training programmes, designed to attract, develop and retain UAE and Guinean nationals within our organisation.

Of our 6,700 employees in the UAE, 1,249 are UAE nationals, representing over 18 per cent of the workforce. In Guinea, of our 424 employees, 363 are Guineans representing 85.6 per cent of the workforce. In Guinea, our hiring practices place emphasis on individuals who have been directly impacted by our zone of influence, wherever the right skill set is available. At EGA, we recognise



85.6% of our staff at GAC are Guinean nationals

that the metals and mining industry has historically been a very male-dominated sector capable of creating a non-inclusive work environment for female employees. At EGA, we are seeking to challenge this archetype, with plans to create a more inclusive workplace and increase the female representation among our workforces.

In the year 2022, we expanded our efforts towards promoting gender equality and empowering women. We focused on improving employment practices, creating more training opportunities and enhancing the fair distribution of contracts.

Our Code of Ethics⁹³ expressly prohibits any form of discrimination based on gender. Our basis for hiring is built on a consistent, fair and merit-based approach providing equal opportunities irrespective of gender. Furthermore, our remuneration structure remains identical, ensuring gender equality in compensation.



Employee diversity in the UAE

In 2022, 20.6 per cent of all management and supervisory roles in the UAE were held by women and our goal is that 25 per cent of supervisory positions are held by women by 2025. We are aiming for 15 per cent of all positions at EGA to be held by women by 2026.

We support new, expectant and nursing mothers (recognising the potential risks from heavy industry) while also providing maternity leave either above or in accordance with statutory requirements⁹⁴. We have, additionally, established a number of nursing rooms across the organisation.

In 2022, we set a clear diversity equity and inclusion strategy incorporating 17 initiatives, ranging from improving site facilities for women across our operations and policy updates, to advocating for gender diversity more broadly in our society. The strategy sets clear expectations, and every department has an annual gender diversity target to achieve.

To achieve our goals, we recognise that we need to accelerate progress. We want to ensure that EGA is a welcoming place for women, particularly in parts of our business where few women have worked before. With this in mind, we offer many courses to support gender diversity such as women in leadership, inclusive leadership communication and unconscious bias.

In Guinea, we understand the importance of expanding opportunities and choices for female employees while recognising the diverse cultures and faiths present in the country. Our efforts to promote gender equality extend not only to our employees but also to our engagement with neighbouring communities. Our community programmes place a strong emphasis on supporting female community members, taking into account the needs of their families, especially those with young children.

During the year 2022, we onboarded 100 Emirati women, which comprises nearly half of our total intake of Emirati nationals.

UAE nationals UAE 1.249 2019

(UAE)

UAE nationals

Total staff

93 Available at https://www.ega.ae/en/about-us/our-policies-and-certifications



20.6% of management and supervisory roles in the UAE held by women

graduate trainees employed at EGA, of whom 52 are women

44

female national trainees⁹⁵ employed, after opening our National Training Programmes to women for the first time in 2022

⁹⁴ In Guinea, maternity leave is also established through collective bargaining agreements, reflecting the local labour codes. ⁹⁵ A government initiative to promote opportunities for UAE nationals in the labour market.

Figure 36: Employee diversity in the UAE





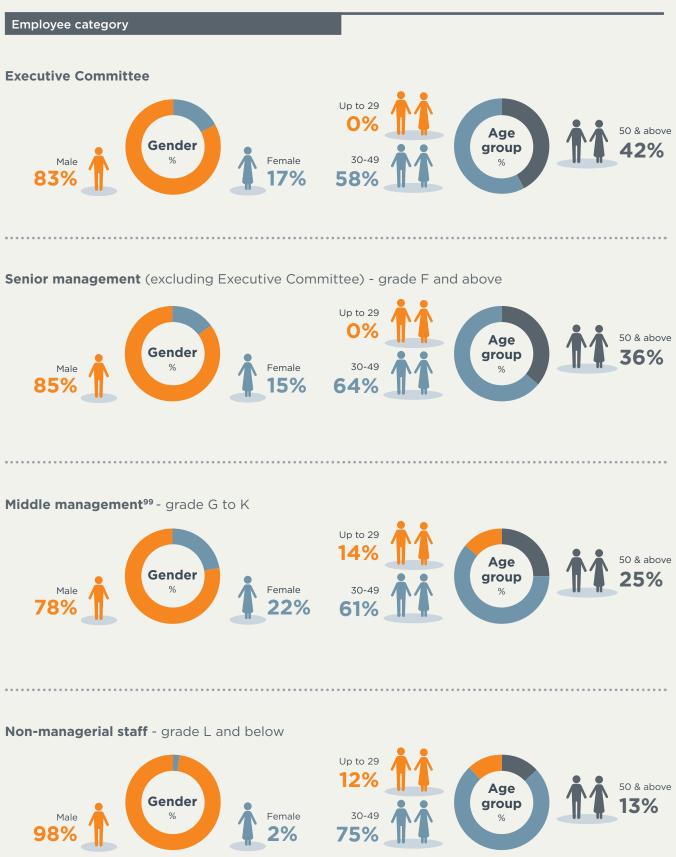
⁹⁶ Grade F and above are considered 'senior management' and include managerial, director and vice president roles.
 ⁹⁷ Directly supervised contractors predominantly perform tasks such as maintenance and testing of equipment, control of conveyors,

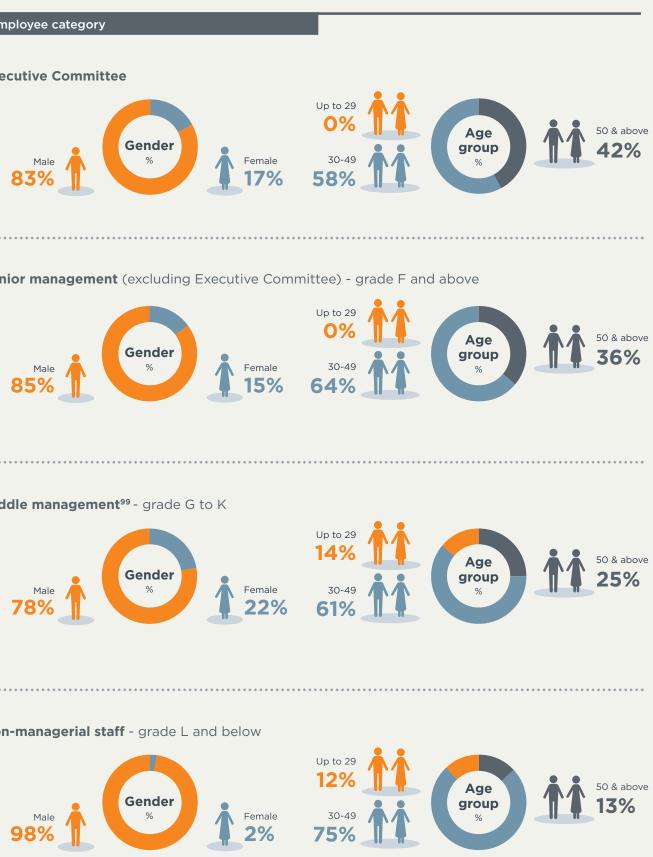
landscaping and operation of forklifts. EGA and the contracted organisations have a framework agreement with specified terms which cover services, payments, confidentiality, accommodation and safety.

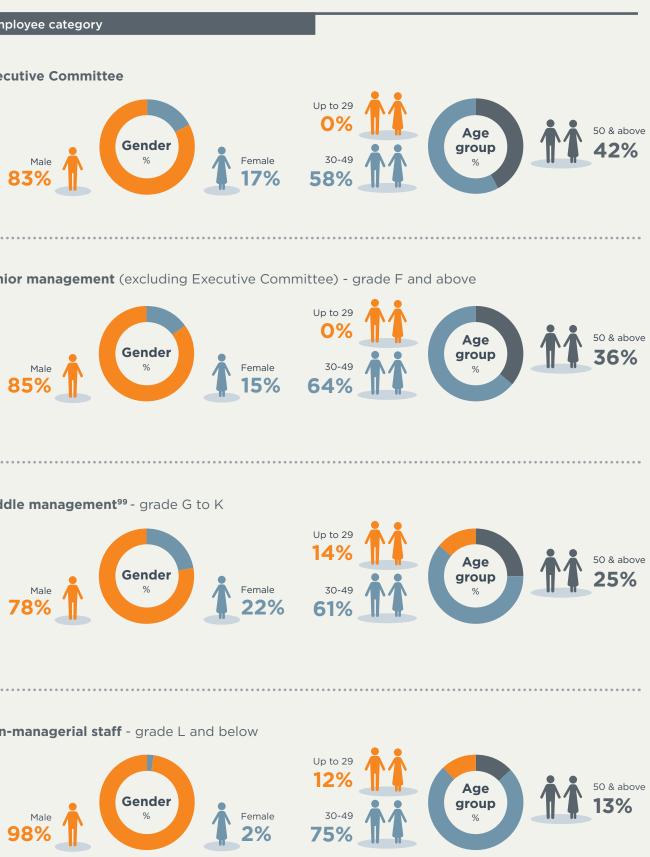
⁹⁸ No part-time employees during the reporting period. Figures are based on the total active workforce as of 31st of Dec 2022.

⁹⁹ Middle management includes all supervisory positions.

Executive Committee Gender % Male 83%



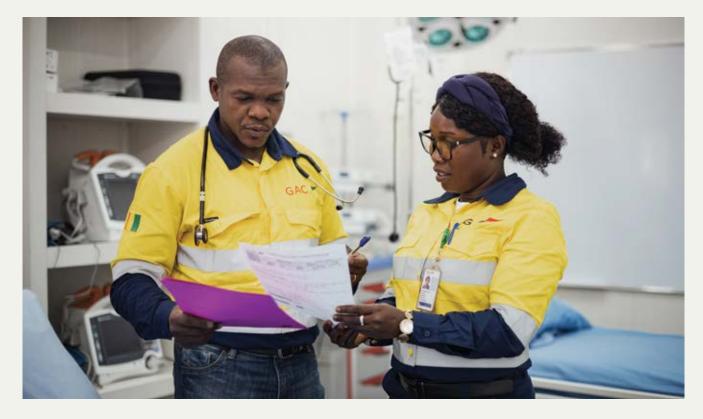




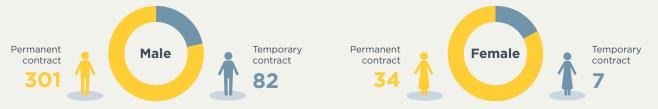
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Social responsibility

Figure 37: Employee diversity in Guinea





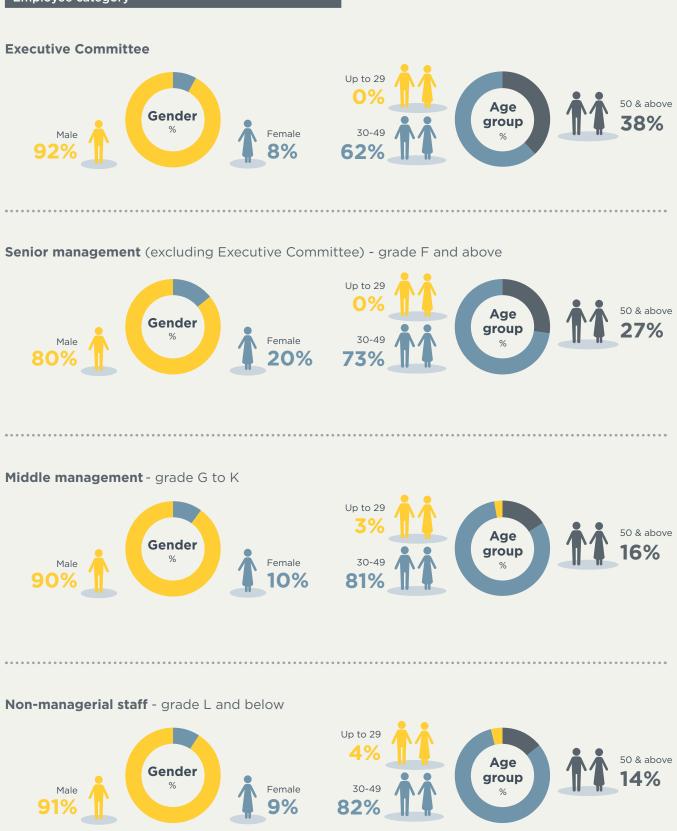


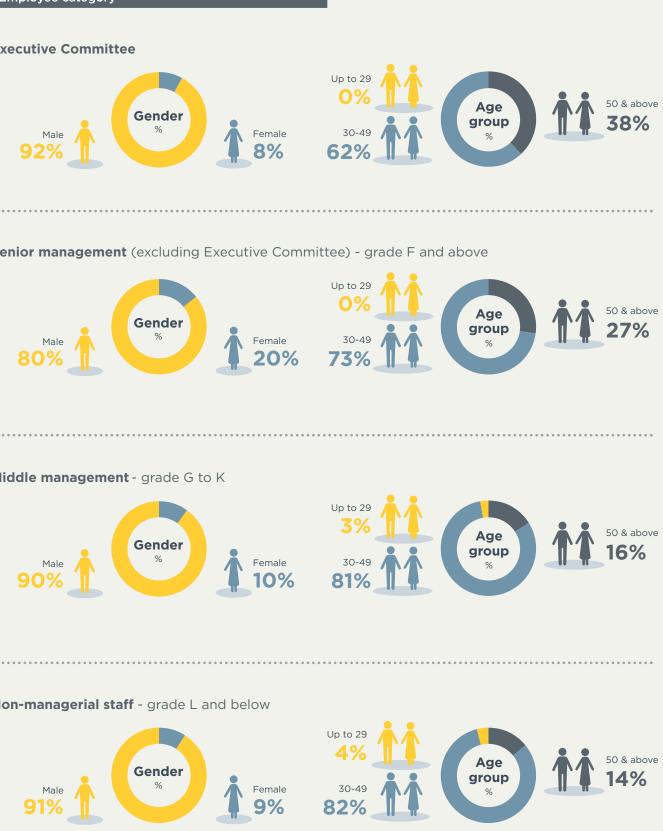
¹⁰⁰ Grade F and above are considered 'senior management' and includes managerial, director and vice president roles.

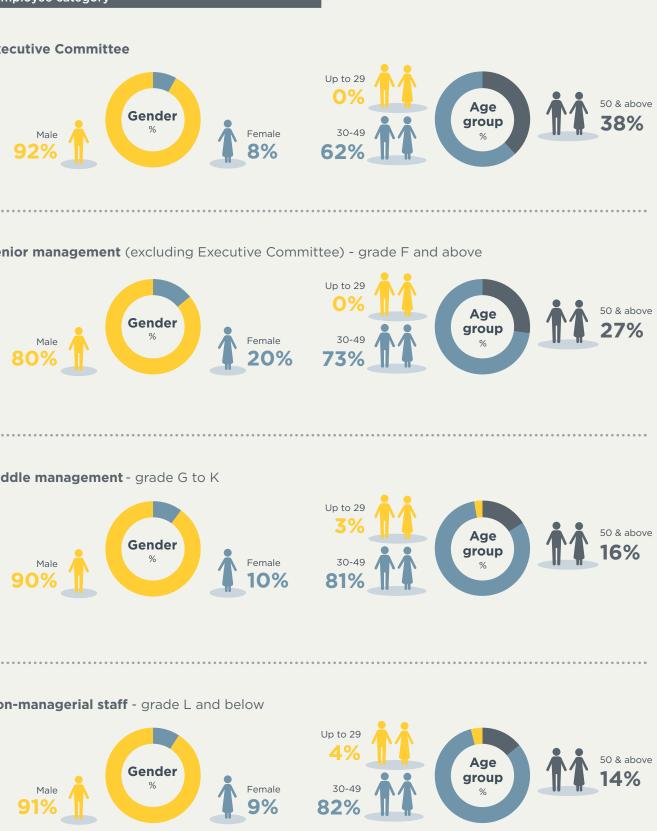
¹⁰¹ Directly supervised contractors in Guinea predominantly perform tasks such as Port operations, mining activities, maintenance, construction activities, catering, security, fuel supply.

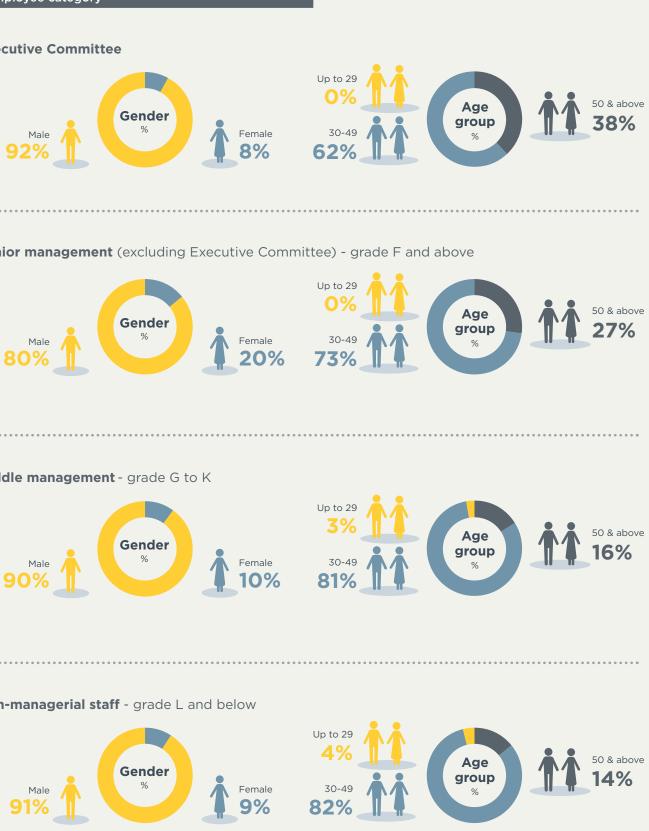
¹⁰² No part-time employees during the reporting period. Figures are based on the total active workforce as of 31st of Dec 2022.











EGA 2022 Sustainability Report

Employee development



A key part of EGA achieving its bold aspiration of becoming a talent driving organisation, is continuously investing in the development of our people at all levels and in all areas. At EGA. we believe that our people and culture are at the heart of our success and create a distinctive competitive advantage that drives improved business performance.

In 2022, we introduced an EGA-wide commitment to invest a minimum of five days of development each year for every one of our employees. This initiative has facilitated increased access to high-quality

training and development opportunities for a broader spectrum of employees across EGA, offering a diverse range of learning options to suit their individual needs.

In the UAE, EGA's Emiratisation programme includes internships, summer work experiences for high school and university students, our Eadad¹⁰³ programme, scholarships for employees and students, a national trainee programme and a graduate trainee programme. Graduates receive 18 or 24 months of training to equip themselves with the tools needed to prepare young Emiratis for technical roles at EGA.

EGA's National Training (NT) Programme has been running for over 30 years developing Emirati talent and offering entry level career pathways into EGA. In 2022, the NT programme continued to go from strength to strength with over 150 trainees actively participating in various specialisations, such as Reduction, Power, and Technical, In November 2022, EGA introduced a comprehensive Business Administration NT programme where we welcomed 50 Emirati women and men to start their careers with EGA.

In the UAE, our male staff's average training hours rose from 18.1 in 2021 to 62.8 in 2022, while our female staff's average training hours increased from 16.7 to 78.2 during the same period.



In 2022, we continued to run our specialised training team stationed in Guinea, their primary role being to meticulously evaluate the training needs of our personnel in the country. Leveraging their expertise, they thoughtfully allocated appropriate budgets and designed tailored training programmes to comprehensively address these identified requirements. Each employee in Guinea has a career development plan, and our leadership encourages

Figure 39: Average hours of employee training in Guinea

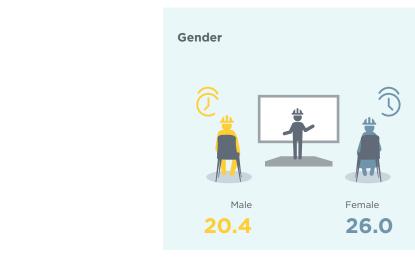
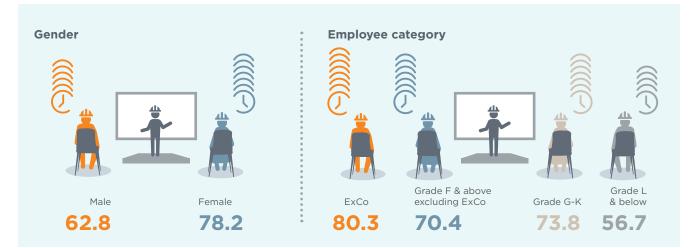


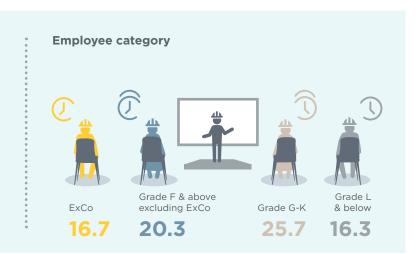
Figure 38: Average hours of employee training in the UAE



¹⁰³ Eadad is an Arabic word meaning preparation and includes training opportunities for a fixed periods.

coaching and mentoring within their teams. We also identify opportunities for employees to attend local conferences.

In Guinea, our male staff's average training hours rose from 7.5 in 2021 to 20.4 in 2022, while our female staff's average training hours increased from 7.2 to 26.0 during the same period.



In 2022, we continued to modernise our training and development efforts across EGA. Our commitment to digital learning platforms remained robust, with platforms like Edx, LinkedIn Learning, OpenSesame, and Axonify being widely adopted. More than 6,400 employees and contractors accessed these platforms, collectively engaging in over 17,900 days of development.

"

EGA has a legacy of investing in its employees. There are no constraints to development. EGA offers fantastic opportunities to learn and contribute. Everyone is open to ideas at every level of the organisation, enabling people to be creative and contribute their best.



Soundari Vedagiriswaran Manager - Succession Plan Talent Management

Figure 40: UAE 2022 Training opportunities

Training opportunities	Training days	No. of employees
Online Learning	17,973	6,416
Operation & Technical Training	14,897	3,861
EHS Training	5,588	4,936
Management Training	5,149	3,606
External Training	2,252	651
In-House External Training	2,167	672
EGA-Area Specific Training	1,578	1,781
Lean & Quality Training	819	2,413
Digital Academy	516	267
Townhall	344	1,544
Compliance	242	1,868
EGA Talks	194	1,582
EGA-Digital Workplace	100	631



We also introduced our first Augmented Reality (AR)

based training package supporting new starters in

Reduction which reduced time to competency and

improved knowledge application on-the-job. The

innovative offerings extended into virtual learning platforms offered through our Digital Academy as well

as more in-person courses once COVID-19 restrictions

lightened, allowing more opportunities to collaborate

As a National, it was a privilege to have

Programme at EGA that enabled me to

enhance my technical and professional skills.

In turn, this has helped in the development

and growth of my current position in the HC

Department at EGA and I'm grateful for this

Hessa Najem Alblooshi HC Strategy & Operations

Administrator

completed my Administrator Training

privileged opportunity.

and learn.

"

"



04



Good governance

Good Governance

Corporate governance

EGA's corporate governance practices have been designed to provide a foundation for value creation for all its stakeholders and to ensure suitable control mechanisms underpin the business's sustainable and responsible long-term growth.

The Board provides the leadership necessary for EGA to meet its business objectives within a robust framework of internal controls. Its mandate is to provide entrepreneurial leadership and to oversee management.

We continue to have a strong mix of talented individuals on the Board with a depth of experience from a range of industries. This helps create an effective Board which is not only able to offer an external perspective on the business, but also constructively challenge senior management, particularly when developing the Company's strategy and in their performance.

Our Board comprises 12 members, ten Non-Executive Directors, two Executive Directors, one of which is our Managing Director¹⁰⁴.

Board members bring an independent mindset with a variety of backgrounds and experience around the Board table and challenge the executive management constructively.

The Board regularly liaises and engages with its shareholders to gauge, assess and implement their responses on key matters affecting EGA's business. These matters include review of EGA's long-term strategy and business plans (including decarbonisation projects), human capital policies, ESG targets and progress to date.

"

The guiding principles of EGA's corporate governance framework mirror EGA's core values: safety and sustainability, integrity and fairness, ownership and teamwork, and innovation and continuous improvement.



Kimberley Christiansen Company Secretary "

As part of a robust system of internal controls, the Board has delegated certain authorities to several Board committees as well as EGA's executive management. Delegation is subject to financial limits and other restrictions, above which matters must be referred to the Board. Board committees include our Technical and Projects Committee, Finance and Commercial Committee, Audit and Risk Committee and Human Capital Committee.

As a member of the Board of Directors and the most senior executive at EGA, our Managing Director is responsible for the achievement of the Board's strategic objectives and aligning the Executive Management's work with the overall vision of the Board for EGA's business and future projects.

Our Chief Executive Officer is responsible for managing EGA's ongoing operations and business, leading the Executive Management team and developing the Group's strategy in conjunction with the Managing Director and the Board. The CEO is supported at the management level by several Executive committees including the Executive Management Committee, Risk Management Committee, Strategic Procurement Committee, Intellectual Property Committee and ESG Committee.



Board oversight and communication

During 2022, the Board met five times, and received comprehensive updates from EGA's Executive Management on the key topics affecting EGA and its business. The Board also maintained regular communication with the Board committees, who report to the Board in accordance with their specific remits. For example, the Audit and Risk Committee reported to the Board on financial reporting, risk management, internal controls systems, the audit process, EGA's compliance with laws and regulations and compliance with the Code of Ethics. Please refer to the Embedding Ethical Practices section for further details about EGA's monitoring, reporting and response to compliance concerns raised in 2022.

¹⁰⁴ For full details please refer to the leadership pages of our website https://www.ega.ae/en/about-us/our-leadership

Given their confidential nature, we do not disclose what is discussed by the Board during their meetings and in their review of EGA's business matters. The Board work together with EGA's management to maintain open and constructive communication, address issues raised and take all necessary actions as needed.

Board responsibility for sustainability

The Board as a whole is responsible for EGA's sustainability strategy and ESG aspirations. The Board approves EGA's overall ESG and sustainability strategies, decarbonisation pathway and climate-related goals. Through its established reporting chain, the Board has delegated responsibility for reporting on ESG and sustainability strategy issues to EGA's Executive Management team.

Management responsibility for sustainability

Chain of responsibility for reporting on sustainability



The CEO is EGA's highest executive management level position with responsibility for overseeing EGA's approach to sustainability and ESG. The CEO actions this, as part of his role in delivering the strategy approved by the Board. Risk management, portfolio reviews, capital investments, annual financial planning and EGA's approach to government engagement all integrate with our sustainability strategy and target executive considerations.

The Executive Committee is EGA's highest management committee with responsibility for reviewing and reporting on ESG issues and sustainability. It oversees all of the Company's business and operations and is responsible for assessing and managing climate-related risks, sustainability issues and ESG opportunities relating to EGA's business. The CEO sits on the Executive Committee, which meets every two weeks throughout the year.

Our EVP - ESG & Sustainability reports directly to the CEO and is responsible for overseeing and implementing EGA's sustainability strategy. Our EVP - ESG & Sustainability brings sustainabilityrelated risks and opportunities to the attention of the ESG Committee, the CEO, EGA's Board and several Board committees through the chain of reporting set out above.

Our Sustainability Manager reports directly to our EVP - ESG & Sustainability and provides functional expertise and counsel to direct the development, implementation and continuous enhancement of EGA's sustainability strategy. Our sustainability manager is also responsible for overseeing improvements that align our organisation with corporate commitments, stakeholder expectations and international sustainability programmes, including our alignment with the Aluminium Stewardship Initiative.

But, to truly embed sustainability within our organisation and achieve our bold aspirations requires involvement from all aspects of our business, and for all our full executive leadership team to take an active role in EGA's sustainability agenda.

The EGA ESG committee is comprised of our full executive leadership team, including our:

- Chief Executive Officer (Chair)
- Chief Financial Officer
- Chief Executive Officer of Guinea Alumina Corporation
- Chief Digital Officer
- Chief Marketing Officer
- Chief Supply Chain & Business Development Officer
- Executive Vice President, Human Capital
- Senior Vice President, Corporate Affairs
- Executive Vice President, ESG & Sustainability (Vice Chair)
- Executive Vice President, Midstream
- Executive Vice President, Capital Projects, Alumina & Bauxite
- Senior Vice President, Casthouse & Global Head of Technical Sales
- General Counsel. Head of Ethics & Business Integrity

The ESG Committee is chaired by our CEO, with our EVP - ESG & Sustainability as co-chair and our Sustainability Manager as Committee Liaison. The committee reports to the CEO and Executive Committee on specific sustainability strategy targets set by the CEO and approved by the Board, as well as on ESG matters in general. The committee is tasked with taking a forward-looking perspective anticipating changes in stakeholder expectations, regulatory requirements, market position, reputational risk and EGA's values, while promoting a strong sustainability culture across the organisation.

Embedding ethical practices

At EGA, we believe good ethics are the foundation of good business. Unethical behaviour can severely damage the trust stakeholders place in an organisation and compromise its ability to meet its objectives.

EGA is committed to embedding ethical practices throughout our business, and we seek to build mutual trust with our customers, suppliers and communities, by working honestly and ethically.

Our in-house Legal, Ethics & Business Integrity department implements a risk-based ethics and compliance programme, reflecting the specific challenges encountered within our industry and in the countries in which we operate. Our team oversees the identification of integrity risks and associated controls across all of our operations. We apply our standards across all areas and geographies and continue to look for ways to improve how we detect, prevent and respond to ethics and compliance issues.



¹⁰⁵ EGA does not involve itself directly or indirectly with any form of political or electoral activity.

At EGA, everyone is responsible for fostering a culture of ethical behaviour across all departments and operations.

EGA's Code of Conduct

In 2022, EGA conducted a review and revision of our Code of Conduct. Our updated Code of Ethics continues to establish and communicate the standards that guide our behaviour but has an enhanced emphasis on human rights, diversity and privacy issues.

Our Code of Ethics applies to everyone at EGA and covers 24 compliance issues. These include supporting diversity and inclusion, opposing harassment, opposing bribery and corruption, competing fairly, and acting with integrity in all dealings with customers, suppliers and governments¹⁰⁵. We make our Code of Ethics available to all by publishing it on our website¹⁰⁶.

¹⁰⁶ Learn more about the EGA Code of Ethics: https://www.ega.ae/en/about-us/our-policies-and-certifications



Anti-corruption and anti-bribery

EGA takes anti-bribery and anti-corruption compliance seriously and recognises the high levels of risk in some of the countries in which we operate. Bribery not only undermines the rule of law and the principles of free and fair competition but also has a stifling effect on businesses and commerce.

Regular risk assessments are a key part of an effective compliance programme and all our operations are monitored for risks related to bribery and corruption.

Guinea remains a high-risk business environment in relation to bribery and corruption as identified by Transparency International's 2022 Corruption Perception Index¹⁰⁷. In 2022, in addition to ongoing integrity risk assessments, our team in Guinea conducted in-depth anti-bribery and anticorruption (ABAC) risk assessments.

Communication and training

EGA's Code of Ethics training is mandatory for all staff, including our Executive Committee. We deliver this training both as part of EGA's induction process for new joiners and an annual 'refresher' course for all staff.

Our induction training introduces EGA's ethics and business integrity programme, addressing issues such as discrimination, harassment, corruption and fraud. It explains the multiple ways to report compliance concerns, how concerns are investigated and our non-retaliation policy.

Each year, our Code of Ethics 'refresher' training provides a specific focus on different topics. In 2022, this included harassment and discrimination, bribery and corruption, and conflicts of interest.

During the year, as well as targeted training for various departments, we also provided training on conflicts of interest, ethical leadership, gifts and entertainment all through our micro-learning online platform, Axonify.

In Guinea, we continued to provide compliancefocused induction training to a number of contractor staff to increase awareness of EGA's values, our Code of Ethics, and to encourage staff to speak up if they suspect any illegal or unethical behaviour within our organisation.

Monitoring, reporting and how we respond

EGA's Ethics & Business Integrity team consists of qualified lawyers and certified compliance officers. Our team investigates all concerns reported, either directly or through 'Your Voice'.

Your Voice

We encourage people to speak up if they have any compliance-related questions or concerns. 'Your Voice' is an independently operated reporting line that allows our employees, suppliers, contractors and others to report any possible violation of EGA's Code of Ethics, policies or applicable laws. It is available 24/7 in multiple languages and publicised within EGA and also appears on our website and supplier declaration.



We have a strict policy of non-retaliation. Anyone reporting a concern in good faith is assured that they will be supported, regardless of the outcome of their report.



Business integrity

Our response to discrimination and harassment

In 2022, our Ethics & Business Integrity team recorded a total of twenty-three cases of a "lack of respect", including instances of harassment and discrimination. Following investigation, six of these cases were substantiated, two in Guinea and four in the UAE. All remedial actions associated with these substantiated cases have been completed and have included counselling and training, written and verbal warnings as well as formal disciplinary action.

Our response to incidents of corruption

In 2022, our Ethics & Business Integrity team recorded a total of two reports of alleged corruption and/or alleged lack of controls to prevent corruption. On investigation, zero cases were substantiated. In 2022, there were no substantiated incidents of corrupt behaviour that originated from EGA employees.

Fines, judgments, penalties or sanctions

In 2022, EGA received no significant fines, judgments, penalties or non-monetary sanctions for non-compliance with laws and/or regulations. We had no legal actions, threatened or ongoing, relating to anti-competitive behaviour or corruption and no violation of anti-competitive behaviour or anti-trust and monopoly legislation.

¹⁰⁷ For more information, please visit https://www.transparency.org/en/cpi/2021/index/gin.

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Embedding our ethical culture and practices starts with each and every one of us living our company values, every day, no matter our level. Do the right thing!





Claire Thompson Senior Ethics and Business Integrity Counsel Ethics & Business Integrity

In 2016, EGA received a violation notice from the environmental regulator in Dubai related to NO emissions originating from our power plant in Jebel Ali. This violation was a consequence of our reliance on older, less efficient gas turbines. In 2021, following the commissioning of our new H-class power block, we have substituted older turbines and our NO emissions have significantly reduced. Regrettably, due to operational disruptions associated with the new H-class power block, we were unable to meet regulatory thresholds throughout 2022. Nevertheless, we have initiated the formal process to close this violation with the environmental regulator as once the H-class power block is fully operational, we anticipate operating comfortably within regulatory thresholds.

A responsible supply chain



The effectiveness of our supply chain, which includes more than 3,500 suppliers of materials, goods and services worldwide, is essential to the competitiveness of our business. For an effective supply chain, managing environmental, social and governance factors among our suppliers is essential. Responsible sourcing practices are critical for effective risk management, promoting ethical behaviour, aligning with stakeholder expectations, preventing regulatory penalties and mitigating potential for supply chain disruptions.

Responsible sourcing standards

The Responsible Sourcing Standard details the commitments we require from all of our suppliers in relation to human rights, labour rights, environmental performance, conflict-free minerals, health and safety, and workplace integrity, including anti-corruption, anti-bribery, harassment, discrimination and worker welfare. The provisions of the standard become part of the supplier's agreements with EGA. In order to work with EGA, suppliers are required to confirm they have read and understood the standard, uphold these standards, and communicate the expectations to their employees, suppliers and business partners. The provisions of the standard become part of the supplier's agreements with EGA.

EGA's Responsible Sourcing Standards require suppliers to not only comply with and uphold EGA's standards themselves but also to ensure that their own suppliers align with EGA's requirements.

In 2022, 100 per cent of newly onboarded suppliers have committed to EGA's Responsible Sourcing Standards. Active vendors onboarded prior to 2016¹⁰⁸ are also being asked to commit to EGA's Responsible Sourcing Standards. In total, of all active suppliers engaged with EGA, 96 per cent have met this requirement.

Awareness is a key component of the Responsible Sourcing programme and as such regular engagement with suppliers is a continuous process. Within 2023, awareness sessions on Responsible Sourcing have been delivered to selected supply chain partners, tailored for specific ESG topics particularly relevant to them. Awareness is a key component of the Responsible Sourcing programme and as such regular engagement with suppliers is a continuous process.

Responsible sourcing programme

EGA is committed to identifying, assessing and responding to risks of potential adverse impacts and actual adverse impacts in our supply chain that are linked to our operations, products or services by our suppliers, even if we have not contributed to those impacts.

In 2022, we further developed and improved our Responsible Sourcing Programme aligning with internationally recognised standards and integrating ESG considerations as part of our supplier evaluation and selection process.

Standards used to develop our responsible sourcing programme



- Aluminium Stewardship Initiative Performance Standard Version 3
- OECD Guidance for Responsible Business Conduct
- UN Guiding Principles on Business and Human Rights OECD Due Diligence Guidance for Responsible Supply Chains of Minerals from Conflict-Affected and High-Risk Areas

We have also screened all existing suppliers using upgraded ESG risk-based criteria and conducting further due diligence according to the degree of risk.

Supplier ESG risk-based due diligence process

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Risk-rate supplier by performing screening and awarding an inherent risk rating based on country and category criteria.

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Risk management plan developed, implemented and monitored.

Timelines are determined at the start of each plan and will alter depending on the risk. 04

From the due diligence process, in the event that adverse impacts are identified, EGA implements a mitigation process that involves:

- Discussing the identified risk with the supplier
- Clarity as to why the finding is a risk and how it could potentially be remediated
- Mutually deciding a timeline for closing the identified gap
- Continuous support until the identified gap is closed
- Monitoring and periodic re-assessment, as appropriate
- Disengaging from activities, in circumstances where supplier lack of commitment is evident

In 2022, we conducted audits of seven high risk suppliers. No significant actual or potential environmental impacts were identified from these audits. However, we identified significant potential or actual social impacts among each of the seven suppliers, primarily concerning labour practices, such as working hours and overtime.

This resulted in EGA engaging one-on-one with each supplier and working through the steps of the mitigation process. All of the suppliers agreed to improvements as a result of the audits. Through this programme of capacity building and active

¹⁰⁸ 2016 was the date when the Supplier Declaration was first introduced.





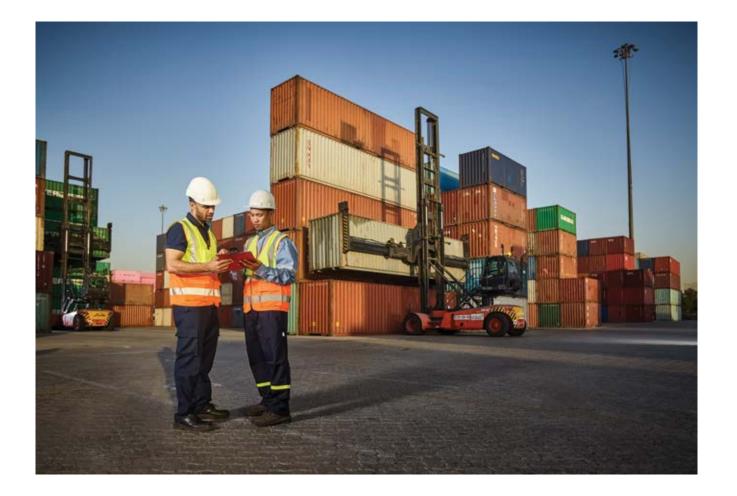
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ESG is a familiar buzz acronym but at EGA, we take our Responsible Sourcing seriously. Having launched in 2022, via the new audit and development programme for selected suppliers, we have enhanced the traditional audit criteria with more focus on 'social' aspects. We applaud those suppliers who embraced our audit findings - recognizing the need to change and putting the measures in place to do so, making a real positive impact on their workforce and local communities.



Emma Tooley Manager - ESG Supply Chain

management, five out of seven suppliers managed within an agreed timeframe to demonstrate that they successfully addressed our audit findings. However, two out of the seven suppliers audited are still working to correct the audit findings. In the instance that a supplier is not committed to the mitogation process and agreed timeframe, then EGA will actively disengage with such suppliers.



Local procurement

EGA recognises that procuring goods and services locally increases the economic benefit of our activities for the countries in which we operate. Wherever we can, we maximise our utilisation of the local supply chain. In the UAE, we spent AED 8.00 billion (USD 2.18 billion) in 2022, on goods and services procured locally. We aspire to double our absolute contribution to GDP in the countries where we operate by 2040.

In Guinea, the mining industry has historically relied on imported goods and services in the absence of competitive local suppliers. We believe that the development of a local supply chain is of vital importance for Guinea to realise the full economic benefits of its natural resources, and for the longterm success of mining businesses.



USD 229 million spent on local suppliers in Guinea

We prioritise the local sourcing of goods and services, choosing suppliers in Guinea before looking elsewhere in Africa and then outside the continent. To assist and encourage local businesses in Guinea to tender for contracts, we have developed a specialist training programme¹⁰⁹ providing details related to our tender process, to help suppliers meet the quality and integrity standards we require.

In 2022, we spent USD 229¹¹⁰ million with local suppliers in Guinea, a 104 per cent increase from 2021.

The UAE National In-Country Value (ICV) Program

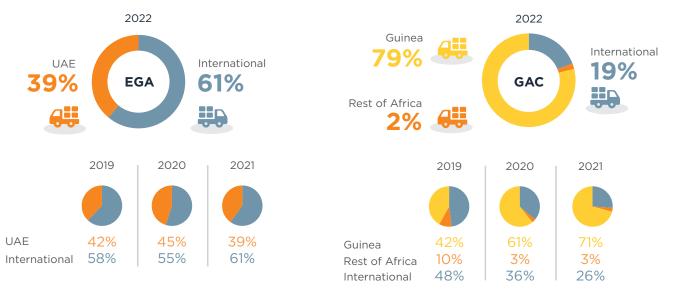
On November 22nd 2021, EGA signed up to the National In-Country Value Program, a UAE government programme that aims to boost economic performance and support local industries by redirecting higher portions of public spending into the national economy.

The programme promotes local companies and introduces their products to the market, localising value chains and strengthening industrial self-sufficiency for the UAE.

The programme has achieved extraordinary results, re-injecting AED 133 billion into the local economy and enrolling 5,000 suppliers with efforts to increase suppliers to 7,300 and targeting AED 300 billion in 2031.

In 2022, EGA developed a clear strategic plan to implement in-country value in order to maximise

Figure 41: Percentage of the procurement budget spent in UAE



¹⁰⁹ In partnership with a third-party agency to assist with training local suppliers based in Guinea.

¹¹⁰ Spend on suppliers is calculated based on the accrual accounting.



our local procurement and to achieve the following objectives:

- UAE GDP growth
- Emiratisation
- Techology adoption
- Strategic supply chain

In support of this strategy, EGA updated its tendering and awarding model and associated procurement, and tendering policies and procedures incorporate the Suppliers' ICV score into the EGA awarding mechanism.

To reflect the ICV model, we held internal and external awareness sessions and our CEO sent out communications to 5.700 suppliers to promote the ICV programme and drive ICV certification along our supply chain.

Figure 42: Percentage of the procurement budget spent in Guinea

Enterprise risk management

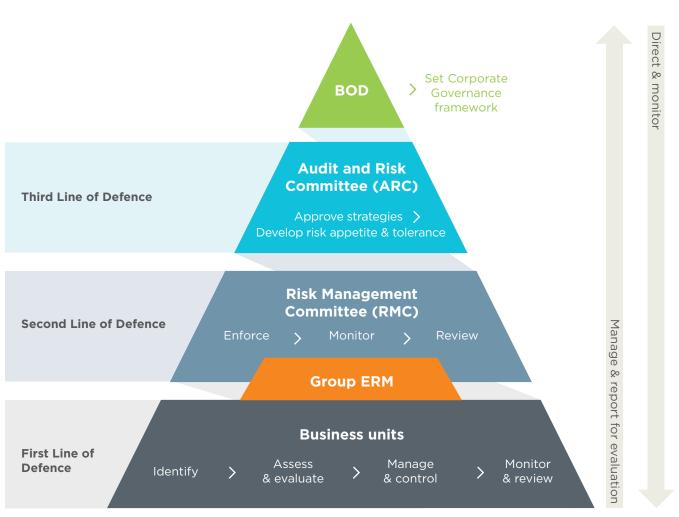
Risk management approach

EGA's risk management governance framework has been designed using a three lines of defence model, which has been implemented to ensure there is clear ownership and delegation of responsibility for management, as well as oversight of risk to support the appropriate flow of information throughout the company. We embed risk oversight at every level

of our organisation to effectively manage risks and opportunities, while constantly working to identify emerging risks.

An overview of EGA's risk management governance structure, along with key responsibilities, is outlined below.

EGA's risk management framework



Three lines of defence

Risk culture substantially affects the capability to take strategic risk decisions and deliver on performance objectives. Promoting a risk-aware culture and integrating it across EGA is critical to achieving our objectives in managing risk

effectively. In order to maintain a mature risk culture, effective communication is provided across all our stakeholders, and in particular our centralised ERM department places continuous emphasis on training in risk management processes, and

integrating the analysis of events within risk assessments. Enterprise risks are identified across EGA by aligning them with our strategic business objectives. These risks are assessed based on our ERM methodology, using a centrally managed online Global Risk Compliance platform, and are measured against the risk appetite statements to ensure appropriate risk treatment is selected and implemented in each individual case.

Key actions and procedures to ensure effective and efficient risk management include:

- Quarterly monitoring of the company's risk portfolio by risk owners and update of the corporate risk map and risk register.
- Quarterly review of the most significant risks by the Audit & Risk Committee of the Board of Directors and the Risk Management Committee.
- Regular training in risk management principles and procedures for employees and the management of the company.
- Enhancement of the automated risk management system. Understanding the physical risks of a changing climate.

This is a time of extraordinary uncertainty. The complexity and compounding nature of disruptions – from macroeconomic volatility, geopolitical shifts, and climate change to regulatory changes, and cybersecurity threats - has flipped the risk management playbook on its head. Thriving in uncertainty doesn't happen by accident. It takes resilience. Resilient organisations can weather the storms. They act and adapt to emerge stronger.



Julie Cunningham Senior Manager - Tax, ERM & BCM

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Identifying, assessing and managing climate-related risks

Climate-related transitional and physical risks are identified, assessed and managed within EGA's ERM framework and monitoring system. To capture the increasing importance of climate change, it has been reflected as a standalone principal risk. Climate change also impacts a number of our other principal risks, such as financial, operational, social and supply chain continuity.

Climate-related physical risks

Regardless of actions taken to reduce emissions today, change is already locked into global climate systems. It is imperative that EGA fully understands the physical risks associated with a changing climate in order to be able to best plan in advance and adapt accordingly.

In 2022, EGA initiated a physical climate risk assessment to develop a greater understanding of the type and severity of longer-term change, and therefore a greater understanding of the extent and scale of adaptation investment that may be required for both our assets in the UAE and in Guinea. This assessment considers both core operations as well as broader aspects such as supporting infrastructure and services, the local environment, stakeholders and communities.

Using the best available science, we have derived a series of climate variables and associated climaterelated hazards for each of our operational assets including projections of groundwater levels, coastal storm surges, wind speeds and temperatures among many others. The sensitivity of our assets, supporting infrastructure. local communities and local environments to climate variables have been assessed in collaboration with EGA subject matters experts including engineering and operations.

Identified risks and opportunities will be integrated, monitored and managed as per EGA's ERM governance framework with future studies planned to ensure that EGA's leadership team has the most up-to-date climate science available to inform risk management and decision-making.



Customer feedback



Climate change transitional risks

The essential role of aluminium in the decarbonised economy has been well-documented for decades. However, whereas drivers and expectation within the aluminium industry for lower carbon products is not a new phenomenon, the level of importance to stakeholders is growing rapidly.

This importance has been reflected in the collaboration between upstream, downstream, end users and civil society during the development of the ASI Performance Standards. The standards require that certified entities both establish time-bound targets for emission reductions as well as make product life cycle assessment data available to customers.

Also, the close relationships we have formed with our customers over the decades have proved invaluable to understanding the growing level of importance attributable to lower carbon products and our customer needs in understanding precisely how the embedded¹¹¹ carbon of our aluminium is calculated.

We closely monitor global policy shifts related to embedded carbon, notably, most recently the European Union's Carbon Border Adjustment Mechanism (CBAM) came into force in May 2023. Whereas during the initial phases of CBAM's

implementation, it is not anticipated that any levies will be introduced, CBAM will enforce a datagathering, transition phase from October 2023 to December 2025. During this period, various industries, including the aluminium sector, will be required to provide Scope 1 and Scope 2 emissions data for imports into the EU. EGA has already made emissions data readily available to customers for several years and in 2022, we made necessary preparations to ensure alignment with the data requirements of CBAM.

CBAM is expected to transition into the definitive phase by January 2026, at which point importers of specific goods into the EU are likely to be required to purchase CBAM certificates corresponding to the embedded carbon emissions of their respective shipments.

Drivers for lower carbon aluminium products as well as the associated risks and opportunities to EGA's business are captured and managed as per EGA's ERM governance framework with future assessments, monitoring and policy reviews undertaken to ensure that EGA's leadership team has the most up-to-date information available to inform risk management and decision-making.

Figure 43: Customer quality and services satisfaction¹¹²



¹¹¹ The emissions attributed with input materials, transportation, production processes etc. associated with a product.

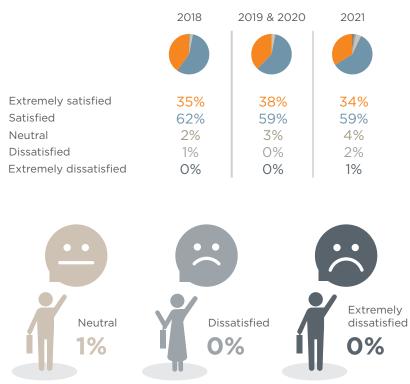
EGA 2022 Sustainability Report

We pride ourselves on the feedback we receive from customers.

Each year, EGA conducts a customer satisfaction survey which is an important feedback tool, enabling us to identify potential ways to further improve our products and associated services for our customers. Our quality department manages the survey, independent from EGA's marketing department, to ensure impartiality, confidentiality and effectiveness of the process.

EGA's latest survey results included responses from 234 customers based in Asia, Europe, the Middle East, North Africa, the Indian sub-continent and the Americas.

The survey identified that 99 per cent of respondents were either satisfied or extremely satisfied with the quality of EGA's products. We are proud to have achieved EGA's highest ever satisfaction rate in 2022.



Meeting international quality standards and customer satisfaction

We align our management systems with international quality standards.



All of EGA's UAE facilities are certified to ISO 9001:2015 and IATF 16949:2016 standards.

ISO 9001:2015 is the international standard for quality management systems. In order to achieve certification, an organisation must demonstrate an ability to systematically provide products and services that meet customer and regulatory requirements and to demonstrate continuous improvement.

The IATF standard details best practice when designing, developing, manufacturing, installing and servicing automotive products. Certification is a requirement for supplying value-added products to companies operating in the automotive supply chain. The standard was developed by the International Automotive Task Force, a group of trade associations and leading companies including BMW Group, General Motors, Ford and Volkswagen.

At EGA we operate our own laboratories to test and confirm that our products meet the expectations of our customers. All EGA laboratories are also certified to ISO/IEC 17025:2017, the benchmark standard for testing laboratories. Accreditation demonstrates to customers, regulators and other stakeholders that we are technically proficient and able to produce precise and accurate test data. As part of the accreditation process, our laboratory quality management system is thoroughly evaluated on a regular basis. The 2020 ISO/IEC audit was conducted virtually and affirmed our continued technical competence and compliance.

We comply with the European Union's Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH) and Restriction of Hazardous Substances (ROHS) standards. In addition, EGA provides customers with material safety data, which details the specific chemical composition associated with each EGA product.

"

As we embrace international quality standards, we are not just making a promise to meet regulations; we are making a commitment to provide our customers with products and services that elevate their satisfaction and confidence in us, regardless of their location worldwide. Through this commitment, we aspire to foster enduring relationships with customers who recognize and value the excellence we consistently deliver.



Awatef Al Hosani Manager - Quality

Technology Excellence

EGA's Technology Excellence Team is part of our Technology Development & Transfer department.

This team conducts extensive research into practical challenges across EGA operations, facilitating employee-driven solutions that optimise internal processes, minimise environmental impact and reduce costs. The team is also responsible for the management of EGA's intellectual property. Over the years, we have filed 40 patents related to aluminium smelting enhancements with five new patents filed in 2022.

Through our Technology Excellence Team, all EGA employees enjoy full access to EGA's Knowledge Hub, an online library offering free, unlimited access to a wide range of books, magazines, technical articles and journal papers. Since 1985, we have prepared and submitted more than 201 research papers to international committees and conferences specific to the aluminium industry. In 2022, we published a total of 14 papers associated with advancements in the aluminium industry. We also presented three technical papers at the Minerals, Metals and Materials Society annual conference¹¹³.



Collaboration with academic institutions

Our Technology Excellence Team conducts research in collaboration with established academic institutions in the UAE and internationally. Over the years, we have developed partnerships with Abu Dhabi University, American University in Dubai, American University of Sharjah, UAE University, Heriot-Watt University, Khalifa University, Massachusetts Institute of Technology (MIT) and the University of New South Wales.

Through the EGA Ambassador Programme, we collaborate with universities to bridge the gap between academic studies and workplace experiences. We engage with UAE undergraduate students on new research topics, including knowledge exchange sessions, project sponsorship and competitions. In 2022, EGA announced and conducted the fifth EGA aluminium competition and worked on two graduation projects with Abu Dhabi University. Through the aluminium competition and graduation projects, students are exposed to real industrial problems, experience critical thinking and provide engineering solutions for EGA.

Historically, EGA has partnered with MIT on research projects relevant to the aluminium value chain, and hosted masters and PhD students who worked closely with EGA on projects focussed on improving efficiencies and quality. The programme has resumed in 2022 after being put on hold in 2021 due to the complications associated with the COVID-19 pandemic.

In 2022, nine PhD and master's student engineers were welcomed at EGA to work with EGA team leaders on several projects related to improved efficiencies, reduced waste generation and minimising SO_x emissions. For each project, we are able to combine the latest academic thinking with EGA's innovative industrial experience to develop solutions for industrial challenges across operational areas.

Al Robot competition

In 2022, we held the fifth annual AI Robot Competition. First established in 2017, this competition is designed to increase support for young people in developing real-world skills in Industry 4.0 technologies and raise awareness of and interest in both EGA and the broader aluminium industry among UAE based university students.

Each year, we encourage students to think creatively as they develop new tools, techniques and solutions for use in an aluminium smelter.

Students from five UAE universities were challenged to build a robot that can measure the thickness of materials within EGA's reduction cells, a task that is currently performed manually. Through this challenge students were able to apply their academic knowledge in the field of robotics and automation and to think creatively to develop a practical solution for the aluminium industry. The American University of Dubai team's winning entry was called Robot for Anode Cover Thickness (R FACT) and uses artificial intelligence to interpret images. The system operated excellently in the potline environment and could measure the anode top cover thickness with high accuracy and in a short period of time. R FACT can already be used on site and it will be further developed for long term usage.

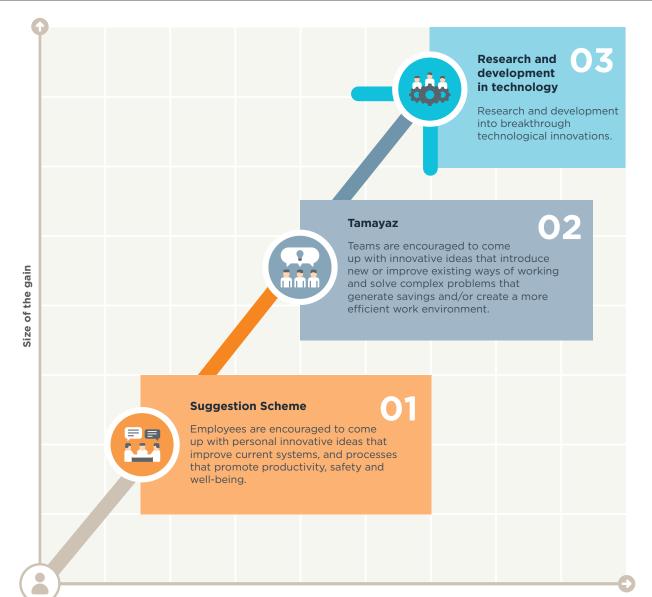


Continuous improvement

For decades, EGA has focused on continuous improvement as a foundation for developing and maintaining global competitiveness.

We believe that the people closest to a work process are often in an ideal position to identify what improvements are required and to create the best solution. We have therefore put in place a system to encourage and reward innovative thinking at all levels of our organisation. As part of this system, EGA operates two continuous improvement programmes, the Suggestion Scheme and Tamayaz programme.

EGA innovation journey



¹¹⁴ The Dubai Quality Group (DQG) is a Dubai based organisation dedicated to promoting quality, excellence and innovation across industries through training, events, and recognition programmes.

In addition, EGA also has a dedicated team of in-house Lean Six Sigma specialists who support various business functions in identifying inefficiencies and improving overall performance.

In 2022, EGA was awarded the Platinum UAE Innovation Award by the Dubai Quality Group¹¹⁴. This recognition was a result of our contributions to innovation and continuous improvement, leading to a competitive advantage on a global scale. EGA was recognised for the development of proprietary aluminium smelting technology as well as our longrunning suggestion scheme and Tamayaz programme.

Size of the idea

EGA's Suggestion Scheme

EGA's Suggestion Scheme is integral to our company's culture of innovation and continuous improvement. Since its foundation in 1981, more than 9,800 EGA employees have collectively submitted over 554,000 suggestions associated with every facet of the business. Designed as a reward-and recognition programme, our Suggestion Scheme encourages and empowers employees to bring forward their ideas for both incremental and large-scale improvements.

In 2022, we introduced Suggestion Scheme 2.0, which facilitates direct interaction between senior level executives and leaders and employees, encouraging collaboration on a monthly basis. As part of

Suggestion Scheme 2.0, we have increased the frequency of our recognition initiatives, including the monthly spotlighting of employee ideas.

In 2022, approximately 83 per cent of EGA employees in the UAE participated in EGA's Suggestion Scheme. These employees have helped improve every facet of our business, with their suggestions generating costsavings, as well as strengthening our health, safety and environmental performance.

In 2022, we received 40,225 suggestions, of which 32,842 were implemented, saving the organisation more than AED 21.8 million (USD 5.9 million).

(;Q:

Suggestion





Tamayaz, meaning "to differentiate or distinguish oneself" in Arabic, is the name of a continuous improvement and employee reward-andrecognition programme which we launched in 2016 to encourage mid-level managers and their teams to find potential solutions to complex problems through structured, scientific analysis. Tamayaz teams are coached by our in-house lean manufacturing specialists.

In 2022, the programme recorded a total of 221 proposed projects, of which 150 were implemented, generating savings of AED 157 million (USD 43 million). The savings were unusually high this year due to an exceptional supply chain logistics related project that resulted in approximately AED 121 million (USD 33 million) in savings.

ESG in the Suggestion Scheme

EGA's Suggestion Scheme programme considerations, with the primary goal of fostering workforce. In 2022, the number of suggestions

Figure 44: Suggestion submitted and implemented



- Suggestions submitted
- Suggestions implemented

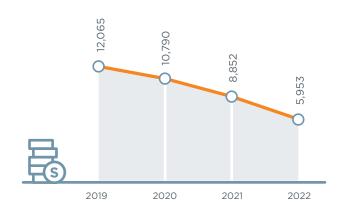
Figure 45: Validated savings

Do you have any ideas?

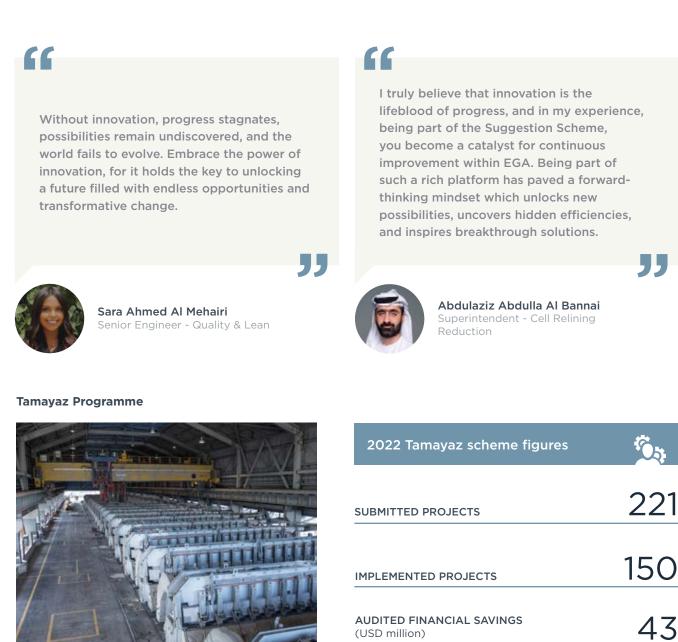
MyEGA

EGA 🚩

All apps



• Validated savings (USD million)



136

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SUBMITTED PROJECTS	
IMPLEMENTED PROJEC	TS



Figure 46: Tamayaz projects' audited financial savings



Audited financial savings (USD million)







Appendices

External assurance



INDEPENDENT ASSURANCE STATEMENT

To: EMIRATES GLOBAL ALUMINIUM

Introduction and objectives of the work:

Bureau Veritas Certification has been engaged by EMIRATES GLOBAL ALUMINIUM to provide independent assurance over the "Selected Information" listed below included Sustainability Report 2022.

This limited assurance report applies to "Selected Information" within the scope of the work described below.

Scope of Work:

The scope of the work was limited to assurance over information included in the Sustainability Report 2022 for the reporting period January 1, 2022 to December 31, 2022 (the 'Selected Information').

The scope of the indicators marked on the following pages of the 2022 Sustainability Report, which is the subject of our limited assurance work, is as follows as of the year ended December 31, 2022;

Se	Pages of selected information in the Sustainability Report		
Торіс			
	Fatality		
	Total Recordable Injuries (TRI)		
Health, safety & wellbeing	Lost Time Injuries (LTI)		
Safety Statistics - UAE & GAC	Total Recordable Injury Frequency Rate (TRIFR)	77,79,80,82,84 & 86	
	Lost Time Injury Frequency Rate (LTIFR)		
	Occupational Disease Rate (ODR)		
GHG Emissions - UAE	Total Scope (1&2)	52,53	
GHG Emissions - GAC	Total Scope (1)	54	
Air Quality - UAE & GAC	NOx, SOx , Fluoride and PM Emissions	44,45,46,47	
Discharges to water – UAE	Water withdrawal & discharge	59	
Waste management UAE	Waste generation and disposal	62	
Respecting human rights - UAE & GAC	Community grievance mechanisms Respecting human rights - UAE & The number and types of concerns raised during		

Assessment standard

The assurance process was conducted in line with the requirements of the International Standard On Assurance Engagements-ISAE 3000 Revised, Assurance Engagements Other Than Audits Or Reviews Of Historical Financial Information and International Standard On Assurance Engagements- ISAE 3410, Assurance Engagements on Greenhouse Gas Statements.

BUREAU VERITAS



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Reporting principles

The following principles have been taken as basis in the preparation of this report:

- review reported information;
- . Assurance Engagements (Revised)
 - Professional Scepticism 0
 - Professional Judgment 0
 - Assurance Skills and Techniques 0

Limitations and Exclusions:

The work is limited to for training and human resources data cover in the work limited to EMIRATES GLOBAL ALUMINIUM' s UAE and GAC locations and "selected information" defined in the scope.

The reliability of the reported data depends on the accuracy of the location-level data collection and monitoring arrangements that are considered as part of this assurance.

Excluded from the scope of our work is the following:

- future intent):
- •
- Financial data: .

•

- . emissions

This moderate level assurance engagement relies on a risk based selected sample of the Selected Information and the associated limitations that this entails.

This independent statement should not be relied upon to detect all errors, omissions or misstatements that may exist.

Responsibilities:

The preparation and presentation of the Selected Information in the Sustainability Report 2022 are the sole responsibility of the management of to EMIRATES GLOBAL ALUMINIUM

Bureau Veritas Certification was not involved in the drafting of the related the Report Responsibilities were to:

- •
- ALUMINIUM.' s management.

BUREAU VERITAS

Appropriateness and robustness of key reporting systems and processes used to collect, analyse and

Evaluation of the report according to the main principles of ISAE 3000 International Standard for

 Evaluation of the report according to the principles of conformity, completeness, reliability, objectivity and intelligibility defined in ISAE 3000 International Standard for Assurance Engagements

Information related to activities outside the defined reporting period or scope;

Company position statements (including any expression of opinion, belief, aspiration, expectation, aim or

Historic text which was unchanged from previous years and did not relate to ongoing activities;

Appropriateness of commitments and objectives chosen by to EMIRATES GLOBAL ALUMINIUM;

Information and emission factors provided by independent third parties and/or information obtained within the Company, as indicated in the calculation tables, regarding calculations related to carbon

Provide moderate level assurance as per ISAE 3000 and ISAE 3410' over the accuracy, reliability and objectivity of the information contained within the Sustainability Report 2022;

Form an independent conclusion based on the assurance procedures performed and evidence obtained;

Report our detailed conclusions and recommendations in an internal report to to EMIRATES GLOBAL



External assurance

Methodology:

As part of our independent assurance, our work included:

- 1. Conducting employee interviews regarding the scope of work involved;
- Process analysis of collecting and reporting the information included; 2.
- Review of documentary evidence produced to EMIRATES GLOBAL ALUMINIUM 3
- 4 Recalculation of examples in accordance with the evidence documents used to prepare the information included
- Remote Audit 5.
- 6. Implementation of analytical procedures on the final reported data

The work is based on current best practices in independent assurance; It was conducted in accordance with Bureau Veritas Certification standard procedures and ISAE 3000 International Assurance Audits Standard requirements.

The work was planned and conducted to provide independent limited assurance.

Limited Assurance Conclusion

As a result of the evidence obtained, no contradiction has been detected that the Selected Information in the Company's 2022 Sustainability Report for the year ended 31 December 2022 has not been prepared in all material respects in accordance with the Reporting Principles and Tables section.

This report has been prepared for the Company's Board of Directors to assist in the reporting of the Company's activities, including its outcome. We allow this report to be included in the 2022 Sustainability Report for the year ended December 31, 2022, in order to enable the Board of Directors to demonstrate that it has fulfilled its responsibilities on the subject by having a limited independent assurance report on Selected Information prepared.

Statement of Independence, Impartiality and Competence

Bureau Veritas is an independent professional services company that specializes in quality, environmental, health, safety and social accountability with over 190 years history.

Bureau Veritas has implemented a Code of Ethics across the business to maintain high ethical standards among staff in their day to day business activities. We are particularly vigilant in the prevention of conflicts of interest.

No member of the assurance team has a business relationship with EMIRATES GLOBAL ALUMINIUM, its Directors or Managers beyond that required of this assignment. We have conducted this verification independently, and there has been no conflict of interest.

The assurance team has extensive experience in conducting assurance over carbon and water information, systems and processes, has many experience in this field and an excellent understanding of Bureau Veritas standard methodology for the Limited Assurance.

Krupa Rahul **Certification Manager** 27.12.2023

BUREAU VERITAS



GRI content index

Statement of use	Emira Stano
GRI 1 used	GRI 1
Applicable GRI Sector Standard(s)	Minin

GRI standard/ other source		Location	Omission			GRI sector
	Disclosure		Requirement(s) Omitted	Reason	Explanation	standard reference no.
General disclosu	ıres					
GRI 2: General Disclosures	2-1 Organizational details	14-15				
2021	2-2 Entities included in the organization's sustainability reporting	14-15				
	2-3 Reporting period, frequency and contact point	6, 34-35				
	2-4 Restatements of information	44, 62				
	2-5 External assurance	39, 140-142				
	2-6 Activities, value chain and other business relationships	14-21, 124-127				
	2-7 Employees	106, 108, 110	Dislcosure 2-7 B iii	Not applicable	EGA does not employ non- guaranteed hours employees.	
	2-8 Workers who are not employees	108, 110				
	2-9 Governance structure and composition	118-120				
	2-10 Nomination and selection of the highest governance body	-	Dislcosure 2- 10 A & B	Confidentiality constraints	Given that EGA is privately held, what is discussed by the Board during their meetings and in their review of EGA's business matters is considered confidential.	
	2-11 Chair of the highest governance body	118-120				

Page 3 of 3

The GRI content index is a navigation tool that specifies which GRI standards are used, which disclosures have been made and where these disclosures can be found in the report.

> rates Global Aluminium PJSC has reported in accordance with the GRI ndards for the period 01/01/2022 to 31/12/2022

1: Foundation 2021

ng & Metals Sector Supplement

GRI standard/			Omission			GRI sector
other source	Disclosure	Location	Requirement(s) Omitted	Reason	Explanation	standard reference no.
GRI 2: General Disclosures 2021	2-12 Role of the highest governance body in overseeing the management of impacts	118-120				
	2-13 Delegation of responsibility for managing impacts	118-120				
	2-14 Role of the highest governance body in sustainability reporting	119				
	2-15 Conflicts of interest	118-123				
	2-16 Communication of critical concerns	118-123				
	2-17 Collective knowledge of the highest governance body	118-120				
	2-18 Evaluation of the performance of the highest governance body	-	Dislcosure 2-18 A, B & C	Confidentiality constraints	Given that EGA is privately held, what is discussed by the Board during their meetings and in their review of EGA's business matters is considered confidential.	
	2-19 Remuneration policies	118-120				
	2-20 Process to determine remuneration	118-120				
	2-21 Annual total compensation ratio	-	Dislcosure 2-21 B	Confidentiality constraints	EGA considers information linked to pay as confidential.	
	2-22 Statement on sustainable development strategy	9				
	2-23 Policy commitments	74, 124				
	2-24 Embedding policy commitments	43, 74, 118- 120, 124-129				
	2-25 Processes to remediate negative impacts	99-101				
	2-26 Mechanisms for seeking advice and raising concerns	99, 122				
	2-27 Compliance with laws and regulations	121-123				

GRI standard/ other source	Disclosure	Location	Omission			GRI sector
			Requirement(s) Omitted	Reason	Explanation	standard reference no.
GRI 2: General Disclosures	2-28 Membership associations	33				
2021	2-29 Approach to stakeholder engagement	37, 88-99				
	2-30 Collective bargaining agreements	100				
Material topics						
GRI 3: Material Topics 2021	3-1 Process to determine material topics	37-39				
	3-2 List of material topics	38				
Health, safety ar	nd well-being					
GRI 3: Material Topics 2021	3-3 Management of material topics	74-87				
GRI 403: Occupational health and	403-1 Occupational health and safety management system	14-15, 74-75				
safety 2018	403-2 Hazard identification, risk assessment, and incident investigation	74-77				
	403-3 Occupational health services	84-87				
	403-4 Worker participation, consultation, and communication on occupational health and safety	74, 100-101				
	403-5 Worker training on occupational health and safety	74-76				
	403-6 Promotion of worker health	84-87				
	403-7 Prevention and mitigation of occupational health and safety impacts directly linked by business relationships	124-126				
	403-8 Workers covered by an occupational health and safety management system	106, 108, 110				
	403-9 Work-related injuries	74, 77, 79-80, 82				
	403-10 Work-related ill health	77, 80, 84, 86				

			Omission			GRI sector
GRI standard/ other source	Disclosure	Location	Requirement(s) Omitted	Reason	Explanation	standard reference no.
Respecting hum	an rights				77,80,84,86	
GRI 3: Material Topics 2021	3-3 Management of material topics	74, 88-99, 121-125				
GRI 406: Non- discrimination 2016	406-1 Incidents of discrimination and corrective actions taken	121-123				
GRI 407: Freedom of Association and Collective Bargaining 2016	407-1 Operations and suppliers in which the right to freedom of association and collective bargaining may be at risk	76, 100-101				
GRI 408: Child Labor 2016	408-1 Operations and suppliers at significant risk for incidents of child labor	74, 124-126				
GRI 409: Forced or Compulsory Labor 2016	409-1 Operations and suppliers at significant risk for incidents of forced or compulsory labor	74, 124-126				
GRI 410: Security Practices 2016	410-1 Security personnel trained in human rights policies or procedures	93				
GRI 402: Labor/ Management Relations 2016	402-1 Minimum notice periods regarding operational changes	100				
Waste managem	nent					
GRI 3: Material Topics 2021	3-3 Management of material topics	42-43, 62-65, 74				
GRI 306: Waste	306-1 Waste generation and significant waste- related impacts	14-15, 21				
	306-2 Management of significant waste- related impacts	63-65				
	306-3 Waste generated	62				
Air quality						
GRI 3: Material Topics 2021	3-3 Management of material topics	42-46, 74				
GRI 305: Emissions 2016	305-7 Nitrogen oxides (NO _x), sulfur oxides (SO _x), and other significant air emissions	44-46				
Discharge to wa	ter					
GRI 3: Material Topics 2021	3-3 Management of material topics	42-43, 58-61, 74				
	303-2 Management of water discharge- related impacts	58-61				

GRI standard/ other source	Disclosure	Location	Omission			GRI sector
			Requirement(s) Omitted	Reason	Explanation	standard reference no.
	303-3 Water withdrawal	59, 61				
	303-4 Water discharge	59, 61				
	303-5 Water consumption	59-61				
GHG emissions						
GRI 3: Material Topics 2021	3-3 Management of material topics	26-29, 52, 74, 42 -43				
GRI 305: Emissions 2016	305-1 Direct (Scope 1) GHG emissions	52-56				
	305-4 GHG emissions intensity	52-56				
Biodiversity						
GRI 3: Material Topics 2021	3-3 Management of material topics	67-69				
GRI 304: Biodiversity 2016	304-1 Operational sites owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas	67-69				

ASI content index

The ASI content index is a navigation tool that specifies which Aluminium Stewardship Initiative performance standards disclosure requirements have been made and where these disclosures can be found in the report.

ASI standard	ASI ref #
Sustainability reporting	3.1
Non-compliance and liabilities	3.2
Payments to governments	3.3 b
Disclosure of GHG emissions and energy use	5.1
GHG emissions reductions	5.2
Emissions to air	6.1
Discharges to water	6.2
Reporting of spills	6.4 b
Waste management and reporting	6.5 b
Disclosure of water usage and risks	7.3
Biodiversity management	8.2 c

Disclosure requirement	Page number
Governance approach and material, environmental, social and economic impacts	37-39
Information on significant fines, judgments, penalties and non-monetary sanctions for failure to comply with applicable law	123
Payments to governments, building on existing audit and assurance systems	34
Material GHG emissions and energy use by source	48-56
Time-bound GHG emissions reduction targets	57, 28-29
Emissions to air	44-47
Discharges to water	58-61
Impact assessments of any significant spills and remediation actions taken	70
Quantity of hazardous and non-hazardous waste generated and associated waste disposal methods	62-66
Water withdrawal and use. Material water related risks	58-61
Biodiversity action plan outcomes	67-69

TCFD content index

The TCFD content index is a navigation tool that specifies which Task Force on Climate-related Financial Disclosures requirements have been made and where these disclosures can be found in the report.

	TCFD recommendations	Disclosure recommendations	Page number
Governance	a) Describe the Board's oversight of climate- related risks and opportunities	Good Governance: Corporate governance	118-120
	b) Describe management's role in assessing and managing climate-related risks and opportunities.	Good Governance: Corporate governance	118-120
Strategy	a) Describe the climate-related risks and opportunities the organisation has identified over the short, medium, and long term.	Good Governance: Enterprise risk management	128-130
	b) Describe the impact of climate-related risks and opportunities on the organisation's businesses, strategy, and financial planning.	Introduction: Our Sustainability Approach Good Governance: Enterprise risk management	26-29, 128-130
	c) Describe the resilience of the organisation's strategy, taking into consideration different climate-related scenarios, including a 2°C or lower scenario.	Good Governance: Enterprise risk management	128-130
Risk Management	a)Describe the organization's processes for identifying and assessing climate-related risks.	Good Governance: Corporate governance Good Governance: Enterprise risk management	118-120, 128-130
	b) Describe the organization's processes for managing climate-related risks.	Good Governance: Corporate governance Good Governance: Enterprise risk management	118-120, 128-130
	c) Describe how processes for identifying, assessing, and managing climate-related risks are integrated into the organization's overall risk management.	Good Governance: Enterprise risk management	128-130
Metrics and Targets	a) Disclose the metrics used by the organization to assess climate- related risks and opportunities in line with its strategy and risk management process.	Introduction: Our Sustainability Approach Good Governance: Enterprise risk management	26-29, 128-130
	b) Disclose Scope 1, Scope 2, and, if appropriate, Scope 3 greenhouse gas (GHG) emissions, and the related risks.	Safeguarding the environment: Greenhouse gas emissions	52-56
	c) Describe the targets used by the organization to manage climate-related risks and opportunities and performance against targets.	Introduction: Our Sustainability Approach	26-29



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