Integrated Annual Review 2019

ArcelorMittal

Inventing smarter steels for a better world

Contents

About this report

This Integrated Annual Review 2019 describes the context for and progress of ArcelorMittal as the world's leading steel and mining company. It covers the year 1 January 2019 to 31 December 2019, and aims to outline our key considerations in creating value for our stakeholders now and in the future. The majority of the content has been prepared based on activities in 2019 and plans for 2020, before the Covid-19 crisis. We will continue to update our stakeholders by publishing information on our website.

In our reporting, we aim to reflect the guiding principles of the International Integrated Reporting Framework (IIRC). We also report in line with the Global Reporting Index (GRI) Sustainability Reporting Standards 2016, the United Nations Global Compact (UNGC), and the European Union's Directive 2014/95/EU on non-financial reporting. For details, please see Our reporting on p.72.

Our reporting

Our Integrated Annual Review is a central element in our commitment to engage stakeholders and communicate our financial and non-financial performance. It forms part of our wider approach to reporting at a global and local level, supported by reports that provide details on specific areas of our work or are designed for the use of specific stakeholder groups. Please find details of our other reporting below.

Reporting Index ▶ Download

Basis of Reporting ▶ Download

Fact Book ▶ Download

Climate Action Report 1 ▶ Download

20-F ▶ Download

Annual Report ▶ Download

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Performance at a glance

EBITDA

$5.2bn

2019	$5.2 billion
2018	$10.3 billion
2017	$8.4 billion

STEEL SHIPMENTS

84.5Mt

2019	84.5Mt
2018	83.9Mt
2017	85.2Mt

FREE CASH FLOW

$2.4bn

2019	$2.4 billion
2018	$0.9 billion
2017	$1.7 billion

ACTION 2020 EBITDA IMPROVEMENT PLAN

$2.0bn

2019	$2.0 billion
2018	$1.6 billion
2017	$1.5 billion

NET DEBT

$9.3bn

2019	$9.3 billion
2018	$10.2 billion
2017	$10.1 billion

NET DEBT / EBITDA RATIO

1.8x

2019	1.8x
2018	1.0x
2017	1.2x

CAPEX

$3.6bn

2019	$3.6 billion
2018	$3.3 billion
2017	$2.8 billion

INVESTMENT IN RESEARCH AND DEVELOPMENT

$301m

2019	$301 million
2018	$290 million
2017	$278 million

SAFETY – LTIFR[1]

(incidents per million hours worked)

0.75

2019	0.75
2018	0.69
2017	0.78

CO_2e EMISSIONS INTENSITY (STEEL)[2]

(tonnes per tonne of steel)

2.12

2019	2.12
2018	2.12
2017	2.11

DUST EMISSIONS

(ducted kg per tonne of steel)

0.63

2019	0.63
2018	0.61
2017	0.67

WOMEN IN MANAGEMENT

(managers and above)

13%

2019	13
2018	12
2017	12

1 Data does not include the LTIFR for Ilva (subsequently renamed ArcelorMittal Italia) which was acquired on November 1, 2018.

2 CO_2e Emissions Intensity (Steel) data are calculated using full year production data from all sites, except ArcelorMittal Galati and ArcelorMittal Ostrava which were sold on June 30, 2019, from which date data was not available.

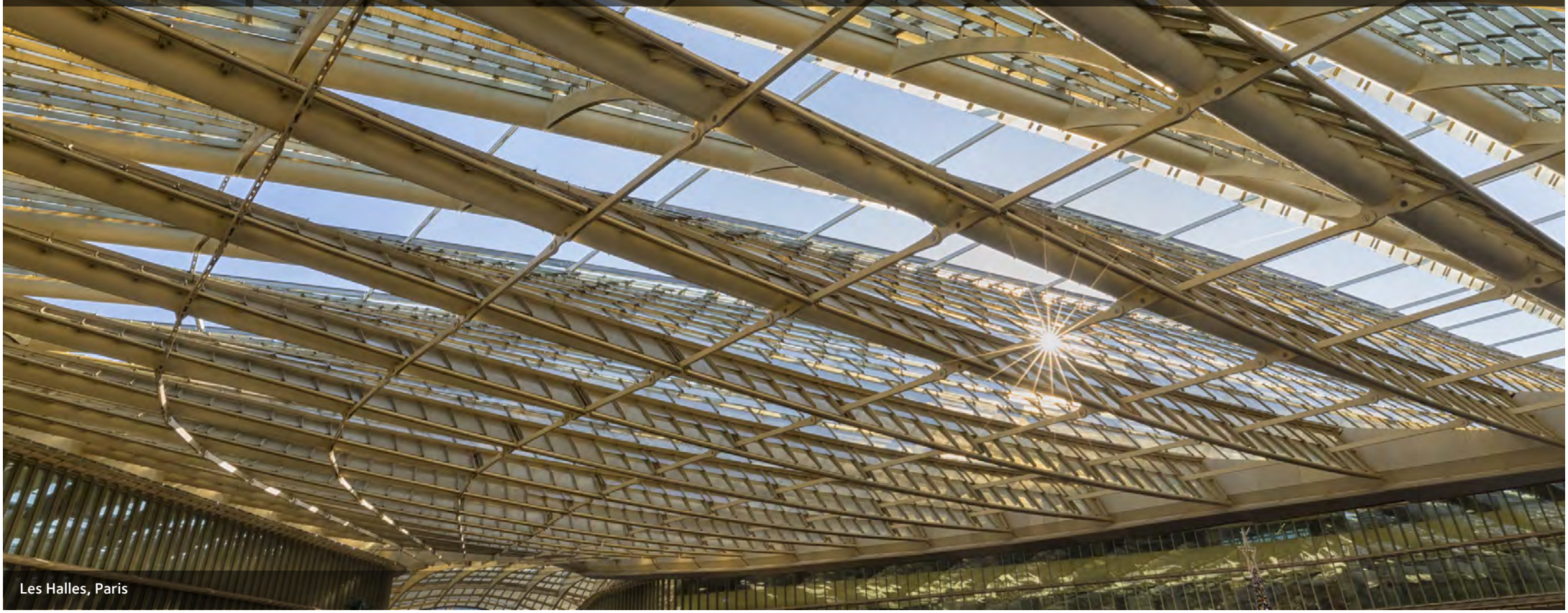
Full performance data can be found in our Fact Book

Section 1

Our business

"These are unprecedented times, but we have established a stronger financial footing for the company that will stand us in good stead for all market conditions, including those in which we currently find ourselves. I am confident that steel, with its unique combination of strength, flexibility and unparalleled recyclability, will remain the material of choice for building the world's infrastructure both now and in the circular economy of the future. And ArcelorMittal, as the world's leading and still only global steel company, will, I am sure, continue to be a material supplier of choice."

Lakshmi N. Mittal, Chairman and CEO of ArcelorMittal



Les Halles, Paris

Chairman's statement

Welcome to ArcelorMittal's Integrated Annual Review 2019.

Dear stakeholders,
As I sit down to write this annual letter to you, life is not how any of us would have foreseen at the start of this year. Rather, we find ourselves in the middle of a very serious global pandemic, Covid-19, which has spread rapidly across the world and necessitated unprecedented retaliatory measures from governments which are significantly impacting the global economy. The content within this report relates to 2019, before the virus had any impact on our operations, but it is not possible to write to you without mentioning the environment in which we now find ourselves; an environment the likes of which none of us have experienced before in our lives. At present we, like everyone else in the world, are focused on navigating this period, protecting our employees and our business.

Lakshmi N. Mittal
Chairman and CEO

"I am proud of the way our people are responding to the Covid-19 global pandemic, calling on our experience from other tough periods to adapt quickly to the current realities, and also galvanising to support our communities."

Lakshmi N. Mittal,
Chairman and CEO of ArcelorMittal

The impact of Covid-19 on our company will certainly be considerable, and we have announced the temporary idling of plants across the world. I am proud of the way our people are responding, calling on our experience from other tough periods to adapt quickly to the current realities, and also galvanising to support our communities. We will come through this period, as we have come through previous crises, but there will undoubtedly be some profound learnings for everyone, which we will be considering in the months to come.

Covid-19 has brought an additional, enormous challenge to an already complex, volatile world. We saw further evidence of this volatility in 2019 when, after the best financial year since the 2008 crisis, we saw Ebitda essentially halve. Although this is clearly disappointing for all of us, our 2019 results did serve to demonstrate the important progress we have made in establishing a stronger financial footing for the company that will stand us in good stead for all market conditions, including those in which we currently find ourselves. At the end of 2019 our net debt had reduced to US$9.3 billion, the lowest since we created ArcelorMittal, as a result of Action 2020 and other initiatives we have implemented to strengthen our balance sheet and increase our resilience. This is especially valuable as we navigate the current period of disruption and uncertainty,

Chairman's statement

and we have further strengthened the balance sheet by way of a US$2 billion capital raise to accelerate progress towards our US$7 billion net debt target.

The difficult operating environment we faced in 2019 was the result of a combination of issues including: softening global growth; lower apparent steel demand; a disconnect between steel and raw material prices due to supply issues; and a weak automotive sector related to the transition to new tailpipe emission standards. Before Covid-19, we were anticipating an improvement in market conditions in 2020 as inventories were low, de-stocking had ended and the global economy looked reasonably robust.

But even when Covid-19 lockdown measures end – and we have seen them starting to ease in some countries in recent weeks – and we are able to return to more normal operating conditions, we must expect volatility to continue because our world is undergoing transformational change. The current transformation is underpinned by the extraordinary progress in computing that will see the use of digitalisation and artificial intelligence becoming mainstream. But it is further complicated by the rapidly increasing consensus that the world must transition to a net zero carbon emissions economy to avoid a climate catastrophe. 2019 saw the first countries pass this into law, with more surely to follow. Furthermore, the fallout of the 2008 financial crisis – only likely to be further aggravated by Covid-19 – has clearly shown that society is increasingly intolerant of extreme inequality, and governments need to address rising populism with carefully designed policies that create opportunity for all. In that regard we are living through a transformational period from a technological, environmental and social perspective.

Change will often cause instability as it forces everyone to adapt. But it also brings considerable opportunity and, usually, improves the global economy and gives more people access to a better quality of life. This outcome aligns with the aspirations of the United Nations Sustainable Development Goals (SDGs), launched in 2015, which aim to unite global stakeholders to address the major challenges the world faces together, and thus fast-track progress towards a better and more sustainable future for everyone.

Business, quite naturally, is expected to play an important role in the successful delivery of the SDGs. It is clear that companies that want to thrive for the long term, including ArcelorMittal, must adapt and clearly demonstrate how they will remain relevant and bring value in the world of tomorrow, not just for shareholders but for all stakeholders.

In this regard, I am fundamentally optimistic about the long-term outlook for steel because, as the population further increases and living standards continue to improve for everyone, the demand for materials will only increase. Provided steel is able to find an economically viable solution to the net zero carbon challenge – and I will return to this subject – then I am confident it can remain the material of choice for building the world's infrastructure for the long term. As things stand today, I do not see another material that offers steel's combination of strength, flexibility and affordability. Furthermore, steel's inherent and unique recyclability makes it the ideal material for a circular world in which the linear model of produce-use-dispose is replaced by produce-use-reuse. The recycling targets that other materials are setting for 2050 are lower than steel's actual recycling rates today.

Our thanks go to all our employees worldwide for their efforts during this Covid-19 crisis. Proud of our people. Looking forward together.
See our video here

"Steel is an integral component in much of the infrastructure that will support a net zero carbon economy, including wind and solar farms, electric vehicles and low-carbon buildings. We see the purpose of our company very much as being to invent the smarter steels that will support and enable a better world."

Lakshmi N. Mittal, Chairman and CEO of ArcelorMittal

For more on our smarter steels, see Innovating smarter steels and solutions, p.27 for more on our low-emissions steelmaking, see Addressing the climate challenge, p.42

Our product is also an integral component in much of the infrastructure that will support a net zero carbon economy, including wind and solar farms, electric vehicles, the hyper loop, high-speed rail tracks and low-carbon buildings. For this reason, we see the purpose of our company very much as being to invent the smarter steels that will support and enable a better world. Steel is a material that is constantly evolving. Over half the steels we are producing today did not exist a decade ago. Our scientists and engineers are constantly envisioning, trialling and testing the steels of the future; steels that are stronger, lighter, more efficient, less energy intensive and produced via alternative low-carbon routes. New steels launched in 2019 include a range of new S-in motion® solutions for internal combustion engine cars, hybrids and BEVs.

And Steligence®, our new business division providing low-carbon solutions for the construction industry, has performed well in its first full year of operation, demonstrating the significant potential we believe exists in this market. Additionally, the launch of the ResponsibleSteel™ standard, of which ArcelorMittal was a founding member, will also serve to further progress steel's responsibility credentials, a growing concern for all stakeholders. We have started the process to certify all our Flat Europe assets and before Covid-19 had targeted completing this process by the end of this year.

Our steels have the ability to enable other sectors to reduce their carbon emissions, but we also need to work to significantly reduce our direct carbon footprint. In 2019 we published our first Climate Action Report, in which we set out our approach to achieving this. Our European segment was able to go one step further, announcing a 30% reduction target by 2030 and an ambition to achieve net zero carbon emissions by 2050. Our second Climate Action Report, which we still intend to publish this year, will set a 2030 target for the entire group. The good news is that technically it is possible to make steel without emitting carbon. We are working in parallel on a number of different routes which explore the potential of circular carbon, carbon capture and storage (CCS) and clean electricity. Beyond the challenge of trialling and scaling up the potential technologies, the biggest hurdle will be the significantly higher costs which cannot be supported by the profitability of the industry alone.

This is why policy intervention is so critical, both to provide access to finance as well as to ensure a level playing field. For regional policy to have a global impact, it must prevent companies which have improved their carbon footprint being undercut by those from other regions that are not required to do the same. This is a real risk for the steel industry which is why a carbon border adjustment is so important. I am pleased this is a concept that is supported by the European Commission and was included in their new Green Deal.

ArcelorMittal is Europe's leading steel producer so this regulation is important to us, but we are also the world's leading steel producer with a unique global presence. We have always embraced geographic diversity as a strength and although today we produce a greater proportion of our steel in the developed economies, we have always seen the value in also building a presence in the developing economies. We very much see our future in both providing the developed economies with the more sophisticated products they demand, while also being in a position to support and participate in the growth and continued urbanisation of the developing economies.

A key strategic achievement for us in 2019 therefore was the acquisition, along with our joint venture partner Nippon Steel, of Essar Steel India Limited, now renamed AM/NS India. With its vast and growing population, India must surely continue with its comparatively rapid economic growth and expansion in the coming decades. AM/NS India already enjoys a position as one of India's leading steel producers, and the intention is to increase its production capacity over time in response to growing demand for steel.

"We have always embraced geographic diversity as a strength, and while today we produce a greater proportion of our steel in the developed economies, we have always seen the value in building a presence in the developing economies. We very much see our future in both, and a key strategic achievement for us in 2019 therefore was the acquisition of Essar Steel India Limited."

Lakshmi N. Mittal, Chairman and CEO of ArcelorMittal

For more on Essar Steel, see Spotlight on Essar Steel, p.23

For more on health and safety see p.14

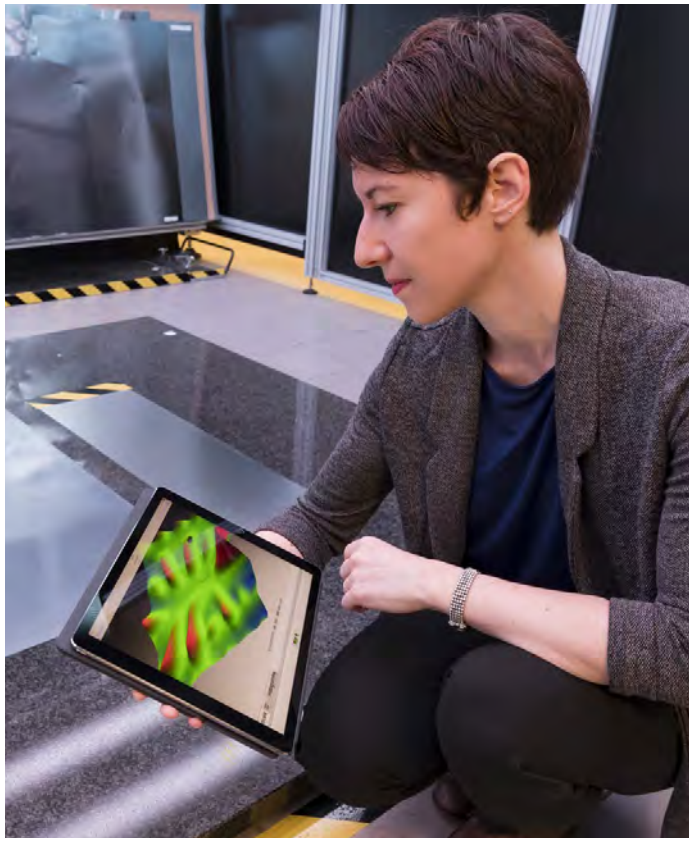
I must also provide an update on another recent acquisition, that of Ilva in Italy. Ilva was attractive to us because it offered considerable synergies with our Flat Europe business. It has, regrettably, been more complicated than we had envisaged. The reasons for this are well documented so I will not repeat them now, but I am satisfied at least that before the outbreak of Covid-19, we had reached a binding agreement with the Ilva commissioners that set out the path to put Ilva on to a more sustainable footing. Political consensus is a vital component of that, at national as well as regional level. The agreement could see the state taking a significant shareholding in the company that should enable a shared vision for the future success of the operation. However, if this investment is not forthcoming by 30 November 2020, we do have a right to withdraw from Ilva.

This is important, not least for the people working in the plants. Although our industry has benefited from the introduction of digitalisation and technological developments, the steel industry remains an important employer across the globe, with a significant contribution to local and national economies. ArcelorMittal today employs 191,248 people and our estimated direct economic contribution in 2019 was US$72.2bn*.

As steelmaking develops, it is important to also develop the skills of our employees and to ensure we can retain and attract, as a company and an industry, the people we need for the continued success of the organisation. Our in-house University, headquartered in Luxembourg with satellite organisations across the world, is very important to us.

Partnering with leading educational institutions, it provides the basis for developing our people through personal training programmes delivered both on campus and online. Discussions to agree personal development plans are an important part of the annual appraisal process. As we continue to embrace new technologies, we will also have to recruit people into the organisation with the relevant skills to help us transform and take advantage of all the opportunities from Industry 4.0. We have already strengthened our digitalisation teams and are also boosting our research and development teams with 3D printing experts as we explore the potential for printing steel from steel powders.

We believe the steel industry offers interesting and complex challenges, and ArcelorMittal an entrepreneurial, global environment in which to grow and prosper. As a company operating in the heavy industry space, it is also critical that we keep our people safe, something that Covid-19 has only further reinforced. Health and safety has been the absolute priority of the company since it was founded in 2006. We have made very good progress in improving our safety results and record over the past 15 years, but I am disappointed to have to tell you that 2019 was a step backwards. Although the lost time injury frequency rate (LTIFR) remained broadly stable, 21 people died working for our company. This is clearly a tragedy and one that we are determined to ensure does not repeat itself. We are leveraging our global expertise to roll out proven safety training strategies to the regions where they are most needed. We have operations that are clearly getting it right year after year – it has to be the case everywhere.



Maizières-lès-Metz, France. Flatness measurement by deflectometry.

*Direct economic contribution is the sum of the wages and salaries paid, supplier and contractor payments, taxes paid, capital reinvested in the business, dividends, interest payments and R&D.

Chairman's statement

As recently communicated with our first quarter earnings statement, the outlook for the remainder of the year remains uncertain. Although we do not usually give quarterly guidance, the exceptional circumstances led us to inform the market that we anticipate EBITDA in the second quarter to be in the range of US$400 – US$600 million. Although we hope the second quarter will be the trough at least from a volume perspective and we entered this crisis with one of the strongest balance sheets we have ever had, we also took the decision to raise an additional US$2 billion from the market to accelerate progress towards our US$7 billion net debt target. We believe this is prudent given the repercussions from Covid-19 are unknown and there is at present uncertainty around the pace and trajectory of recovery.

Like everyone in the world today, I sincerely hope that the lockdown measures will achieve their purpose of containing the virus and that governments across the world are able to develop appropriate 'exit' strategies to open up the economy whilst minimising the risk of the virus spreading again rapidly. Indeed, the easing of the lockdown is now underway in some countries, particularly those where the virus hit earlier, for example Europe. They are starting with small steps, but I hope this can be followed by more sustainable plans to get the world back up and running, whilst protecting people's health. I am a great optimist when it comes to the ability of mankind to solve the most complex problems and I am therefore confident that the scientists busy working on a potential vaccine will succeed, although ramping up testing and contact tracing will clearly be critical in the interim.

I am very proud of the way our people have responded, not only in terms of rapidly adapting the business to the changed environment, but also in harnessing our R&D expertise and presence in communities to assist with the response in whatever way we can. This has included contributing our 3D printing experience to the printing of ventilators and face shields, sending them to countries struggling to get adequate equipment, offering our facilities as temporary medical centres, purchasing vital medical and protective equipment for our communities and helping to provide meals and computers for home schooling purposes.

Undoubtedly there will be significant Covid-19 repercussions for some time to come. But I do expect the fundamentals to reassert themselves, for the world to continue with its development, to continue to grow, to continue to want to give a better quality of life to more people, and to continue to prioritise sustainability. There will be challenges, as there are always challenges, but steel has a critical role to play in the world of the future, as it has in the world of the past. And ArcelorMittal, as the world's leading and still only global steel company, will, I am sure, continue to be a material supplier of choice, inventing smarter steels for the better world we all hope to see.

That we can do our very best to fulfil this purpose is thanks to our employees around the world, and I would like to take this opportunity to thank them all for their hard work and loyalty. I would also like to thank my leadership team and the members of our management committee. And of course, my colleagues on our Board of Directors, who provide such valuable and wise advice.

"I am very proud of the way our people have responded to the Covid-19 crisis, not only in terms of rapidly adapting the business, but also in harnessing our R&D expertise and presence to assist in whatever way we can. This has included contributing our 3D printing experience to the printing of ventilators and face shields, offering our facilities as temporary medical centres and purchasing vital medical and protective equipment for our communities."

Lakshmi N. Mittal, Chairman and CEO of ArcelorMittal

Lakshmi N. Mittal
Chairman and CEO

A global company

Our strategy is designed to maintain our position as the world's leading steel and mining company for the long term, enabling us to deliver value to shareholders and all stakeholders in a rapidly changing world, where material demand will continue to rise but an increasingly sustainable and circular economy will be required.

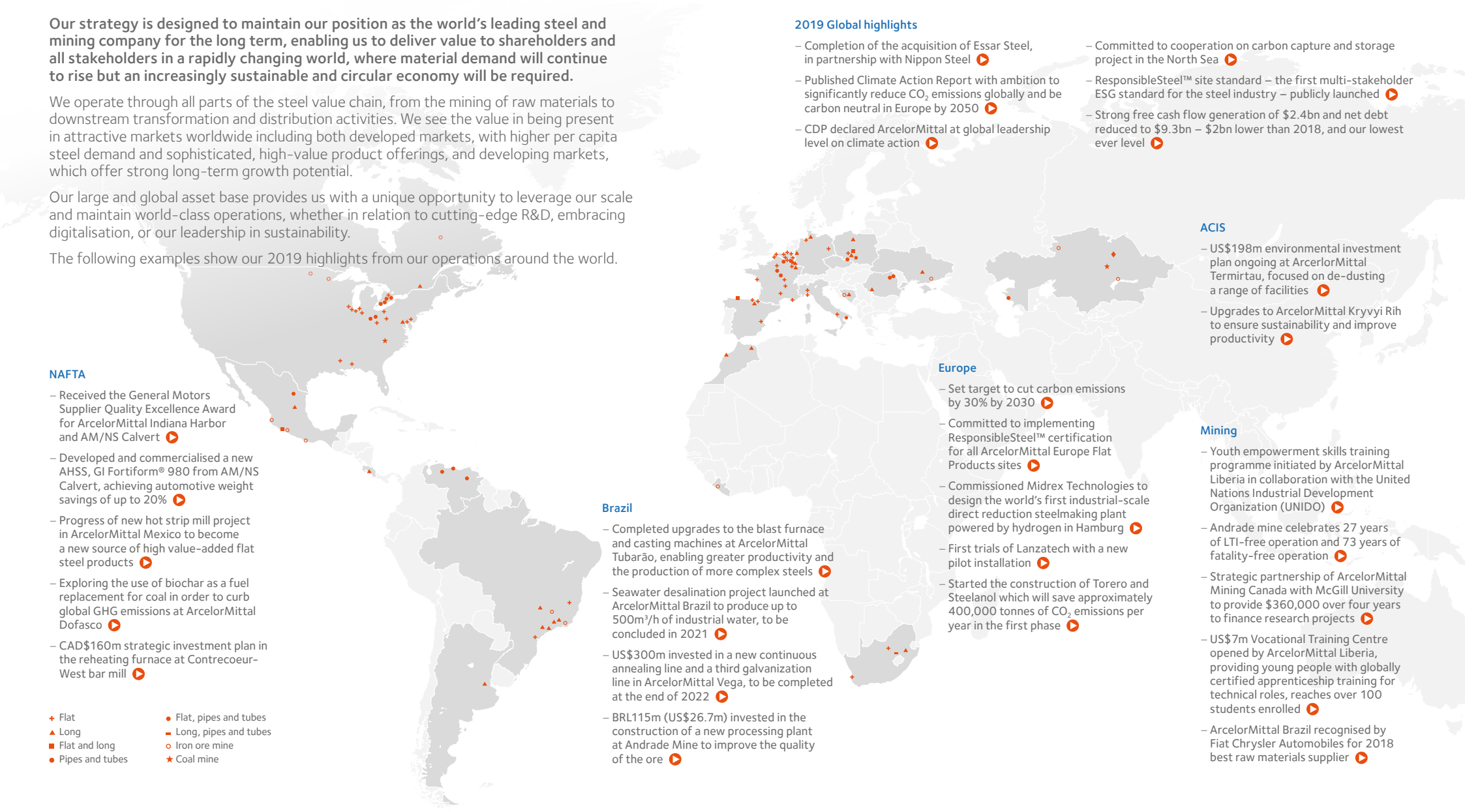
We operate through all parts of the steel value chain, from the mining of raw materials to downstream transformation and distribution activities. We see the value in being present in attractive markets worldwide including both developed markets, with higher per capita steel demand and sophisticated, high-value product offerings, and developing markets, which offer strong long-term growth potential.

Our large and global asset base provides us with a unique opportunity to leverage our scale and maintain world-class operations, whether in relation to cutting-edge R&D, embracing digitalisation, or our leadership in sustainability.

The following examples show our 2019 highlights from our operations around the world.

2019 Global highlights

- Completion of the acquisition of Essar Steel, in partnership with Nippon Steel
- Published Climate Action Report with ambition to significantly reduce CO_2 emissions globally and be carbon neutral in Europe by 2050
- CDP declared ArcelorMittal at global leadership level on climate action
- Committed to cooperation on carbon capture and storage project in the North Sea
- ResponsibleSteel™ site standard – the first multi-stakeholder ESG standard for the steel industry – publicly launched
- Strong free cash flow generation of $2.4bn and net debt reduced to $9.3bn – $2bn lower than 2018, and our lowest ever level



NAFTA

- Received the General Motors Supplier Quality Excellence Award for ArcelorMittal Indiana Harbor and AM/NS Calvert
- Developed and commercialised a new AHSS, GI Fortiform® 980 from AM/NS Calvert, achieving automotive weight savings of up to 20%
- Progress of new hot strip mill project in ArcelorMittal Mexico to become a new source of high value-added flat steel products
- Exploring the use of biochar as a fuel replacement for coal in order to curb global GHG emissions at ArcelorMittal Dofasco
- CAD$160m strategic investment plan in the reheating furnace at Contrecoeur-West bar mill

+ Flat
▲ Long
■ Flat and long
● Pipes and tubes
● Flat, pipes and tubes
▬ Long, pipes and tubes
○ Iron ore mine
★ Coal mine

Brazil

- Completed upgrades to the blast furnace and casting machines at ArcelorMittal Tubarão, enabling greater productivity and the production of more complex steels
- Seawater desalination project launched at ArcelorMittal Brazil to produce up to 500m³/h of industrial water, to be concluded in 2021
- US$300m invested in a new continuous annealing line and a third galvanization line in ArcelorMittal Vega, to be completed at the end of 2022
- BRL115m (US$26.7m) invested in the construction of a new processing plant at Andrade Mine to improve the quality of the ore

Europe

- Set target to cut carbon emissions by 30% by 2030
- Committed to implementing ResponsibleSteel™ certification for all ArcelorMittal Europe Flat Products sites
- Commissioned Midrex Technologies to design the world's first industrial-scale direct reduction steelmaking plant powered by hydrogen in Hamburg
- First trials of Lanzatech with a new pilot installation
- Started the construction of Torero and Steelanol which will save approximately 400,000 tonnes of CO_2 emissions per year in the first phase

ACIS

- US$198m environmental investment plan ongoing at ArcelorMittal Termirtau, focused on de-dusting a range of facilities
- Upgrades to ArcelorMittal Kryvyi Rih to ensure sustainability and improve productivity

Mining

- Youth empowerment skills training programme initiated by ArcelorMittal Liberia in collaboration with the United Nations Industrial Development Organization (UNIDO)
- Andrade mine celebrates 27 years of LTI-free operation and 73 years of fatality-free operation
- Strategic partnership of ArcelorMittal Mining Canada with McGill University to provide $360,000 over four years to finance research projects
- US$7m Vocational Training Centre opened by ArcelorMittal Liberia, providing young people with globally certified apprenticeship training for technical roles, reaches over 100 students enrolled
- ArcelorMittal Brazil recognised by Fiat Chrysler Automobiles for 2018 best raw materials supplier

How we create value

Inventing smarter steels for a better world

INPUTS

Strong balance sheet (financial capital)

- Total balance sheet **$87.9b**
- **$70.615bn** sales
- Building a strong platform for consistent shareholder returns

Unique global portfolio (manufactured capital)

- Completion of Essar Steel acquisition
- **$3.6bn** capex
- **89.8Mt** crude steel production
- Steel manufacturing in **18** countries, customers in **160** countries

Leading R&D (intellectual capital)

- **$301m** spend on R&D
- **69** inventions newly protected
- **11** R&D centres operational

Responsible resource use (natural capital)

- CO_2 transition strategy developed
- Target of reducing CO_2 emissions in Europe by **30%** by 2030
- Allocated a total of **US$711m** to 25 projects with energy and/or carbon benefits
- Approved a total of **38** projects with environmental benefits totalling **$692m**

High-performing organisation (human capital)

- **0** fatalities target
- **10%** incentive plan for leadership on LTIFR
- **191,248** employees
- Women make up **33%** of the Board of Directors

Stakeholder relations (social capital)

- The ResponsibleSteel™ site standard launched, committed to certifying 100% of Europe Flat sites
- Intention to achieve IRMA certification for Liberia and Brazil operations in three to five years
- **30** operations with a local confidential whistleblowing system

OUR OPERATIONS

STRATEGIC PRIORITIES

Improving health and safety

Read more in Section 2.1 on p.13

Delivering the strategic plan and achieving financial value

Read more in Section 2.2 on p.19

Innovating smarter steels and solutions

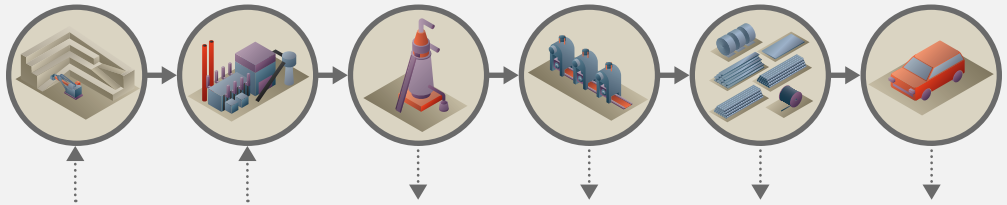
Read more in Section 2.3 on p.27

Driving environmental and social sustainability

Read more in Section 2.4 on p.39

FROM MINE TO METAL

R&D
We develop specialist steels and create breakthrough new technologies and processes for the steelmaking of the future



Mining	Raw materials	Making iron and steel	Casting and rolling	Finishing	Steel in modern life
Own iron ore production at **57.1Mt** supplying **52%** of the company's iron ore requirements	Iron ore Lumps Fines Concentrate pellets Sinter feed Coking coal PCI coal	**51** blast furnaces **33** electric arc furnaces **89.9Mt** crude steel production	Continuous caster Hot rolling Cold rolling	Coil Plate Section Tube Rod Wire	Automotive Construction Energy Packaging Appliances Transport By-products

OUTCOMES

Financial capital

Read more on p.19

- **$2.4bn** free cash flow generation
- Ebitda of **$5.2bn**
- 2019 adjusted net income of **$0.3bn**, excluding impairment and exceptional items
- **$9.3bn** net debt

Manufactured capital

Read more on p.19

- Action 2020 Ebitda improvement plan with **$2bn** of annual improvement to date
- **84.5Mt** steel shipped
- **57.1Mt** of iron ore produced

Intellectual capital

Read more on p.27

- **42** products and solutions launched
- **11** new products and solutions launched to accelerate sustainable lifestyles
- **31** products and solutions launched to support sustainable construction, infrastructure and energy generation
- Developing new business models – Steligence®

Natural capital

Read more on p.39

- CDP A- achieved
- **2.12t** CO_2 intensity per tonne of steel
- **5.3%** reduction in CO_2 emissions intensity in relation to the 2020 target
- **5%** reduction in dust intensity over three years (steel)

Human capital

Read more on p.14

- LTIFR at **0.75**
- **21** fatalities
- **29%** increase of the proactive PSIFs logged
- **57.4** hours of training per employee

Social capital

Read more on p.57

- **US$72.2bn** economic contribution
- **$30.3m** total community investment spend
- **$4.5bn** total tax contribution
- Forthcoming publication of Climate Action Report 2 in response to TCFD

How we create value

Value drivers	Strategic priority	Assets and action in 2019	Outputs and outcomes
Strong balance sheet (financial capital)			
Enables flexibility in capital allocation to ensure: – leading position in attractive product-market segments worldwide through active portfolio management – investment in our asset base and progressively increase shareholder returns over the long term	Delivering the strategic plan and achieving financial value	– Sales – Financial capital – Building a strong platform for consistent shareholder returns	– Strengthened balance sheet – Financial performance: – **US$9.3bn** net debt, lowest level since ArcelorMittal merger; achievement of the **$7bn** net debt objective remains a key priority – **US$2.4bn** free cash flow generation – Ebitda of **US$5.2bn** – 2019 adjusted net income of **US$0.3bn**, excluding impairment and exceptional items
Unique global portfolio (manufactured capital)			
Enables the company to derive value through our leading position in steel markets with favourable structures and dynamics	Delivering the strategic plan and achieving financial value Innovating smarter steels and solutions Driving environmental and social sustainability	– Action 2020 Ebitda improvement plan – Investment in high-return opportunities; strengthened asset portfolio with completion of Essar Steel acquisition – **US$2bn** asset optimisation programme underway – Mining providing strategic value to the group – Capex of **$3.6bn**	– Action 2020 Ebitda improvement plan with **$2bn** of annual improvement achieved to date, including **$0.4bn** of incremental cost/mix improvement in 2019 – **US$1.4bn** reduction in cash needs versus original plan – Ilva renegotiation – Essar Steel acquisition with Nippon Steel completed – **US$2bn** asset divestment programme underway with **US$0.6bn** of value unlocked since May 2019 (Gerdau stake sale, shipping JV formed) – Vertical integration of raw materials provides security of supply, value in use understanding, logistics synergies – **84.5Mt** steel shipped and produced **57.1Mt** of iron ore
Leading R&D (intellectual capital)			
Enables the invention of smarter steels to further enhance our product and service offerings to meet our customers' evolving needs	Delivering the strategic plan and achieving financial value Innovating smarter steels and solutions Driving environmental and social sustainability	– **US$301m** spend on R&D – **11** R&D centres operational – **42** products and solutions launched – Developing new business models, products and solution contributing to low-carbon world	– **11** new products and solutions launched to accelerate sustainable lifestyles while progressing further on 16 such product development programmes – **31** products and solutions launched to support sustainable construction, infrastructure and energy generation while progressing on **17** such product development programmes – Fully capitalising on the capacity of Steligence®: delivered **500,000** tonnes of steel; well received by architects; considerable potential given its ability to contribute to low-carbon construction solutions – Developed S-in Motion® for hybrid vehicles, BEV and battery packs – **27** lifecycle assessment studies – **69** inventions newly protected

How we create value

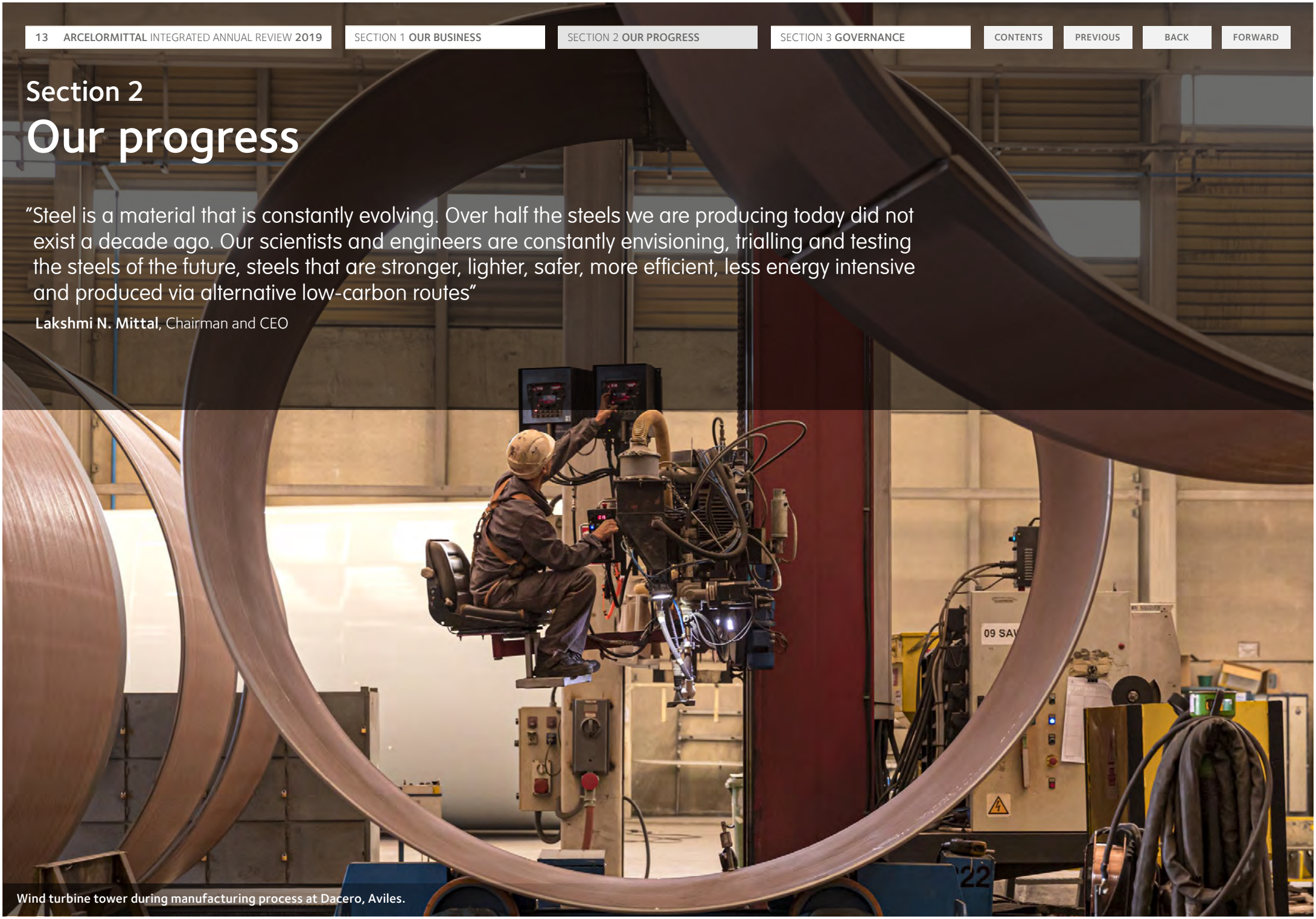
Value drivers	Strategic priority	Assets and action in 2019	Outputs and outcomes
Responsible resource use (natural capital)			
Enables efficient production of steel, and maximises the value of by-products while building and maintaining the trust of our stakeholders	Driving environmental and social sustainability Innovating smarter steels and solutions	– CO_2 transition strategy developed, announced target of reducing CO_2 emissions in Europe by **30%** by 2030 over a baseline of 2018 and being carbon neutral in Europe by 2050 – Allocated a total of **US$711m** to 25 projects with energy and/or carbon benefits – Approved a total of 38 projects with environmental benefits totalling **US$692m** – Maximising value of by-products to deliver cost reduction and sustainability benefits – **115.2mt** iron ore, **46.5mt** PCI and coal, **27.8mt** coke used – **26.2** million tonnes scrap recycled – **US$1,403m** environmental and energy capex allocated – **2.124** PJ primary energy consumed in steelmaking – 5-year environmental plans in development at all major sites – Multi-year environmental and energy capex allocated	– CDP A- achieved – Partnership with Ecocem, transforming blast furnace slag into low-carbon cement, high-quality material with verified carbon footprint 95% lower than traditional cement – **14.8mt** of BF slag sold to the cement industry, a **19%** year on year increase – **11.30** million tonnes CO_2 avoided due to blast furnace slag reuse in cement industry – **34** million tonnes CO_2 avoided due to use of scrap – **5.3%** reduction in CO_2 emissions intensity in relation to the 2020 target – **2.12t** CO_2 per tonne of steel – **196.1** million tonnes absolute CO_2e footprint (steel and mining) – **5%** reduction in dust intensity over 3 years (steel) – **2%** reduction in NO_x intensity over 3 years (steel) – Year on year reduction in SO_x emissions in both absolute emissions and intensity – Decrease in net water use per tonne of steel from **3.9** to **3.4 m³/t**
High-performing organisation (human capital)			
Enables our employees to feel safe, respected and valued, to develop their skills, be committed to their work and able to perform at their best	Improving health and safety Driving environmental and social sustainability	– Take Care and Safety Leadership trainings – **10%** incentive plan for leadership based on LTIFR – Focus on reporting potential severe injuries and fatalities (PSIFs) – **191,248** employees, **57.4** hours of training per employee – ArcelorMittal University – Women make up **33%** of the Board of Directors – **90.11%** of employees completed human rights training – **95.38%** of employees completed anti-corruption training – **88.64%** of employees completed code of conduct training	– LTIFR at **0.75** – **21** deaths – **29%** increase of the proactive PSIFs logged in – Women were **28%** of recruits in exempt population – **7%** vice presidents are women – **13%** women in succession plans for key positions
Stakeholder relations (social capital)			
Essential to maintain our licence to operate with our customers, host governments, investors and communities	Driving environmental and social sustainability	– The ResponsibleSteel™ site standard launched; committed to certifying **100%** of Europe Flat sites – Intention to achieve IRMA certification for Liberia and Brazil operations in three to five years – Established community dashboards with the ARCGS Committee using a traffic light system to oversee the significance of a site's risks and opportunities – **30** operations with a local confidential whistleblowing system – Numerous stakeholder surveys and engagement meetings	– **US$72.2bn** economic contribution – **US$30.3m** total community investment spend – **US$4.5bn** total tax contribution – Published Climate Action Report in response to TCFD – Forthcoming publication of Climate Action Report 2 in response to TCFD

Section 2

Our progress

"Steel is a material that is constantly evolving. Over half the steels we are producing today did not exist a decade ago. Our scientists and engineers are constantly envisioning, trialling and testing the steels of the future, steels that are stronger, lighter, safer, more efficient, less energy intensive and produced via alternative low-carbon routes"

Lakshmi N. Mittal, Chairman and CEO



Wind turbine tower during manufacturing process at Dacero, Aviles.

Section 2.1

Improving health and safety

"Nothing is more important than the safety of our employees and contractors, and that is why we must always choose the safest way. We know that it is possible to operate safely and without incident, but it is hard, and requires continual effort and awareness."

Lakshmi N. Mittal
Chairman and CEO

French Ministry of Culture, Paris

Section 2.1 **Improving health and safety**

"This year, tragically, our journey towards eliminating fatalities has taken a backwards step. It is with deep regret that we record the loss of 21 colleagues in 2019. This is distressing and we cannot rest until all our people work in a safe environment. To achieve the truly safety-first culture we all want, we must learn from these accidents, and prevent them from happening again anywhere. Despite results this year, I firmly believe that being a fatality-free organisation is possible – but there is a lot more work to be done to make this a reality."

Lakshmi N. Mittal
Chairman and CEO

R&D operative (or technician) at ArcelorMittal R&D, Maizières-lès-Metz, France.

Safety is – and must always remain – our highest priority. Our lives are precious, and as ArcelorMittal people we owe it to each other, and to all our communities and stakeholders, to always choose the safest way. Those of us who have suffered a fatality at a plant know just how devastating it is, and that nothing is more important than life itself. This is why we are determined to embed a safety-first culture throughout all our operations. A safer business is a better business, and an essential element in building a high-performing organisation.

Managing our response to Covid-19

These are unprecedented times. The Covid-19 outbreak has impacted many countries around the world, and disrupted the lives and working routines of many millions of people. We are taking the risks associated with the outbreak extremely seriously, and the safety and wellbeing of our employees is of paramount importance.

Where possible, employees are working remotely from home. Where assets continue to operate, to maintain the safest possible workplace, we are following the recommendations of governments from around the world and managing our response in line with the World Health Organisation (WHO) guidelines. We appreciate that all of this brings new challenges for everyone, and would like to recognise the resilience and flexibility of our global workforce. It is through our strength in working together as a community and supporting each other that we will come through these challenging times.

We are monitoring the situation closely, and are in continuous contact with our leadership teams in all the regions where we operate, where we are working hard to ensure we continue to take the right decisions for the wellbeing of our people and of our plants.

For the most up to date information on our response to Covid-19, see our website.

Section 2.1 **Improving health and safety**

Wind turbine tower during manufacturing process at Dacero, Avilés.

A challenging year

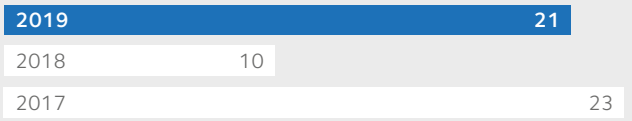
In a heavy manufacturing environment hazards do exist, and this means awareness is critical at all times. The tragic set-back we see in our safety results this year is a reminder that we can never be complacent, nor take progress for granted. Improving safety remains a key focus for everyone in the company, and we all have more to do.

Being a totally safe organisation every day takes a lot of work. It requires constantly maintaining a culture of shared vigilance, in which risks and hazards are understood and monitored, best practices are shared, and appropriate action is taken at every level. In spite of challenging safety results this year, we need to remember that we have made considerable progress over recent years in our campaign to advance such a culture, and to improve our safety performance. A decade ago, we suffered nearly twice as many fatalities and injuries as we do now, and we can take some reassurance in the fact that our lost time injury frequency rate (LTIFR) this year, when compared like-for-like with last year, was broadly stable, making it the second lowest in our history.

We now have sites that have gone years without suffering a single injury or death, and this proves to us both that this is possible, and that we have the capabilities to realise our ambitions. In Europe and South America, for example, with the new training we have implemented, and the safety-first culture we have successfully instilled, we are achieving record safety performance. Our challenge therefore is to draw on our global reach, and apply the safety learning from our high-performing regions throughout all of our operations, as well as from our external benchmarking exercises. This approach is embodied in our global safety programme to eliminate accidents altogether: Journey to Zero.

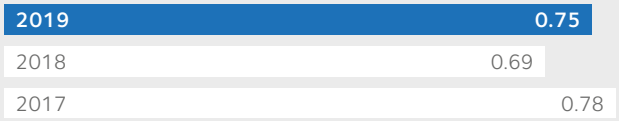
Fatalities

21



LTIFR (Number of lost time injuries per million hours worked)

0.75



Data does not include the LTIFR for Ilva (subsequently renamed ArcelorMittal Italia) which was acquired on November 1, 2018.

Learning and improving from within

Safety requires a combination of strong and effective leadership, and highly aware teams that work within a safety-first culture of mutual care and vigilance. To meet these needs we have developed our twin programmes of Safety Leadership Training (SLT) for leaders, and Take Care Training (TCT) for teams, that together equip operations with the tools and understanding to improve their own safety performance. Workforce involvement in safety is critical as it moves the initiative away from a top down-approach, and towards an embedded safety culture, with leadership and values driving continuous improvement on site.

Following a successful programme of implementation across our European and Long LATAM segments, where fatalities have more than halved since the training was introduced, we now have a proactive plan to roll out to our more challenging regions. In 2020-21, SLT will be delivered in a single wave throughout CIS, starting first with the top 100 leaders, and then cascading down all the way to the shop floor to reach over 10,000 leaders. This will be followed by TCT from the shop floor up to achieve a holistic transformation. We plan to extend the programme to Mexico and ArcelorMittal Mining Canada (AMMC) in the future.

SLT has a practical focus, and encourages leaders to commit to specific actions with post-training follow-up. TCT encourages workers to be proactive in spotting hazards, speaking up and taking action. Implementation of SLT precedes TCT to ensure leaders are properly equipped to set the safety culture and respond effectively.

Strengthening safety through the use of best practice tools and measurements

To make progress, we also need to learn from accidents and potential accidents as they occur, and from our use of the tools we deploy to prevent them. That is why we are focused on improving the way we record, analyse and share incident reports and best practice from across the group.

In 2016, we introduced the measure of potential serious injuries and fatalities (PSIFs) to develop our ability to detect and treat proactively the precursors of accidents. The volume of PSIFs we record has increased more than threefold since then, and 2019 showed a further 29% increase on 2018, with 3,500 PSIFs logged. Results show that sites with no fatalities record twice as many PSIFs as those that have one or more, and so our aim is to continue increasing the overall detection and recording of PSIFs, while levelling up those sites that are detecting fewer. One way we are achieving this is through use of a pooled PSIF database, which enables sites to share PSIFs, and learn awareness and best practice from each other.

We are also promoting the use of three industry-leading 'golden tools' across our operations, and the concept of safety as a proactive system. The tools are:

- HIRA-Lite: hazard identification and risk analysis, undertaken before performing any non-standard task
- Pre-shift safety meetings
- Shop floor audits

Since 2017 we have been monitoring how sites use these tools, and by analysing results are able to measure gaps in the quality of their deployment, and drive improvements by sharing best practice from leading sites.

We are also pioneering the use of new technologies for improving safety. For example, we are piloting virtual reality training for safety risks in the US, and using our social media app Yammer, with its Journey to Zero group, to share safety experiences among the group's 7,000 active members worldwide.

Analysing our performance

This year our lost time injury frequency rate (LTIFR) was 0.75 excluding ArcelorMittal Italia, and 1.21 including ArcelorMittal Italia. This is because ArcelorMittal Italia, which represents 26 million work hours, only came under our management in November 2018, and it will take time to bring performance in line with the rest of our operations. The figure 0.75 LTIFR represents a slight deterioration on a like-for-like comparison with the figure of 0.69 from last year. However we see a slight improvement when the restricted work frequency rate is included, suggesting that overall performance was broadly stable.

This compares favourably with the wider steel industry: the Worldsteel Association average LTIFR in 2018 was 0.84. Our targets for next year are to achieve an LTIFR of 0.68 excluding ArcelorMittal Italia, and 1.14 including ArcelorMittal Italia.

Section 2.1 **Improving health and safety**

Safety governance

Safety is one of five SD management themes, and is overseen by our Appointments, Remuneration, Corporate Governance & Sustainability Committee (ARCGS) of the Board of Directors (for more on the ARCGS, see Driving social and environmental sustainability, p.39). The ARCGS meets quarterly and reviews comprehensive health and safety information. LTIFR, PSIF and fatalities are all KPIs for these meetings, and are also reported monthly to leadership as part of the governance process. Health and Safety policy is being reviewed to include ARCGS recommendation that safety is a formal condition of employment at ArcelorMittal. Safety is further reviewed on a regular basis by our Joint Global Health and Safety Committee (JGHSC), which is made up of union reps from both IndustriAll and ArcelorMittal, together with senior ArcelorMittal managers. When a fatality occurs, all levels of management are informed of the circumstances, and the incident is subject to a comprehensive review process. We then provide corporate support to the site in question to ensure strong alignment between group-level safety strategy and site-level implementation.

Health

Alongside safety, we value the health and wellbeing of our workforce and communities, and aim to reduce occupational diseases to zero as part of our Journey to Zero programme. We run a range of initiatives at our sites around the world to minimise workers' exposure to potentially hazardous microclimatic conditions and chemicals, and to prevent health issues from arising. We also look to address the overall health of our employees, and encourage healthy lifestyles in relation to such issues as smoking, alcohol and drug use.

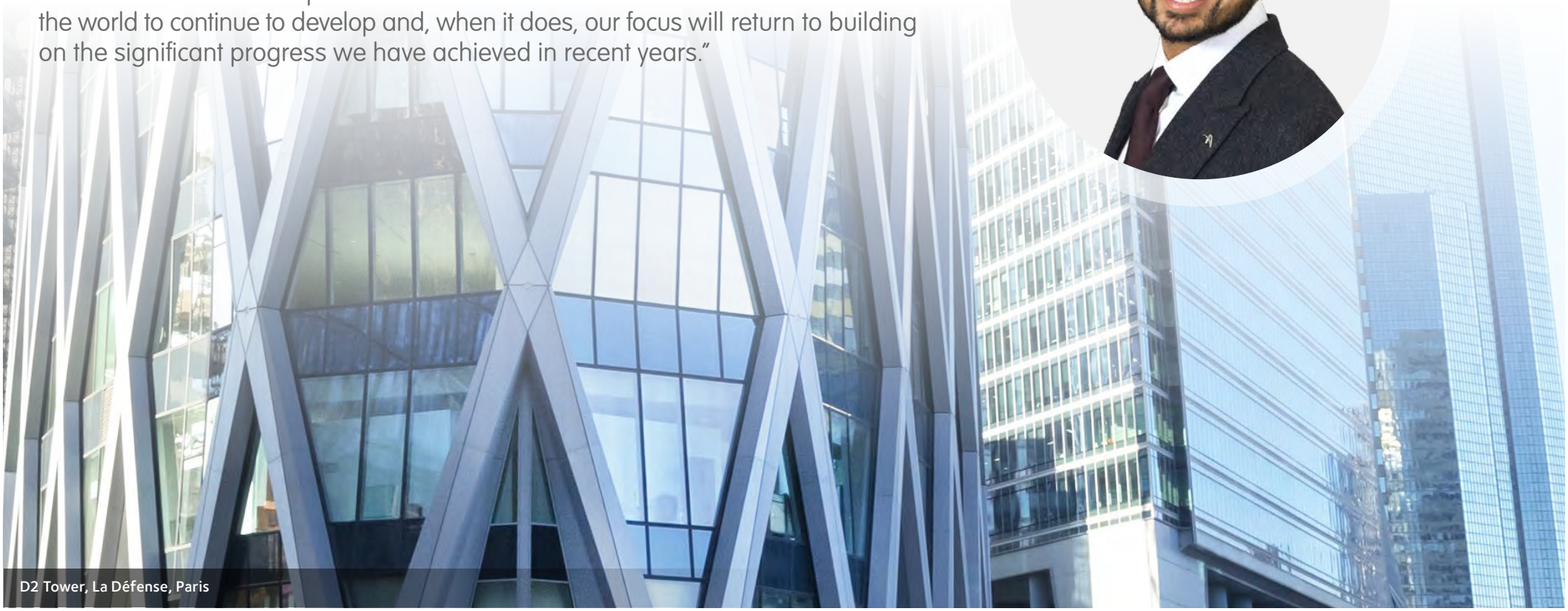
Safety is – and must always remain – our highest priority.

Section 2.2

Delivering the strategic plan and achieving financial value – President and CFO's statement

"Market conditions in 2019 were challenging, but our ability to continue to progress our strategic initiatives was encouraging. We improved our financial footing, continued to strengthen our business through the delivery of our Action 2020 strategic plan, and expanded our global operating platform by establishing a sizeable presence in the Indian steel market. We do not yet know the full implications of Covid-19, nor how exactly the global economy will rebound over time. However we do expect the fundamentals to reassert themselves and for the world to continue to develop and, when it does, our focus will return to building on the significant progress we have achieved in recent years."

Aditya Mittal
President and CFO
of ArcelorMittal



D2 Tower, La Défense, Paris

Section 2.2 **Delivering the strategic plan and achieving financial value**

As we prepare this report, the world is struggling with the extreme weight of an unparalleled global pandemic. Approximately one-third of the global population is under some form of previously unthought-of government enforced lockdown. Economic activity has been paralysed. And the impact on humanity continues to grow by the day.

We do not yet know the full implications of Covid-19, but we do know that the crisis the world is currently trying to address is unprecedented and its human, societal and economic impact is enormous. Like many other companies, we are doing all we can to navigate the Covid-19 crisis, to maintain our operations where possible and where demand allows, and to ensure we support our employees and always place their health, safety and wellbeing at the top of our list of priorities.

While the full impact of the crisis is unknown, we hope that it is short-lived and that it will only be a matter of months before the world, our company and our employees can resume normal life.

Volatility is, however, something that the steel industry is familiar with. While 2018 marked our strongest financial performance since the financial crisis, last year was a stark reminder of how quickly and sharply the steel cycle can turn. Market conditions in 2019 were very challenging. Aside from the conditions we are operating in today, last year was the toughest we have faced since the global financial crisis. Global economic growth softened further than anticipated; steel demand in our core markets fell for the first time since 2015 and demand from the automotive sector weakened as vehicle manufacturers transitioned to stricter environmental legislation. This, alongside a significant and prolonged period of destocking, resulted in steel prices falling throughout 2019, while raw material prices remained high, squeezing margins to levels well below historical norms.

Although the impact of this operating environment was visible in our financial performance last year, our ability to continue to progress our strategic initiatives in very difficult market conditions was nevertheless encouraging. Indeed, there were several notable achievements in 2019: we further improved our financial footing; continued to strengthen our business through the delivery of our Action 2020 strategic plan; and expanded our global operating platform by establishing a sizeable presence in the Indian steel market.

"Despite our Ebitda declining last year we were able to further strengthen our balance sheet, ending 2019 with net debt of US$9.3 billion – our lowest ever level. This was primarily driven by strong free cash flow generation of US$2.4 billion."

Aditya Mittal, President and CFO of ArcelorMittal

Ebitda in 2019

$5.2bn

$9.3bn
net debt

$2.4bn
free cash flow

Strong free cash flow performance supports further balance sheet strengthening

Despite our profitability levels declining last year – Ebitda was US$5.2 billion, nearly half the level we generated in 2018 – we were able to further strengthen our balance sheet, ending 2019 with net debt of US$9.3 billion[1] – US$2 billion lower than one year ago, and our lowest ever level. Our target is US$7 billion, as this is the level we believe will support positive free cash flow and sustain investment grade credit metrics throughout all aspects of the steel cycle. We remain focused on meeting this target and are committed to increasing returns to shareholders upon its attainment.

The improvement in our net debt position was primarily driven by strong free cash flow generation of US$2.4 billion and the initial progress made against our objective to unlock US$2 billion of value from our asset portfolio by mid-2021.

1 Reported 2018 year-end net debt was US$10.2 billion. This was prior to the Company adopting IFRS 16 lease accounting regulations on 1 January 2019, which resulted in a net debt increase of US$1.2 billion.

Section 2.2 **Delivering the strategic plan and achieving financial value**

Action 2020: enhancing our structural resilience

Generating positive free cash flow at the low point of the steel cycle was the central purpose of Action 2020, our five-year strategic plan launched in 2016. Our free cash flow generation last year is therefore very pleasing, as it demonstrates the progress we have made against our strategic plan and the increased resilience we have built into our business.

With a year of Action 2020 to run, we have achieved US$2 billion of its targeted US$3 billion Ebitda improvement. There are three components of the plan, increasing volumes, reducing cost and increasing the proportion of higher-added value products we sell, each of which have an equal weighting. While we have made strong progress on cost and product mix, given the external environment, exacerbated by Covid-19 disruptions, achieving our volume targets in the short term will not be possible. We have therefore identified a further US$1 billion of permanent cost savings which we are targeting for this year, which of course will be supplemented by significant efforts to reduce costs in line with the demand realities created by Covid-19.

Further strengthening our operating footprint

Action 2020 is a component of our broader strategy, which is designed to maintain our position as the world's leading steel and mining company for the long term. An important aspect of this is maintaining, or developing, leading positions in attractive markets worldwide through active portfolio management. This means ensuring we have a strong presence in both developed markets, which have higher per capita steel demand and customers with sophisticated product requirements, and developing markets, which offer strong long-term growth potential.

2019 was a landmark year for ArcelorMittal in this regard as we realised a 15-year ambition by establishing a presence in the world's fastest growing steel market, India. The acquisition of Essar Steel, which has subsequently been re-named AM/NS India, completed in December 2019. The transaction was structured as a joint venture with Nippon Steel Corporation (Nippon), in which ArcelorMittal holds 60% with Nippon holding the balance. Nippon is a long-term partner of ours, with whom we have a trusted and enduring relationship and jointly own and operate three assets in the USA.

"Generating positive free cash flow at the low point of the steel cycle was the central purpose of Action 2020, our five-year strategic plan launched in 2016. Our free cash flow generation last year is therefore very pleasing, as it demonstrates the progress we have made against our strategic plan and the increased resilience we have built into our business."

Aditya Mittal, President and CFO of ArcelorMittal

Varnished electrical steel coil being moved by crane.

The attraction of the Indian market is widely rehearsed: current steel demand per capita is approximately one-third of the global average; demand is forecast to increase at a compound annual growth rate (CAGR) of between 6 and 7%; and the Indian government has set out ambitious plans to triple its domestic steelmaking capacity to 300 million tonnes by 2030. And AM/NS India is a quality asset. It has size, with a nameplate steelmaking capacity of 9.6 million tonnes, is scalable and – despite undergoing a lengthy insolvency resolution process – is profitable and cash generative. So we are very pleased to have established a presence in India and done so through the acquisition of a quality operation. Over the long-term, we plan to grow capacity at AM/NS India, with an ambition of ultimately reaching production of between 12 and 15 million tonnes so the company plays a full and active role in the development of the Indian steel industry.

9.6 million tonnes

nameplate steelmaking capacity of Essar Steel, now AM/NS India, our most recent acquisition

For more on Essar Steel, see Spotlight on Essar Steel, p.23

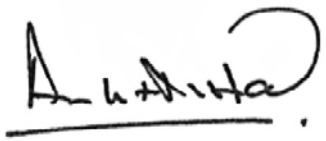
The other recent acquisition we have completed is of course Ilva in Italy. While the strategic and industrial logic for the acquisition still applies, our efforts last year to improve Ilva's performance were hampered by several significant legal and operational issues. Following extensive discussion with the Italian government to address these issues, we were able to sign a revised lease and purchase agreement which set out the framework for a new partnership between ArcelorMittal and the Italian government. The agreement outlines the terms for a significant investment by Italian state-sponsored entities into Ilva and is structured around a new industrial plan which involves the introduction of lower-carbon steelmaking technologies.

Focused on creating sustainable value

As we entered 2020, there were some early signs of improvement in the market environment. Inventory levels indicated the significant destock we witnessed throughout 2019 was ending and this was supporting a slightly better price environment. And, after contracting demand in many of our operating markets last year, our apparent steel consumption forecasts for 2020 initially pointed to growth in each of our operating markets.

Clearly Covid-19 has materially changed this picture. While it is too early to predict what the rest of this year holds, we did recently set out – at the time of our first quarter results – our response to the crisis, which is built on four pillars: ensuring our operations continue to be safe and healthy working environments; ensuring our operations play a responsible and appropriate role in supporting their communities, and more broadly the societal response to Covid-19; aligning production with the reduced level of demand, while ensuring we are able to continue to meet the needs of our customers where demand exists, and; reducing our costs, preserving cash and maintaining our rigorous focus on working capital management. Earlier this week, we also announced plans to further strengthen our balance sheet through a US$2 billion capital raise.

Prior to the Covid-19 pandemic the global economy and the global steel industry were both fundamentally healthy. Exactly how the global economy rebounds from this crisis remains to be seen, and undoubtedly there will be significant repercussions for some time to come. However we do expect the fundamentals to reassert themselves and for the world to continue to develop and grow. And, when it does, our focus will return to building on the significant progress we have achieved in recent years.



Aditya Mittal
President and CFO of ArcelorMittal

SPOTLIGHT

Essar Steel: a strong new position in the world's most attractive, high-growth steel market

"The acquisition of Essar Steel is an important strategic step for our company. India has long been identified as an attractive market, and we have been looking for suitable opportunities to enter for over a decade. Both India and Essar Steel's appeal are enduring. Now, with our leading expertise and technology, we will be able to make a positive contribution to India's fast-growing steel industry."

Aditya Mittal
President and CFO of ArcelorMittal
Chairman of AM/NS India

In 2019, we completed the acquisition of Essar Steel in a joint venture with Nippon Steel to create AM/NS India. This marks the culmination of our decade-long journey to enter the Indian steel market with the right opportunity.

India is the world's fastest growing large economy and, as its population continues to urbanise, develop and grow, its need for steel will grow too. Current per capita steel consumption rates are low, and we anticipate an annual growth in steel demand of 6-7%. This is matched by India's national steel policy to achieve a threefold rise in steel production to 300 million tonnes per year in the next decade. Over this time, demand will also become increasingly sophisticated, as ever higher grades of steel are required to build the hi-tech cars, buildings and infrastructure that India needs.

All of this makes India the world's most attractive high-growth steel market. It is also one which plays to our particular strengths of scale, R&D prowess, and leading innovative steels.

Read more about AM/NS India

SPOTLIGHT Essar Steel: a strong new position in the world's most attractive, high-growth steel market

A unique opportunity

With the acquisition of Essar Steel, we enter India as its fourth largest steel producer, with an immediate capacity of 7.5 million tonnes per annum and, with a nameplate capacity of 9.6 million tonnes per annum, significant potential for further growth. This fits well with our strategy to be a leader in the markets where we operate. But beyond scale, Essar Steel has a number of features that make it a unique and compelling asset. These include:

- **Quality:** Essar Steel is a high quality steel producer with a complete basket of flat rolled steel products, including value-added steels. With our expertise and R&D, we are confident we can improve product quality even further, and realise better margins.
- **Raw material security:** Essar Steel has complementary pellet production in eastern India, and direct access to rich iron ore reserves. Pellet production capacity now stands at 14 million tonnes per annum, and is currently being expanded to 20 million tonnes per annum.
- **Strategic locations:** with Essar Steel, we have excellent access to port infrastructure for the movement of raw materials and finished goods. We also have strong domestic distribution across India, with service centres in key industrial clusters and competitive locations.
- **Cash generative:** the business performance of Essar Steel is very encouraging. Throughout the acquisition process, the business remained strongly profitable, achieving record production in 2019. Run rate Ebitda in the month of January 2020 was $600 million.

Essar Steel became available for acquisition through India's new Insolvency and Bankruptcy Code – a genuinely progressive reform, for which the Essar Steel acquisition is a model case.

An ambitious plan

Our goal is clear: we are committed to building on the quality that exists to ensure AM/NS India becomes the most efficient and safest steel producer in India. Our industrial strategy is to invest in existing operations, and infuse our expertise and best practice to deliver gains in efficiency, technology, product quality and profitability. We plan to increase capacity to 8.5 million tonnes per annum over the medium term, and in the long term, to grow the business further to 12-15 million tonnes per annum through the addition of new iron and steelmaking assets. We also plan to develop an R&D centre in Hazira to maintain critical competitive edge in this period of rapid market expansion.

We are proud that through both increasing steel output, and introducing new, higher value-added products, we will be making a significant contribution to the growth and development of the Indian steel industry, and the Make in India initiative.

A long and successful partnership

AM/NS India is a joint venture formed between ArcelorMittal and Nippon Steel. We have a long and successful record of working with Nippon Steel, encompassing over 30 years of partnership, and three joint ventures in the US producing cutting-edge, technically advanced steel products. We have outstanding combined leadership and R&D, and together offer the broadest and deepest product portfolios in the global steel industry.

ArcelorMittal holds 60% of AM/NS India, with Nippon Steel holding the balance. AM/NS India was financed through a combination of partnership equity (one third) and debt (two thirds). The acquisition cost was $7bn, and our investment is equity accounted.

To ensure continuity of expertise and knowledge transfer, the interim management team has been retained in the new joint venture. Aditya Mittal, President and CFO of ArcelorMittal, has been appointed Chairman of AM/NS India.

India

Fastest growing large economy; second-largest steel producer

India's per capita consumption of steel is about one third of the global average

300m

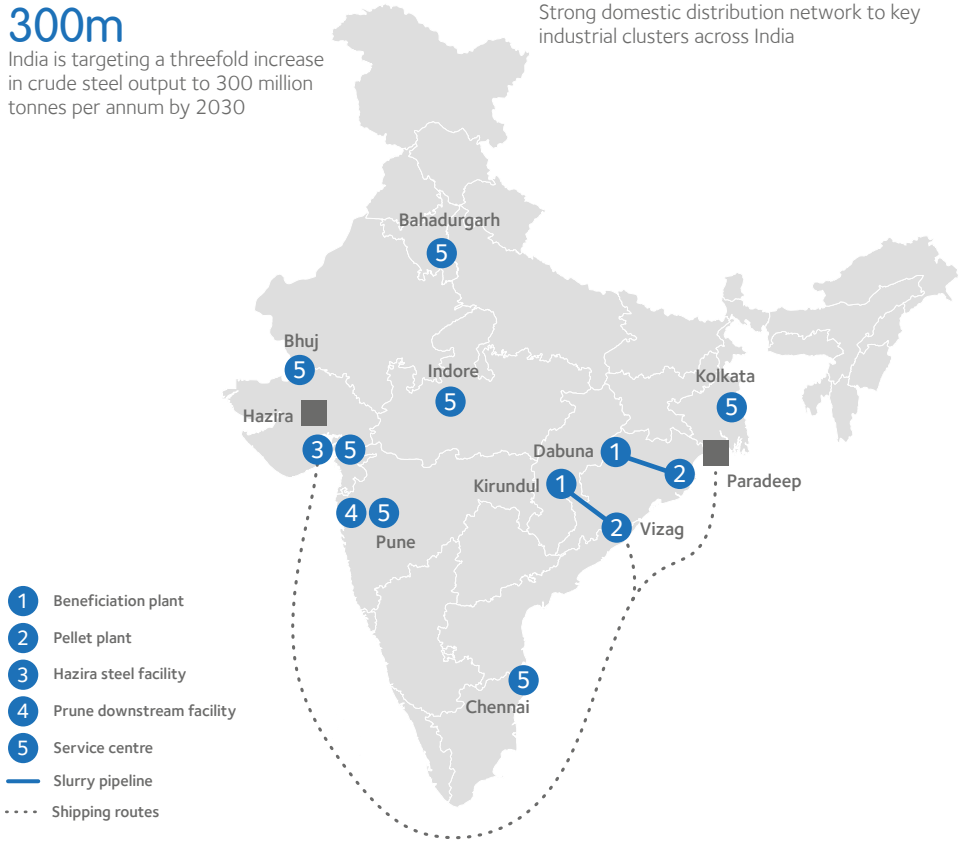
India is targeting a threefold increase in crude steel output to 300 million tonnes per annum by 2030

AM/NS India

Hazira is one of the world's largest single-location flat steel plants

Complementary pelletising capability in eastern India with direct access to rich iron ore reserves

Strong domestic distribution network to key industrial clusters across India



ArcelorMittal Mining, Canada

SPOTLIGHT
Delivering integrated value with mining

"Our unique position as a global mining and steelmaking business allows us to develop the right resources to produce the right products. Our mining segment is fully aligned with the needs of steelmaking, which enables us to increase yields through delivery of tailored iron ore products and coal blends, while at the same time driving safety and sustainability. This is how we continue to deliver value to the group."

Simon C. Wandke
CEO of ArcelorMittal Mining

The best steel from the best ore

At ArcelorMittal Mining, we are committed to delivering group value by being competitive against suppliers with an exclusive mining focus. The key advantage for mining as a fully integrated segment of our global steel business is that we can leverage our world class ironmaking expertise and R&D, and develop processing routes for our ores that are tailored to fit our steel mills.

Our specialised, high value-in-use (VIU), largely man-made concentrate products advance the productivity of our steelmaking operations, achieving higher yields and improved margins. By also selling a proportion of our mining products externally to different steel mills worldwide, we can continue to ensure our products are globally competitive.

Safety is our highest priority

The safety of all our employees is our highest priority, and we are increasing our efforts to implement a safety-first culture by proactively implementing preventative measures and leveraging best practice approaches. We are specifically focusing on PSIFs, detailed analysis, root cause reviews, risk assessment and leadership. Courageous leadership in particular permeates all levels of the mining business, and is about creating an environment in which people are valued above all other priorities and we are all committed to eliminating risks, taking responsibility and having the courage to make positive change.

For many years we have achieved a steady decrease in the frequency of our mining injuries. However in 2019, tragically, our journey has taken a backwards step, and it is with deep regret that we report the loss of 9 colleagues and a deterioration in year on year LTIFR. Our goal to eliminate fatalities nevertheless remains and, notably, at our Andrade mine in Brazil, we recently celebrated 73 years of being fatality free, confirming to us that this is possible. We are therefore redoubling our work to share best practice, deliver on our ambitious safety training plan, and advance our safety-first culture. For more on safety across the group, see Improving health and safety, p.15.

Innovation on all fronts

As a group we are committed to innovation, and mining is no exception. We work closely with our R&D teams on the specialised processing of ore products, but also on improving our mining processes, enhancing sustainability, and exploiting the latest digitalisation and Industry 4.0 technologies.

In addition, as a steelmaker, we are uniquely positioned to develop high-strength steel solutions for the mining industry.

Areas in which we are developing innovation-driven solutions include:

- **Digitalisation:** we are using state-of-the-art database technologies and real time data from Internet of Things (IoT) sensors to make the entire mining production chain visible. This feeds the integrated optimisation of planning and processes based on AI and operations research models, yielding cost and efficiency gains.
- **New technologies:** we are advancing the use of robust wireless IoT sensors (for example, heat sensors and laser scanners), 3D printing of spare parts (used in combination with predictive maintenance to minimise downtime), and the automation of equipment, such as automated trucks and drones with remote operating centres. We are also integrating new advancements in algorithms, including machine learning and deep learning, to support the decision-making process. And we have further been working on developing the concept of a fully automated plant, with a high level of automation and control including optimisation of systems, online analysis and AI implementation.
- **Energy and water:** we are constantly striving to improve energy efficiency and water recirculation rates, including work on tailings thickening and advanced water processing and segregation techniques.
- **Processing methodologies:** we produce specialised ore pellets that increase productivity in the blast furnace thanks to their unique design composition.

Mining sustainably, responsibly and with assurance

In order to be the preferred developer for the governments and communities of the future, and the preferred supplier for our customers, we must continue transforming our mining operations, and embedding sustainable development into our decision-making. In 2019, we formed the CEO Sustainable Development (SD) Council for mining to oversee, discuss and exchange on SD issues across all our mines, and advance our commitment to mining sustainably, responsibly and to the highest standards, as expected by our communities and society.

The core objective of the CEO SD Council is to establish best practices and effectively manage the environmental, social and governance (ESG) risks to our business associated with the safety and security of our people and assets, and with issues ranging from the environment and climate change to engagement with community stakeholders. This approach will strengthen our licence to operate and create shared value for all our stakeholders. Our medium-term focus is on progressing all our mining operations towards recognised external certification, as this becomes the standard used throughout our group for raw materials (see Reassuring our customers on sustainability performance from mine to steelmaking, p.54). This is an ambitious goal, and there is much work we need to do.

Our flagship operation, ArcelorMittal Mining Canada (AMMC), has been implementing the protocols of Towards Sustainable Mining (TSM, the standard of the Mining Association of Canada, or MAC) since 2004, and our mines in Canada are all TSM-assured and 5-star rated. Elsewhere, our operations in Liberia and Brazil are investigating assessment by the Initiative for Responsible Mining Assurance (IRMA, an internationally recognised third-party verification and certification standard), and it is our intention to achieve accreditation for these operations in three to five years. We are also looking into implementing IRMA across our other mines in the coming years to reassure our customers that all our raw materials have been sourced and produced responsibly.

Our CEO SD Council is also performing a comprehensive internal mapping and self-assessment exercise, and following the completion of this in 2020, we will draw up detailed timelines for progress towards full certification using a phased approach.

Our sustainable development work also includes local environmental and community programmes. For example, in Liberia we have been supporting sustainable forest management and livelihoods in the Nimba County rainforest since 2011 through our Biodiversity Conservation Programme. Also in Liberia, we are especially proud of our Vocational Training Centre, opened in 2017 with a $7 million investment. The Centre provides young people with globally recognised and certified apprenticeship training for technical roles, and is the only such centre in the country. In 2019, 54 new apprentices enrolled in training, bringing the total to 100 students, including six young women.

Managing tailings

Our strong governance model aims to ensure that our tailings storage facilities (TSFs) are structurally sound and safe, with all efforts directed at minimising the risks of wet tailings.

We have 24 TSFs, including dry-stack, paste and in-pit disposals, of which 19 are active and five dormant.

To ensure a 'triple check' on the safety of all of these, and in addition to the local Engineer of Record, we use three types of audit: in-house at site level, in-house at corporate level, and an entirely independent audit. These are benchmarked against the international guidelines of the Australian National Committee on Large Dams (ANCOLD), MAC and the Canadian Dam Association (CDS).

However, to progress beyond best practice safety standards, we are also implementing an ambitious tailings transition plan, which will significantly reduce our exposure to wet tailings risk. The plan is driven by three principles:

- Since 2018, all new growth capital projects that use wet concentration must include dry tailings solutions.
- We are reducing the risk of existing wet operations by accelerating the use of non-wet or reduced moisture disposal methodologies, such as thickened paste or dry stack tailings where appropriate.
- We are optimising the use of radar and satellite monitoring of TSFs, and enabling transparent access to this data.

We are currently assessing all our mining operations for transition in line with these principles, and developing customised design solutions for non-wet tailings system management. We have already implemented tailings thickening steps in our assets in Mexico, Brazil and Canada.

Our Serra Azul mine in Brazil is the only one in our portfolio with a TSF that used an upstream 'wet' dam construction methodology. The TSF had been dormant since 2012 and possesses significantly lower moisture content than that reported for the Vale-owned Feijão TSF (which tragically failed in January 2019). In February 2019, following stress tests on the Serra Azul dam model safety factors, the company decided to evacuate the local community downstream of the dam as a precaution, enabling the company to carry out further testing and safely implement any mitigation measures.

Mining operations were simultaneously suspended but were recommenced on 18 March 2019. Following an update of the theoretical dam break analysis, and adopting the most conservative assumptions, the potential area of impact has been expanded, in order to keep a greater margin of safety. In response, ArcelorMittal relocated 23 families from two communities to temporary homes as a precautionary measure. Monthly emergency payments have been made to the relocated families as well as to people who lost access to their land – in total 149 families have been directly impacted. For safety reasons, access to the evacuated area continues to be restricted and controlled according to guidance from local authorities.

ArcelorMittal is currently reviewing its approach to safely deconstructing the Serra Azul TSF. AMS Azul is cooperating directly with the public prosecutor's office in Brazil. Continuous 24/7 monitoring of the tailings storage facility continues via radar, accelerometers, online water level, piezometers and imaging.

Section 2.3

Innovating smarter steels and solutions

"We are living in an era of unprecedented progress. Changes to the cars we drive, the buildings we live in, and the energy we generate are all reinventing our material environment and producing new demands for smarter steels. I believe our world-class R&D capabilities are in a position to deliver steels that are every bit as unprecedented as the world in which we live."

Greg Ludkovsky
Vice president, head of research and development

Global R&D Montataire, France S-in motion® automotive demonstrator.

Strength in innovation

Our steels are essential to the fabric of modern life: from building the world's latest infrastructure to supplying cans for the food and drink we consume, our products continuously reshape how we work, create and advance. By innovating smarter steels – meaning steels that are variously stronger, have a lower carbon footprint, and are fundamentally better optimised to their specific purpose – we help to materially improve people's lives.

Our world-class R&D provides the technical foundation for our success by stimulating innovative thinking and creative, high-tech solutions. This is a core strength of our business, and has never been more important. Unprecedented levels of global change continue to be driven by the twin engines of technological progress and growing ecological awareness, and to stay ahead, we need to move fast.

A unique material for a unique time

Steel is uniquely placed, and ArcelorMittal uniquely equipped, to respond to both of these drivers. Being easily recoverable and infinitely recyclable, steel is the ideal material for the circular economy of the future. Steel regularly outperforms competing materials such as aluminium or concrete in lifecycle analysis (LCA), which makes our expertise in LCA an important strategic asset (see LCA, p.36). In addition, we are pioneering a number of breakthrough technologies for low-emissions steelmaking, which will be able to mitigate diffuse emissions, and significantly reduce the embedded carbon footprint of steel (see Addressing the climate challenge, p.42).

Steel also offers tremendous opportunities in the field of disruptive new technologies – both regarding our own processes (see Spotlight on Digitalisation, p.37, and Additive Manufacturing, p.35), and in the sectors we supply, where we have achieved product leadership through our advanced technical expertise, better product differentiation and exceptional customer support infrastructure. We are committed to maintaining this position through working with our customers to invent the smarter steels they need, and thus co-design and co-engineer the groundbreaking products and solutions that will transform the industries of the future.

Read more about the D2 Tower on our website

D2 Tower, La Défense Paris, France

$301m
invested in future business through R&D in 2019

69
inventions newly protected in 2019

42
products and solutions launched

Section 2.3 **Innovating smarter steels and solutions**

Automotive: making cars safer, more sustainable and more competitive

Leading the way with battery electric vehicles

The automotive industry is currently being reinvented by the booming market in battery electric vehicles (BEVs). Technological developments, sustainability concerns and economics will all increasingly favour BEVs in the near-to-long term future and, as they do, our analysis indicates that steel will continue to be the material of choice. This is because ongoing improvements in batteries and powertrain efficiency reduce the significance of lightweighting, ensuring that steel solutions are the most competitive as they offer the best combination of strength and safety at the lowest cost. Our partnership with Canoo (see Spotlight on Canoo, p.30) showcases how we are using advanced steels and disruptive thinking to reimagine mobility.

Our comprehensive LCA studies on BEVs and battery packs show that steel can offer automotive customers a competitively low-carbon solution over the lifecycle of a vehicle. This will become increasingly relevant as the environmental burden of owning a car shifts from the 'tailpipe emissions' of its use phase to the embedded carbon of its raw materials, manufacturing and end-of-life phases. Here steel easily outperforms competitors such as aluminium, magnesium and carbon fibre thanks to its lower-carbon intensity and outstanding recyclability. The European Parliament has required carmakers to report the lifecycle emissions of new cars from 2025, and BEVs made from steel will enjoy a clear competitive advantage.

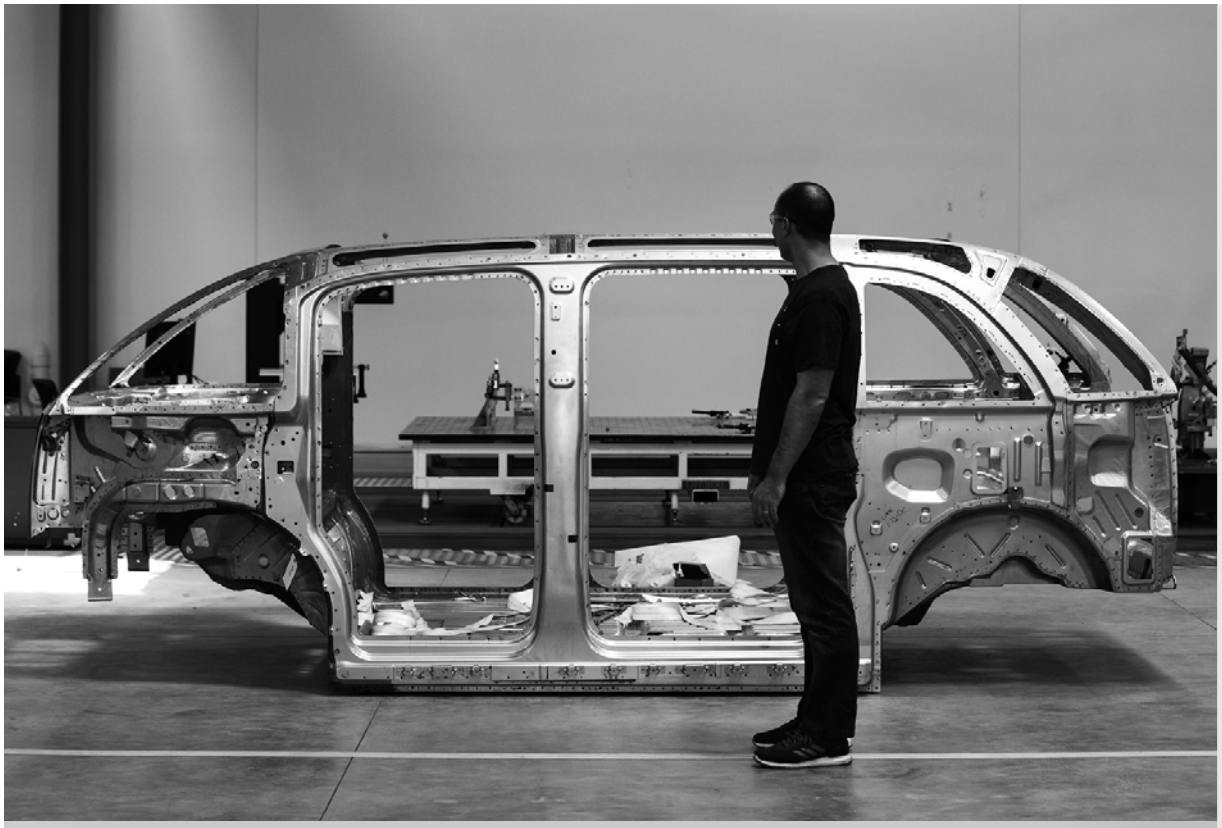
Ten years of S-in motion®

2020 marks the 10th anniversary of our highly successful S-in motion® catalogue of automotive steel solutions. Over this time, S-in motion® has delivered the benefits of Advanced High Strength Steel (AHSS) grades and manufacturing processes to the automotive industry, thereby helping our customers meet their needs and drive improvements in safety, fuel efficiency and sustainability. S-in motion® has given us a leading position in the automotive sector and enables us now to leverage our superior expertise and close customer relations to continue evolving in an increasingly complex market of car types and manufacturers. This includes a range of new S-in motion® solutions released in 2019 for internal combustion engine cars, hybrids and BEVs.

In 2019 we released a range of new S-in motion® solutions for internal combustion engine cars, hybrids, and BEVs.

Read more about S-in motion® on our website

Our solutions for e-mobility and lightweighting		
	Usibor® Ductibor®	**Press Hardenable Steels (PHS)/hot stamping steels offer strengths up to 2000 MPa** ● Usibor® 1500, Usibor® 2000, Ductibor® 450, Ductibor® 500, Ductibor® 1000 ● Can be combined thanks to laser welded blanks (LWB)
	Fortiform® Fortiform® S	**Third-generation Ultra High Strength Steels (UHSS) for cold stamping** ● Cold rolled and coated products 980 and 1180 MPa strength levels ● Upcoming 1470 MPa grades
	MartINsite®	**Cold rolled fully martensitic steels with tensile strengths currently from 900 to 1700 MPa** ● Dedicated to roll forming applications
	Innovative coatings	**Full range of innovating coating supporting the development of UHSS** ● Jetgal® as hydrogen-free process, Zagnelis® Zinc-Magnesium as improved corrosion protection, innovative coatings improving PHS in wet areas
	iCARe®	**Electrical steels for electrified power train optimisation** ● Our ranges Save, Torque and Speed are specifically designed for a typical electric automotive application



SPOTLIGHT

Canoo: challenging traditional automotive shapes and functionality

"We are proud to partner with a bold company like Canoo. Steel is, and will be, the preferred material for mobility as it is designed to maximise cost efficiency, sustainability, and safety."

Peter LeBlanc
Chief marketing officer of automotive for ArcelorMittal North America

ArcelorMittal R&D has been working with Canoo to create a disruptive new vehicle for a world in which transportation is becoming increasingly electric, shared and autonomous. A Canoo prototype was released in 2019, and the first vehicle launch is set for 2021.

Canoo's design challenges traditional automotive shapes by making innovative use of the electric vehicle architecture. A skateboard-like chassis structure houses the battery, powertrain, crash support and suspension components, and with no need for a traditional 'engine', this frees up the full interior space for occupants. The design utilises the latest generation of steels to meet ambitious weight and safety targets, with 90% of the vehicle being made from steel, of which 70% is Advanced High Strength Steel/Ultra High Strength Steel.

We have collaborated with the engineering teams at Canoo since the company's inception, providing co-engineering and steel solutions-related technical support throughout.

Canoo presents an innovative business model too. Instead of purchasing and owning vehicles, Canoo's customers will be offered subscription services that capitalise on the latest automated, connected, electrified, shared (ACES) technologies – thereby creating another route through which Canoo contributes to the circular economy.

With our leading expertise and support infrastructure, we are uniquely positioned to assist customers like Canoo to succeed in developing the smart mobility solutions of tomorrow.

Read more about Canoo on our website

Section 2.3 **Innovating smarter steels and solutions**

Construction: integrating building solutions with Steligence®

"Steligence® gives designers the freedom to think holistically about the building. When you put the right product in the right place, the impossible becomes possible."

Olivier Vassart
Chief executive officer, Steligence®

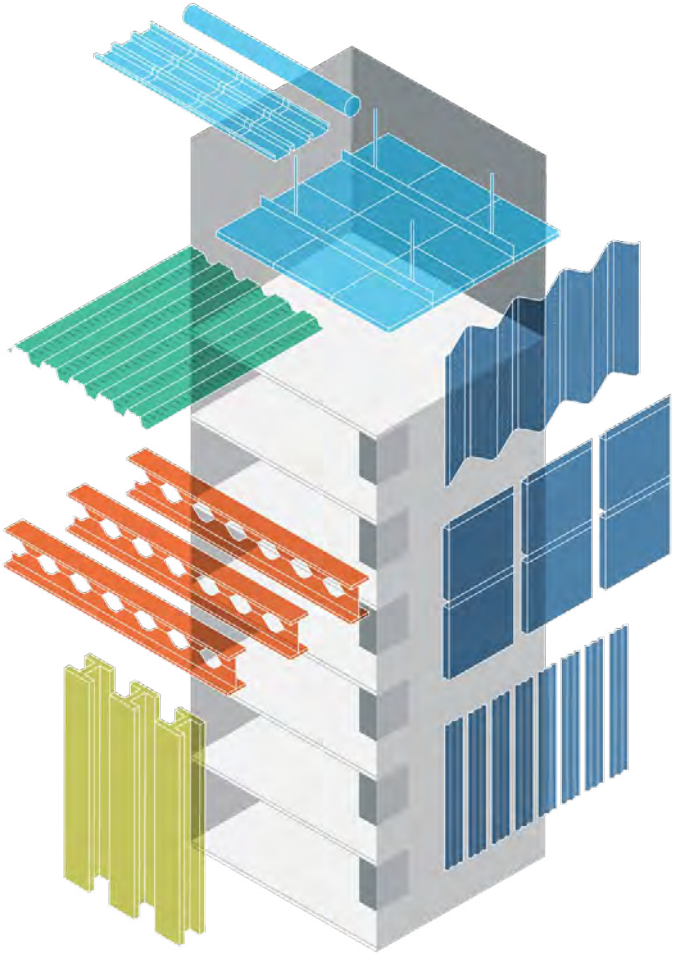
Read more about Steligence® on our website

2019 marked the first full year of Steligence®, our radical new concept for the use of steel in construction, which facilitates the next generation of high-performance buildings and sustainable construction techniques. It is already proving highly successful, having delivered 16 million m² of building and nearly 500,000 tonnes of steel so far.

Steligence® revolves around the idea of the building as a holistic entity. Traditional approaches to construction seek to optimise buildings in relation to one or another product or building function, but Steligence® integrates the needs of architects, engineers, investors, the construction sector and building users, and delivers advanced steel knowledge at an early stage. This enables us to optimise the combination of products used and create innovative and highly efficient solutions. As the only steel producer with a full portfolio of high-tech steel products and solutions for the construction market, as well as leading expertise in their use, ArcelorMittal is uniquely positioned to offer such levels of integrated service. This is a major strength for our company and is evidenced by the fact that every building project that has started with Steligence® has stayed with this concept through to its completion. Our customers trust us to help them find the right product for the right place.

16 million m²
of building delivered through Steligence®

Built into the holistic Steligence® approach is a broad range of thinner, lighter, high-performance steel solutions.



Section 2.3 Innovating smarter steels and solutions
Construction: integrating building solutions with Steligence®

Optimising throughout the building lifecycle

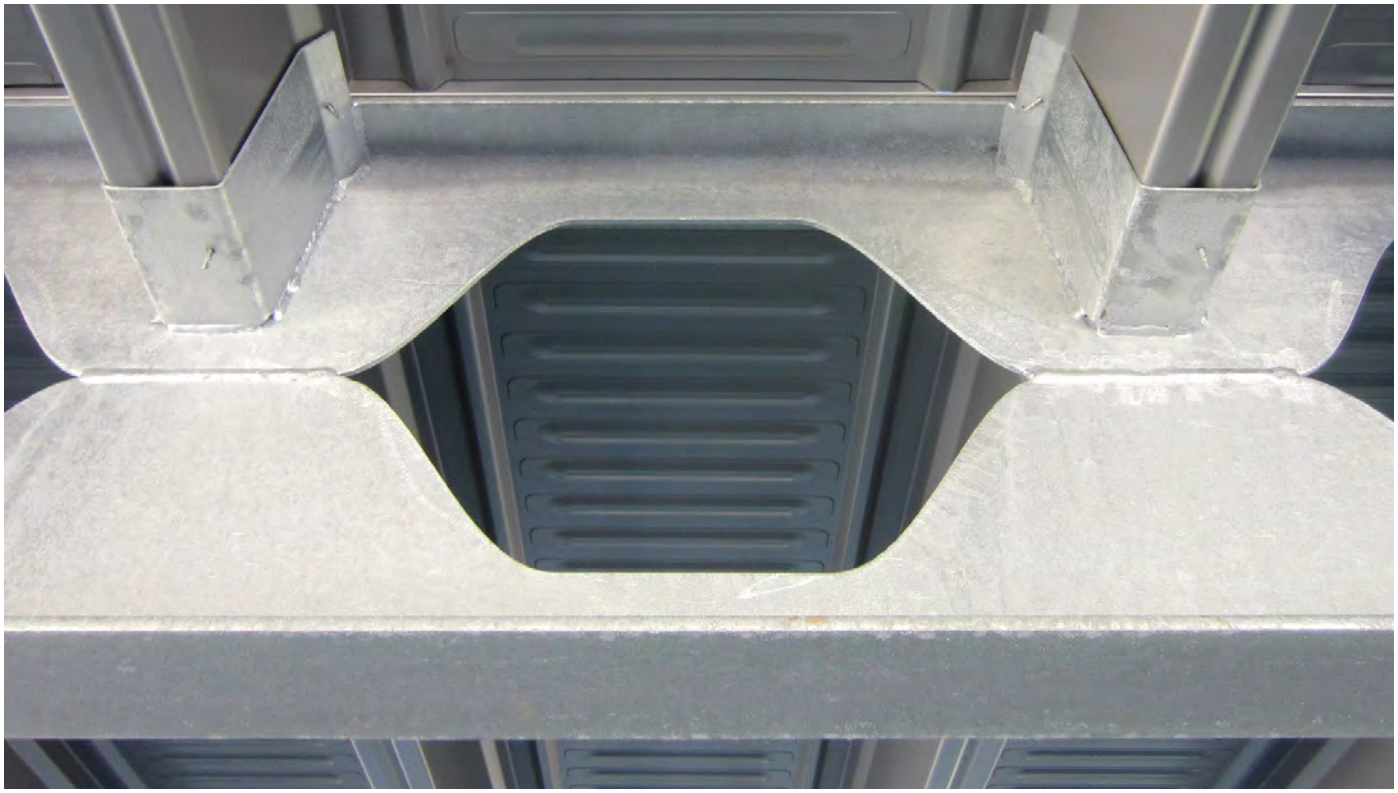
Steligence® enables building optimisation on multiple fronts, for example:

- **Optimised construction cost and speed:** by facilitating weight reductions and integrating modular parts, Steligence® saves on costly foundations and makes buildings faster to assemble.
- **Higher utilisation efficiency:** by reducing floor heights and thereby incorporating more storeys within a given building height, Steligence® achieves 15% gains in volume to surface ratios.
- **Transformational refurbishment and reuse potential:** by creating longer free spans between columns, and removing load-bearing walls, Steligence® maximises the flexibility of interior layouts and creates dynamic buildings that transform as user demands change. Then, at the end of the building's life, Steligence's® modular parts can be disassembled and reused, yielding unprecedented residual value.
- **Lower environmental impact:** Steligence® decreases the lifecycle carbon footprint of a building by 20% compared with typical construction techniques, enabling buildings to attain higher BREEAM and LEED ratings.

The sustainability benefits of Steligence® are a particular factor in its favour. With approximately 40% of the world's carbon emissions coming from buildings and construction, we anticipate an ever-increasing focus on environmental performance. Lifecycle analysis demonstrates steel's superiority over other materials such as concrete, and we see steel becoming more dominant throughout the construction sector, with Steligence® as the most advanced steel solution that actively delivers upon the needs of the circular economy.

Broadening and deepening the reach of Steligence®

Our plans for the future of Steligence® are twofold. Firstly, we are planning a global roll out, and having launched already in Europe and Brazil, we will be launching in Canada in 2020. And secondly, we are deepening our penetration in the markets where we are already present by bringing the benefits of Steligence® to the full range of building types and customers.



Enovos, a Steligence® product.

Section 2.3 **Innovating smarter steels and solutions**

Innovation for transforming industries

We create and maintain a diverse portfolio of specialist steel products to serve the world's evolving commercial, social and environmental needs. To ensure steel remains our customers' material of choice across multiple sectors, we aim to deliver breakthrough advances, and continuously optimise the properties of the thousands of steels we offer to their unique applications. We also pay particular attention to industries and sectors that are transforming, including energy and packaging, where new markets are being created that demand new solutions.

Building a new energy landscape

We are a significant supplier of steel to traditional energy generation, but we are also moving fast to lead in the new energy landscape. As the world moves to decarbonise its energy supplies, and electrify much of its transport and manufacturing activities, steel will play a critical role in building the renewable energy infrastructure of the future.

Our innovations include:

- advanced line pipe steel for wind turbines
- Magnelis®, a patented anti-corrosion steel coating used for multiple applications, including photovoltaic (PV) modules
- pioneering technologies for electrical steels

An important aspect of the future of renewable energy will be its transport and storage, for which we believe hydrogen offers a significant potential solution. However, given that hydrogen liquefies at -250°C, specialist cryogenic steels will be needed to build the necessary hydrogen infrastructure, creating large potential demand. We are therefore developing a cryogenic R&D programme to capitalise upon this opportunity.

Pressure on plastic packaging points to circular steel

There is growing societal pressure to reduce plastic waste, creating a strong market opportunity in the packaging sector. Being infinitely recyclable, as well as non-hazardous, cost-saving and with lightweight capabilities, steel is well-positioned to provide packaging solutions that meet sustainable development objectives.

Our detailed lifecycle analysis (LCA) of food cans and aerosols demonstrates that our best-in-class steels are competitive on carbon against glass and aluminium respectively (even aluminium with very high recycled content), while effectively eliminating plastic waste. We are continuing to innovate steels for packaging that are thinner and more ductile – enabling further carbon reductions, and the creation of ever more sophisticated shapes.

59% lower CO_2

ArcelorMittal best-in-class steel solution compared with aluminium for a 210ml aerosol can

Read more about our packaging solutions on our website

Section 2.3 Innovating smarter steels and solutions
Innovation for transforming industries

A bright future for Magnelis®

In 2019, we introduced a new grade of Magnelis® coated steels to our ground-breaking family of corrosion-resistance products. The new ZM620 grade has twice the estimated lifespan of its sister ZM310 grade, which has an estimated longevity of between 35 and 90 years (depending on the environment).

Magnelis® coatings use less zinc than conventional galvanised steels – protecting valuable resources – while also significantly outperforming them in corrosion resistance. Its unique properties make it an ideal material for solar plants, which are often subject to harsh environmental conditions. The ZM620 grade is primarily used for the support structures of photovoltaic (PV) panels, where corrosion-resistance requirements are greater, while Magnelis® ZM310 is the material of choice for the panels themselves.

We began shipping Magnelis® ZM620 in late 2019, and customers are using the first 1,000 tonnes for trial purposes. Orders for full-scale projects that are in the pipeline indicate a bright future for Magnelis® and for solar farms worldwide.

Atacama Desert, Chile. Bifacial modules arranged in hundred of rows in the desert at La Silla Observatory.

Read more about Magnelis® on our website

Section 2.3 **Innovating smarter steels and solutions**

Additive manufacturing

We see additive manufacturing as a disruptive new technology that offers significant opportunities to transform industries, contribute to sustainability and improve lives. Additive manufacturing has the potential both to halve the material intensity of products, because material is added only where it is needed, and to revolutionise design, as it becomes possible to create forms with specialised properties that would be unthinkable using traditional processes.

This is a field where demand for new products can grow very fast, so innovation will be key. Our R&D teams are exploring opportunities and partnering with specialised companies as we focus on innovation that will:

- reduce the cost of materials for additive manufacturing
- advance our own portfolio of differentiated powders and wires
- establish leadership in different types of 3D printing technology

3D printing our own parts

Additive manufacturing also offers the opportunity for improvement in our own processes – especially when linked holistically with our digitalised operations (see Spotlight on Digitalisation, p.37). For example, AI-enabled predictive maintenance apps use Big Data from Internet of Things (IoT) sensors in our equipment to indicate in advance when a part will need to be replaced. As our additive manufacturing technology matures, we will be able to use AI-assisted generative design to design a new, improved part, and print and ship it to arrive perfectly on time.

Various technologies and raw materials such as metal powders or steel wire are explored to produce 3D printed parts.

Section 2.3 **Innovating smarter steels and solutions**

Strategic expertise in lifecycle analysis and sustainability innovation

In a world of growing sustainability expectations, our customers need to know the full benefits and impacts of their products – all the way from raw materials, through use, to final disposal and recycling. Fundamental to knowing what is better is understanding how to measure it, which is why we have developed strategic expertise in lifecycle analysis (LCA). With 400 of our employees trained in lifecycle methodologies, and over 100 LCA studies completed, we are a leading global exponent of LCA.

Our LCA expertise gives us a key sustainability advantage. From automakers competing to meet ambitious policy targets on carbon, to building designers seeking to achieve higher BREEAM and LEED ratings, to packaging manufacturers looking for low-carbon alternatives to plastic, our LCA studies give our customers confidence that they can meet their environmental objectives. And as discussed above, due to steel's infinite recyclability and lower-carbon intensity, LCA analysis repeatedly demonstrates its advantage over other materials.

In 2020, we plan to extend LCA assessments to our low-emissions steelmaking processes (see Addressing the climate challenge, p.42). Low-emissions steel will enable us to significantly extend the lead of our best-in-class products on LCA and circular value.

27

LCA studies in 2019 related to steel products and the processes used to produce them, all guided by ISO standard 14040-44.

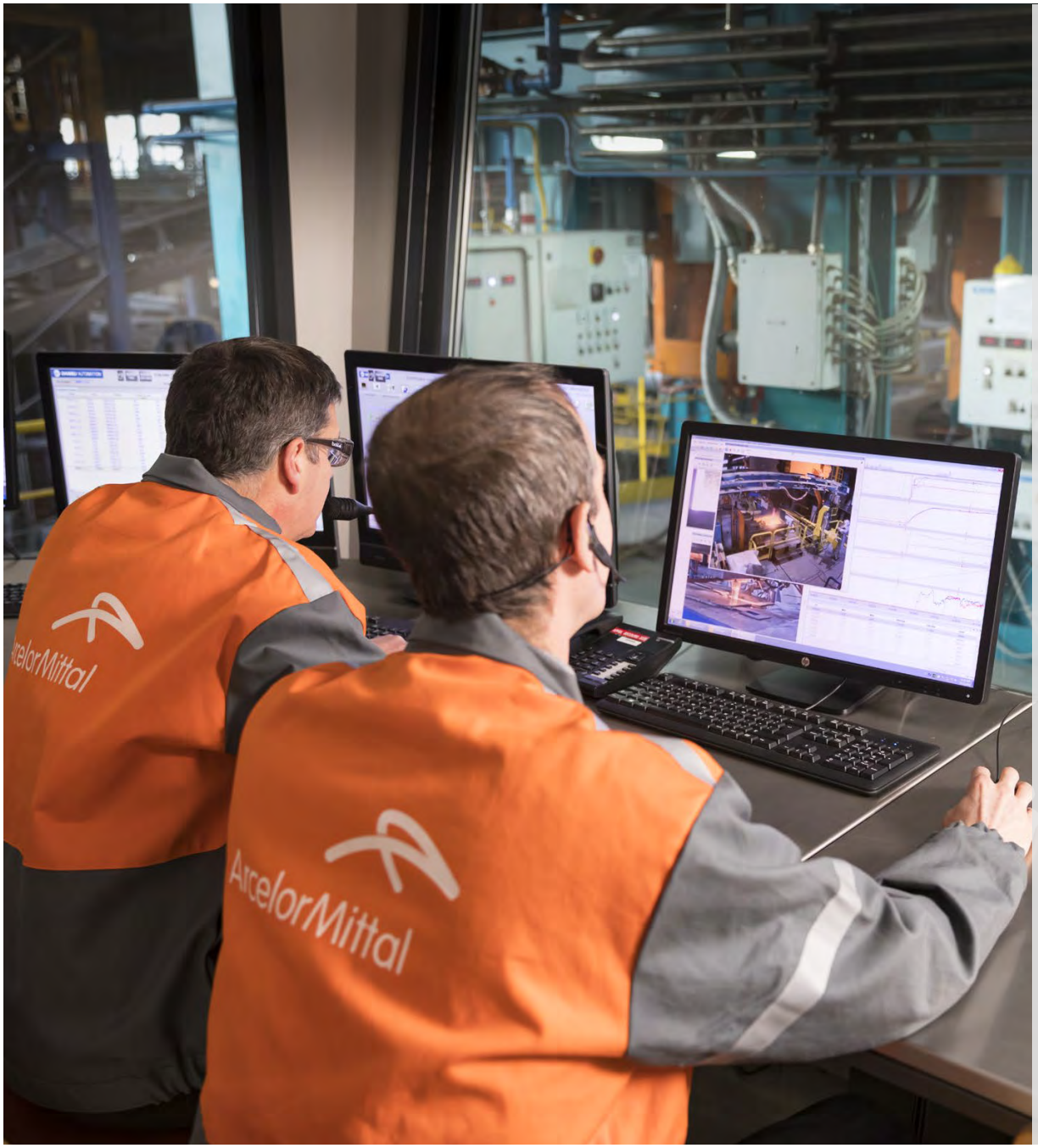
8

company-specific Environmental Product Declarations (EPDs) in 2019 related to construction and contributing to the competitiveness of Steligence®.

Managing innovation for sustainability

In addition to LCA, we are developing a unique Sustainable Innovation (SI) tool, which will enable us to perform assessments of new products and processes in innovation for their potential impact on sustainability issues (including on carbon, water consumption and other factors). In 2019 the tool was externally reviewed, and in 2020 we plan to finalise and road test dashboards that will collate information from the tool across our innovation portfolio. This will enable us to manage innovation with respect to sustainability at the portfolio level, and identify where we are leading the greatest change.

Steel's infinite recyclability and lower-carbon intensity enable it to outperform other material groups on LCA in many applications, such as packaging.



SPOTLIGHT
Digitalisation: the advantage of scale

"The future of any company will rely on how they can lead in the adoption of Artificial Intelligence. At ArcelorMittal we are committed to being the leader in full enterprise digitalisation."

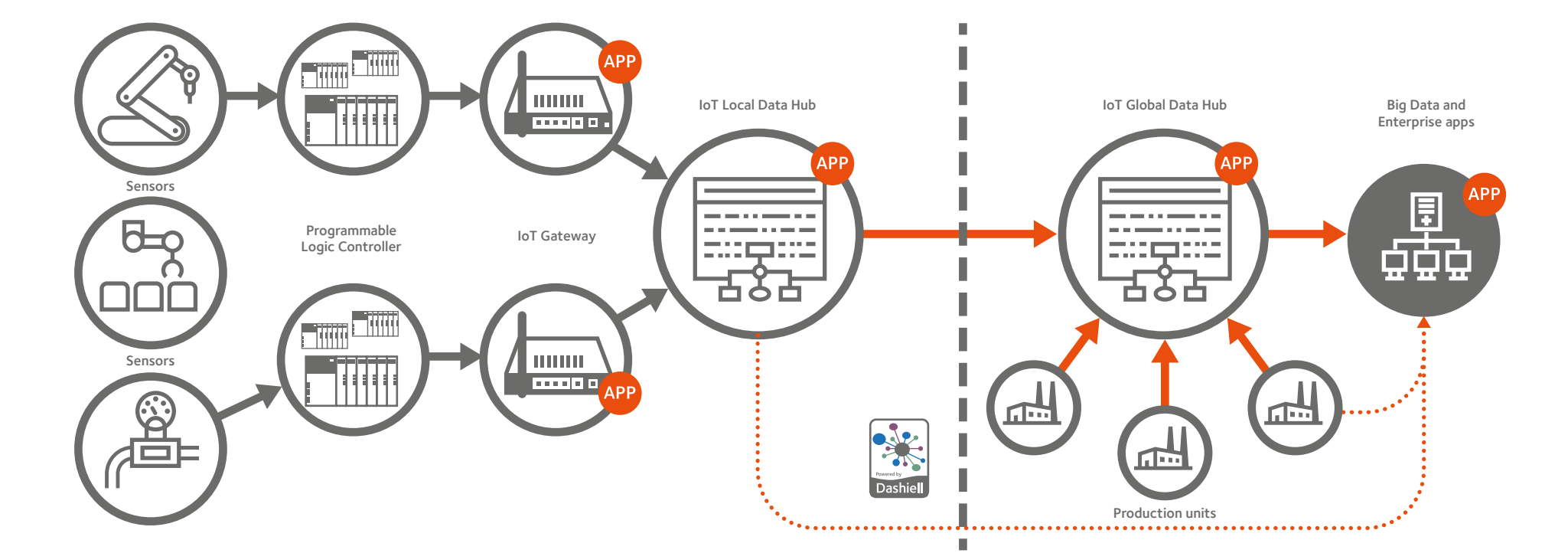
Carlos Alba
Head of digitalisation, R&D

Our strength in digitalisation is that our approach is truly global. We have invested early and significantly in automation and, more recently, in building a unified Big Data platform that aligns all our business segments and captures industrial Internet of Things (IoT) data from sensors and equipment in our sites around the world. This creates an enormous and extremely powerful resource of real Big Data, which we are now able to exploit and thus share knowledge rapidly among sites, implement cutting-edge Artificial Intelligence (AI) for the development of apps, and deploy these apps globally. Digitalisation with unified platforms makes the scale of ArcelorMittal, and therefore of our Big Data pool, a key competitive advantage.

Our digitalisation strategy is already delivering proven results in all units. For example, in manufacturing, we are pioneering:

- **Predictive quality:** mathematical optimisation algorithms assess line data to predict the mechanical properties of the product before it is produced, enabling adjustments to be made in real time, and resulting in a reduction of rejections due to mechanical properties of up to 50% in one year.
- **Predictive maintenance:** data analytics algorithms are being used to predict part failures up to four months in advance, allowing teams to review and replace parts pre-emptively, thus dramatically reducing both downtime of the equipment and preventive visits of maintenance crews.

SPOTLIGHT Digitalisation: the advantage of scale



- **Productivity gains:** machine learning algorithms are being used to assess welds and make judgements, thus eliminating line stoppages for human decision-taking, and adding four full days of production per year in the pilot case.

Digitalisation is equally transforming our business operations. We have changed the way we purchase items (for example, scrap, semi-finished products and logistics contracts); we have changed the way we approach our customers and price our products; and we have changed the way we schedule our units to produce products. For example:

- **Procurement:** mathematical optimisation algorithms using approximately 14 million variables and one million constraints are organising the monthly ordering of scrap in some regions of the Americas. By replacing individual procurement with a multi-plant approach including internal transfers, we can ensure the right quantities and qualities of scrap are reaching our different sites to achieve our production plans. This mathematically optimised, multi-plant approach allows us to significantly reduce the structural cost of our manufacturing.
- **Sales:** our new online commercial channels allow us to easily reach our customers with customized offers, automatically linking these sales with our order entry platforms, and thus adding more value for our customers while reducing lead times.
- **Supply chain:** our unique position, that combines a truly global footprint with detailed knowledge interfaces (covering process, products and AI), allows us to create in-house supply chain systems that produce performance superiority when outputs are compared with solutions available from external vendors.

All these components, in both Digital Manufacturing and Digital Business, are part of a digital puzzle in which everything must be connected, leading to a fully digitalised enterprise.

The key results are radical efficiency improvements and value creation for ArcelorMittal, our customers and our world. We are reducing waste, enhancing yields, and optimising processes to simultaneously provide better solutions and minimise environmental impact.

Section 2.4

Driving environmental and social sustainability

"As the world's leading steel company, we recognise the critical importance of sustainability to our continuing licence to operate. We are dedicated to making sustainable development a priority for our business, firstly because it is the right thing to do, and secondly because our evolving business needs demand it. Our ambition is to be the steel supplier of choice not only for the quality of our products, but also for the deep trust our customers and stakeholders have in us."

Brian Aranha
Executive vice president, head of strategy, CTO, R&D, CCM, global automotive, communications and corporate responsibility

Steel coils ready for despatch to customer.

Section 2.4 **Driving environmental and social sustainability**

The needs of society are evolving, and we as a steel company are moving to stay ahead. Customers, governments and the public are looking at businesses in a new light, and expecting them to deliver not only on quality and profitability, but also on making a broader sustainable contribution. That is why, to be the steel company of the future, we are committed to inventing smarter steels for a better world.

Steel has a genuine competitive advantage when it comes to sustainability credentials. It is infinitely recyclable, it has a lower embedded carbon footprint than many of its competitor materials, and the natural resources of iron ore required for its production are in plentiful global supply. Add to this steel's unique physical qualities of being variously strong, thin, formable and conductive, and it becomes the material of choice for building much of the fabric and essential infrastructure of our sustainable future.

At ArcelorMittal, we are constantly striving to improve on these already impressive credentials, and see rising global expectations as a significant opportunity. We are developing innovative steelmaking processes that use less energy, emit less carbon, reduce dust emissions, and give more reassurance to our customers, stakeholders and communities that we are fully engaged with the issues that matter to them.

In 2015, we introduced our 10 sustainable development (SD) outcomes – which are aligned with the 17 UN Sustainable Development Goals – to drive our transformation into the steel company of the future. In 2018, in order to achieve more active, specific and robust governance on progress towards our SD outcomes, the Board of Directors formed the Appointments, Remuneration, Corporate Governance & Sustainability Committee (ARCGS) of the Board. The ARCGS grouped the outcomes into five SD management themes and each quarter meets to review comprehensive SD reports and plans from all of our operations on the five themes, including theme-by-theme dashboards and detailed sets of KPIs. 2019 was our first full year of implementation of this ambitious new SD governance system.

Much work remains to be done to achieve all our sustainability targets and transform fully for tomorrow. However with the focused oversight of the ARCGS, we are developing strategies, implementing measures and investing significantly in all themes. The steps we are taking are set out in detail in this review as follows:

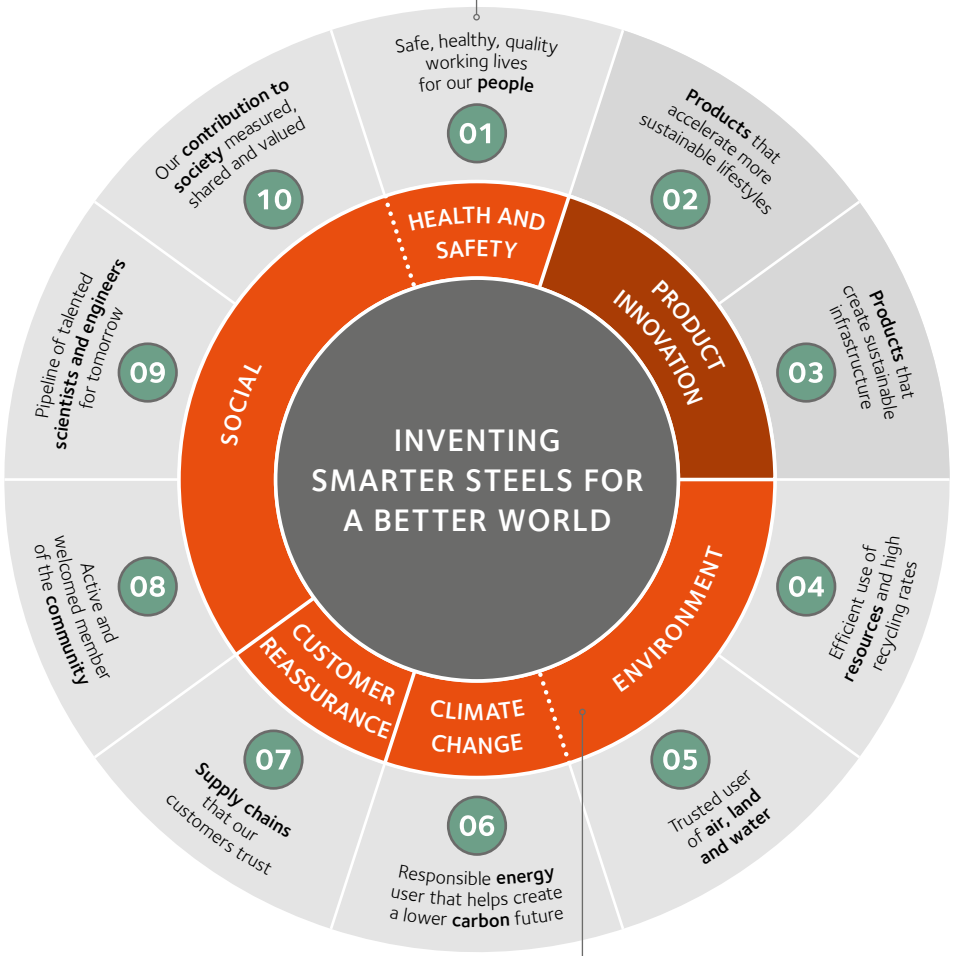
- **Health and safety:** see Improving health and safety, p.14
  We are proactively rolling out proven safety training, tools and best practices from across the group to our most challenging areas.
- **Climate change:** see Addressing the climate challenge, p.42
  We are piloting breakthrough low-emissions steelmaking technologies at an industrial scale, and pioneering transparency with our climate action reporting.
- **Environment:** see Managing environmental impacts, p.49
  We are working towards comprehensive environmental SD plans for all our major sites, while continuing to develop and invest in innovative processes that improve the circularity of our operations and reduce local emissions.
- **Customer reassurance:** see Reassuring our customers on sustainability performance from mine to steel making, p.54
  We are leading the steel industry's first global certification standard, ResponsibleSteel™, to provide customers with reassurance on sustainability throughout the steel value chain.
- **Social:** see Engaging with communities and building a workplace for tomorrow, p.57
  We are embracing stakeholder engagement through two-way dialogue, and have implemented detailed reviewing and evaluation of community sentiment at all of our sites. We have also launched our new Employee Value Proposition to attract and retain the best talent from around the world.

Our SD strategy is designed to maintain our position as the world's leading steel and mining company for the long term, enabling us to deliver sustainable value to shareholders and stakeholders in a rapidly changing world. This approach is encapsulated in our commitment to the objectives of the Paris Agreement, and our ambition to significantly reduce emissions across the group, including a 30% reduction in carbon emissions in Europe by 2030, and carbon neutrality in Europe by 2050.

However, to be able to reach these goals, we need a supportive policy environment and a collaborative global approach. This is why we have been taking full advantage of our leadership position to shape the global sustainability debate, and to work with governments and industries around the world on unlocking the full potential of steel.

How we manage sustainable development

This wheel shows the relationship between the five governance themes through which our Board of Directors oversee SD and the planning process across the business in order to achieve our 10 SD outcomes.



17 UN Sustainable Development Goals (SDGs)

The UN SDGs were launched in 2015 to address the major challenges the world faces, and fast-track progress towards a better and more sustainable future for everyone. They inform and underpin our 10 SD outcomes and overall sustainable development strategy.

sustainabledevelopment.un.org/sdgs

10 SD outcomes

Our 10 SD outcomes describe the business we need to become if we are to bring optimal value to all our stakeholders, and drive our transformation into the steel company of the future. Their development was informed by the SDGs, in particular those most relevant to our business, and they support our strategic SD governance through the five themes. Read more on our 10 SD outcomes.

5 themes

The Appointments, Remuneration, Corporate Governance & Sustainability Committee (ARCGS) of the Board oversees the company's management of sustainable development issues against the five themes. The ARCGS reviews progress on a quarterly basis, with reporting on theme-by-theme dashboards and detailed sets of KPIs ensuring active, specific and robust governance.

The themes are addressed fully in this report:

- **Health and safety** – Improving health and safety, p.14
- **Climate change** – Addressing the climate challenge, p.42
- **Environment** – Managing environmental impacts, p.49
- **Customer reassurance** – Reassuring our customers on sustainability performance from mine to steel making, p.54
- **Social** – Engaging with communities and building a workplace for tomorrow, p.57

Product innovation also drives the delivery of two of our SD outcomes. As innovation is one of the core strategic priorities of our business, it has separate oversight and is discussed in Innovating smarter steels and solutions, p.27.

Section 2.4 **Driving environmental and social sustainability**

Addressing the climate challenge

Steel is integral to the fabric of modern society, and a key enabler of many of the new technologies and clean infrastructure solutions that will deliver the circular economy of the future. Already, when used in a range of today's sustainable applications, such as offshore wind turbines, lightweight electric vehicles and low-energy buildings, steel achieves emissions reductions that are estimated to outweigh emissions associated with its production by a ratio of six to one. Clearly steel is and will be an essential material for building the low-carbon innovations of tomorrow and addressing the global climate challenge.

"At ArcelorMittal we are committed to delivering on the ambitions of the Paris Agreement. We have identified the key technology pathways to low-emissions steelmaking, and drawing on our portfolio of breakthrough solutions, we are building multiple industrial-scale pilot projects. However, for low-emissions steelmaking to become fully commercially viable and, ultimately, to outcompete higher-emissions steelmaking, a supportive policy environment will be essential."

David Clarke
Vice president, head of strategy and CCM (commercial coordination and marketing)

In the very long term, global demand for steel will likely plateau, and it will be possible to make almost all of the steel products we need in a fully circular way using clean electricity, and drawing on steel's unparalleled recyclability as scrap. However, as much of the future infrastructure we need remains to be built, and as large areas of the developing world continue to experience rapid economic growth and increasing steel consumption, demand for new steel will grow for many decades to come, outpacing the supply of scrap steel. Global steel demand is forecast to rise to ca. 2.6 billion tonnes by 2050 (up from 1.9 billion tonnes in 2019), and to meet much of this, we will have to rely on primary steelmaking using raw material sources.

Steelmaking is, however, naturally energy intensive, and already accounts for around 7-9% of global carbon emissions. The steel industry therefore faces a challenge: it must continue responding to the world's steel needs while significantly reducing its own emissions to deliver on the ambitions of the Paris Agreement. At ArcelorMittal we are committed to creating and implementing breakthrough new technologies for low-emissions primary steelmaking.

Ranked

No.1

for low-carbon innovations

ArcelorMittal ranked first in the CDP report 'Melting Point' (2019) in the categories of low-carbon innovations, transition opportunities, data transparency, renewable energy use and board and executive climate management. ArcelorMittal ranked second overall among 20 of the largest publicly-listed steel companies worldwide (up from fifth in 2016).

Section 2.4 Driving environmental and social sustainability

Addressing the climate challenge

We have established ambitious targets to reduce our emissions in Europe by 30% by 2030, and to be carbon-neutral in Europe by 2050. We are further committed to significantly reducing our emissions worldwide and will announce a new global target in our second Climate Action Report later in 2020.

Our strategy to achieve this is based around four key elements:

1. Advancing our low-emissions steelmaking innovation programme
2. Increasing our use of scrap based on local availability
3. Developing a supportive policy environment and the right market conditions through analysis and engagement
4. Enhancing energy efficiency and renewable energy use across our global portfolio

A-

ArcelorMittal scored an A- in the 2019 CDP Climate Change assessment, an improvement from C in 2017, which means the company has now reached leadership level.

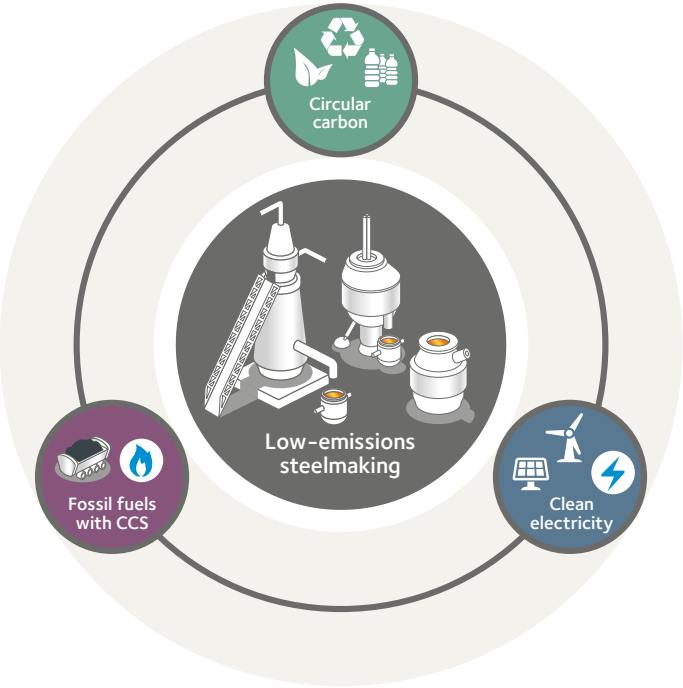
$250m

committed to innovation for low-emissions steelmaking

We have identified three key energy routes to low-emissions steelmaking:

- **Circular carbon:** carbon neutrality can be achieved by relying on the earth's natural carbon cycle and making use of biowaste materials, such as sustainable forestry and agriculture residues, to produce bio-energy for steelmaking. Other biomaterials such as waste plastics can also be used, thus helping address the world's waste challenge. Steelmaking's carbon by-products can further be converted back into biomaterials at the end of the steelmaking process in a fully circular fashion.
- **Carbon capture and storage (CCS):** fossil fuels can continue to be used for steelmaking with carbon neutrality achieved by capturing CO_2 emissions, transporting them and storing them safely underground. Combining CCS techniques with circular carbon energy sources can even move the steel industry beyond carbon neutrality, and turn steel production into a means to remove CO_2 from the atmosphere.
- **Clean electricity**: electricity from renewable sources can be used to produce hydrogen in a carbon neutral fashion, which can in turn be used for steelmaking. Alternatively, clean electricity can in principle be used to reduce iron ore directly via electrolysis.

We are maintaining a flexible technology innovation roadmap that involves projects leveraging all of these identified energy sources at industrial scales. We have committed over €250 million to innovation to date, and with continued support from public funding, we believe many of these technologies will be mature and partially implemented across our facilities in Europe by 2030.



However, while we are pushing to overcome the technical barriers to the transition to low-emissions steelmaking, the reality is that all of these energy sources and technologies lead to structurally higher operating costs. Consequently, a supportive policy environment and the right market conditions, including appropriate financial support and incentives, will be essential to ensure that steelmakers adopting low-emissions technologies can fairly compete with the existing steelmaking asset base. With such support, we are confident that the transition to a low-emissions steel industry will be viable, and that steel will be able to play its crucial role in addressing the global climate challenge.

Advancing our low-emissions steelmaking innovation programme

We maintain a portfolio of breakthrough new technologies for low-emissions steelmaking. This ensures we are able to respond flexibly to the evolving policy, technology and energy landscape, and can move to capitalise upon whichever pathways and energy sources become viable in different contexts.

We have a range of low-emissions steelmaking initiatives across our ArcelorMittal Europe sites, and we detail five of these on this page which in 2019 have made considerable progress in their implementation, including advanced construction work on many industrial-scale pilot projects. We believe some of these new technologies could reach commercial maturity before 2025, and that by 2030, many will be mature and partially deployed across our facilities in Europe. They will play a critical role in achieving our target of a 30% reduction in CO_2 emissions in Europe by 2030.

Initiative	Our progress
Torero	At ArcelorMittal Ghent in Belgium, we are building a large-scale demonstration plant to convert waste wood into bio-coal, replacing the coal currently injected as a reductant in ironmaking. The plant is expected to be operational by the end of 2020.
Carbalyst®	Also at ArcelorMittal Ghent, we are building an industrial-scale demonstration plant to capture carbon off-gases from the blast furnace and convert these into 80 million litres of bio-ethanol a year. This can then be used as feedstock for the chemicals industry, and converted into biomaterials such as plastics (which can, at end-of-life, be recycled again into bio-energy and used for circular steelmaking). This project is expected to be completed in 2021.
IGAR	At ArcelorMittal Dunkirk in France, we are building an industrial-scale pilot to capture waste CO_2 from the steelmaking process and internally convert it into synthetic gas. The synthetic gas will replace the use of fossil fuels in ironmaking.
3D	Also at ArcelorMittal Dunkirk, we are developing a carbon capture and storage pilot project to bring down the costs of capturing, purifying and liquifying CO_2 from waste gases. The technology will allow us to capture 0.5 metric tonnes of CO_2 an hour from steelmaking off-gases by 2021. ArcelorMittal is also involved in the Northern Lights and Porthos carbon transport and storage projects.
H2 Hamburg	At ArcelorMittal Hamburg in Germany, we are developing an industrial-scale project to use hydrogen instead of natural gas in the direct reduction of iron ore (DRI). The pilot plant will initially produce 100,000 tonnes of pig iron a year. In the short to medium term, we could use 'blue hydrogen', sourced by extracting hydrogen from natural gas, and capturing and storing the CO_2 generated in the process. In the long term, we plan to use 'green hydrogen', sourced by extracting hydrogen from water via electrolysis using clean electricity.

"We are committed to the transition to low-emissions steelmaking, and our roadmap and emissions reduction targets are a big step in the right direction. We've spent the last few years testing a range of technologies and now is the time to scale up and put them into action, with the support of the EU and member states, to ensure we are able to transition fully, and become carbon neutral in Europe by 2050."

Geert Van Poelvoorde, CEO ArcelorMittal Europe – Flat Products

Section 2.4 Driving environmental and social sustainability
Addressing the climate challenge

Increasing our use of scrap based on local availability

As noted earlier, the availability of end-of-life scrap lags demand by several decades and so, despite the fact that the vast majority of scrap is utilised, the steel scrap available today is only sufficient for around a third of global steel production. Steel made from iron ore (primary steel) needs to be produced to meet demand today, but each tonne of new steel should also be considered an investment in tomorrow's stocks of scrap. This means that when considered over its full lifecycle, the global warming potential associated with a tonne of primary steel is not so different from that of a tonne of secondary steel made from scrap since the two are connected – you cannot have recycled steel without primary steel.

Recycling steel is perhaps the most established example of the circular economy. It is well understood that using scrap in steelmaking reduces the emission of CO_2 in steel production. Given the limits on availability, however, today's challenge is to use all forms of scrap in the most efficient way. For example, using scrap locally to avoid emissions from transportation. As scrap availability increases in the regions where we operate, we will increase our use of local scrap as part of our overall strategy both to reduce emissions and to enhance the use of scrap in the circular economy.

End-of-life scrap is well known for its use in the electric arc furnace (EAF), particularly in the production of steels destined for the construction sector, which can accommodate the use of lower-quality scrap.

Scrap is also used in limited amounts in the primary route, in the basic oxygen furnace (BOF), along with hot metal from the blast furnace. Here, scrap is melted using excess heat from the hot metal, which would otherwise be wasted, and so is part of the energy efficiency toolbox. Since the scrap is mixed with the hot metal in the BOF, any tramp elements in the scrap are diluted, enabling low-quality scrap to be used in the production of high-specification products such as automotive steels, enabling more sectors to benefit from recycled content.

There are technological limits to the use of scrap: both in the proportion of scrap that can be used in the BOF, and in the quality of scrap that can be used in the EAF. To enable us to overcome these challenges, we are investing in innovative technologies to be able to melt more and lower quality scrap in our primary steel production facilities. We are also using digitalisation and mathematical optimisation algorithms to optimise our procurement of scrap, making sure the right quantities and qualities of scrap are reaching our different sites to achieve the most efficient and cost-effective use of scrap.

Enhancing the use of scrap in these ways will pave the way for a more efficient, circular economy in which all qualities of scrap are used efficiently and effectively. Even if it does not yield a shift in global CO_2 emissions from steelmaking on its own, it will be an important step towards a fully circular, low-emissions economy.

Using secondary sources, or scrap, in steelmaking significantly reduces CO_2 emissions.

Developing a supportive policy environment and the right market conditions through analysis and engagement

Innovation is key to achieving the transition to a low-emissions steel industry, but equally essential is the presence of a supportive policy environment and the right market conditions. For this reason we are taking a leadership position by working closely with a range of governments, experts and industry bodies to help develop the policies, infrastructure strategies and other forms of support low-emissions steelmaking needs.

In 2019, we published our first Climate Action Report – a steel industry first – in which we outlined the future challenges and opportunities for our industry, as well as the range of low-emissions technology pathways available, and our views on the policy support required. The report was welcomed internationally and represents an important component of our strategy to share knowledge, improve awareness and lead the global debate on steel.

$711m
investment allocated to 25 projects with energy and/or carbon benefits

We have identified five key requirements for the transition to a low-emissions steel industry, and for delivering on the ambitions of the Paris Agreement.

1. **Global level playing field:** a global framework to create a level playing field is needed to avoid the risk of carbon leakage. This can be achieved through carbon border adjustments, which ensure that steelmakers bearing the structurally higher operating capital costs of low-emissions technologies can compete with imports from higher-emissions steelmakers. This is particularly relevant in Europe, where EU steel producers are increasingly exposed to costs of carbon through the European Trading Scheme (ETS), while imports are exempt yet continue to be responsible for a significant proportion of the carbon emissions of steel used in Europe.
2. **Access to abundant and affordable clean energy:** policies giving the steel industry improved access to renewable electricity will be key, as this is currently neither sufficiently available nor economically viable to enable the roll out of low-emissions steelmaking technologies that use this energy source. For the acceleration of technologies using circular carbon energy sources, the steel industry requires priority access to biomass and waste.
3. **Facilitating necessary energy infrastructure:** in addition to abundant renewable electricity, policies to support investments in hydrogen infrastructure will be needed to advance large-scale hydrogen-based processes. Similarly, for the use of fossil fuels with CCS, policies are required to enable the accelerated development of carbon transport and storage infrastructure and services.
4. **Access to sustainable finance for low-emissions steelmaking:** the scale of the challenge requires an acceleration of technology development and roll out. Breakthrough steelmaking technologies need to be identified as a key priority area for public funding. Some of our current R&D projects are funded by EU Horizon 2020, and further public funding through, for example, the EU ETS Innovation Fund will be required to continue developing and rolling out low-emissions steelmaking. Finance legislation should enable in a positive way the contributions of such investments to the low-carbon circular economy.
5. **Accelerate transition to a circular economy:** climate and materials policy should be integrated, taking a lifecycle perspective to ensure that materials are used in as circular a way as possible. There should be a focus on driving the recycling and reuse of all waste streams, and incentivising the use of waste streams as inputs in manufacturing processes. Products should be rewarded for their lifecycle reusability and recyclability.

Enhancing energy efficiency and renewable energy use across our global portfolio

In addition to developing breakthrough low-emissions technologies, we are continuously working to improve the efficiency our current operations. In 2019, our Investment Allocation Committee (IAC) allocated a total of $711 million to 25 projects with energy and/or carbon benefits to be invested in the coming years.

In many sites we have seen the results of our efforts. For example, our Europe Flat Products segment is pursuing the continued roll out of energy efficiency measures such as LED lighting, energy recovery technology, increased use of scrap and renewable electricity and, in 2019, avoided the emission of 415,000tCO_2 from such measures.

Section 2.4 Driving environmental and social sustainability
Addressing the climate challenge

In the Americas, we are redoubling our efforts to both update our plants with more efficient technologies and reuse our waste gases either to generate electricity or to substitute natural gas. In 2019, we completed a range of projects including measures at Long Products Canada, Lazaro Cardenas, Mexico and Monlevade, Brazil that will save an estimated 94,000tCO_2 annually.

Our full enterprise digitalisation strategy is also driving new efficiency gains, and enabling us to achieve lower energy consumption, higher yields and less waste, all serving to reduce the embedded carbon content of our steel (see Spotlight on Digitalisation, p.37).

In addition we are expanding our use of renewable energy, both through onsite generation and long-term contractual arrangements, thus reducing our indirect emissions from electricity consumption. In 2019, such new projects are expected to deliver over 300GWh of renewable electricity. At our plant in Ghent, we built and commissioned Belgium's largest solar roof, which is expected to supply the site with over 10GWh/year. We also concluded long-term power purchase agreements in Argentina and Spain and an asset-based supply contract in Mexico.

When considering together the electricity we generate from renewable sources and from internally recovered energy, overall 44% of our electricity was generated from these sources in 2019.

ArcelorMittal Ghent builds Belgium's largest solar roof

We are pioneering flagship sustainability projects such as our solar roof at ArcelorMittal Ghent, completed in 2019. The roof consists of over 27,000 solar panels providing a peak capacity of 10.164MW, making it the largest solar roof in Belgium as well as the country's fourth largest solar park. The roof is expected to produce 10GWh annually, equivalent to 2,900 households, and will join the site's 10 current wind turbines plus two additional planned wind turbines in providing 50MW of renewable electricity to the Ghent site. The solar scheme also features a unique opportunity for more than 5,000 employees to co-invest and benefit from the revenues.

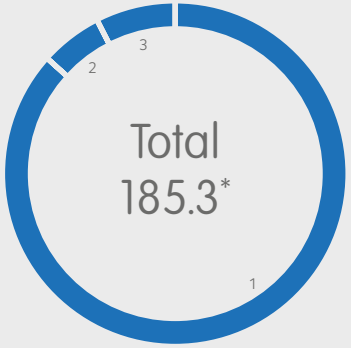
Section 2.4 Driving environmental and social sustainability
Addressing the climate challenge

Our innovative products already help our customers reduce their carbon footprint. See 2.3 Innovating smarter steels and solutions, p.27.

CO_2e Emissions Intensity (Steel)

2.12tCO_2/ts

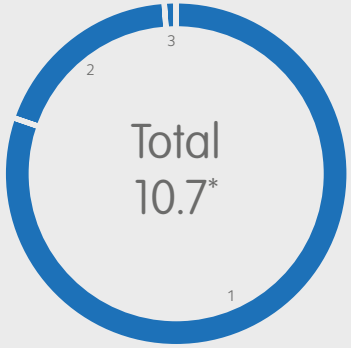
2019	**2.12**
2018	2.12
2017	2.11



Absolute CO_2e footprint – steel (million tonnes)

1 Scope 1 **161.1**
2 Scope 2 **10.7**
3 Scope 3 **13.5**

*The scope figures are rounded.



Absolute CO_2e footprint – mining (million tonnes)

1 Scope 1 **8.6**
2 Scope 2 **2.0**
3 Scope 3 **0.1**

*The scope figures are rounded.

Carbon performance

In 2019, our absolute CO_2e footprint for our steel and mining operations saw a 4% decrease against 2018, and for our steel operations, a 4.5% decrease. This reflects the success of a number of carbon and energy efficiency projects implemented in 2019, as well as the 3% decrease in the group's steel output.

Whilst reduced production usually results in efficiency losses, and so an increase in site-level CO_2 intensity, overall our energy efficiency initiatives (see above) meant we succeeded in maintaining an average carbon intensity of 2.12 tonnes of CO_2 per tonne of steel over the year in our steel business. This carbon intensity is based on data for nearly 100 steelmaking sites across the group.

We set ourselves a target of reducing our carbon intensity by 8% between 2007 and 2020 (for our steel business, scopes 1, 2 and 3 as defined in our Basis of Reporting, and in relation only to those sites we operate today that we operated in 2007). Progress against this target by the end of 2019 was 5.3%.

In contrast, our own internal carbon efficiency benchmarking reveals the progress we know we have made through efficiency improvements: 48% of our sites have now surpassed our internal benchmark. This improvement is masked in the CO_2 intensity metric above by the impact of external factors such as the quality of iron ore and scrap, and this shows the importance of using the appropriate metric to measure progress. This is explained further on p.34 of our Climate Action Report 1.

By comparison, the global average figure provided by the World Steel Association is 1.83tCO_2/ts (worldsteel 2018). The key reason for our higher carbon intensity is that the share of our production from the more carbon-intensive primary steelmaking route stands at 79% – compared with 71% in the global steel market as a whole (worldsteel 2018). Making primary steel via the BF-BoF route emits more CO_2 than secondary steelmaking in the EAF, and yet as noted above (see increasing our use of scrap) it is a necessary investment to generate the recyclable scrap stocks of the future that we need to enable fully circular steelmaking. Encouragingly, in 2019, the average carbon intensity of our primary (BF-BoF) steelmaking operations fell by 0.5% year on year.

For the future, we are taking a structured approach to improvements across our portfolio. We have an ambitious target of a 30% reduction in CO_2 emissions in Europe by 2030. We will achieve this primarily through a combination of the implementation of the breakthrough low-emissions technologies discussed above in our primary steelmaking sites, and the increased use of scrap (though not beyond the point of local scrap availability in Europe). To ensure progress against this target, we have developed a governance system at both segment and corporate level, coordinated by the Group CO_2 Technology Committee. In addition, we will announce a new global target for CO_2 emissions reductions throughout our operations in our second Climate Action Report, to be published later this year.

We are also addressing the global climate challenge through our products, which in sectors such as construction, transport and energy are enabling the innovative solutions that will support a high-quality, low-carbon future for us all (see Innovating smarter steels and solutions, p.27).

Section 2.4 **Driving environmental and social sustainability**

Managing environmental impacts

"As our steel's role in the sustainable global economy grows, we must also protect the needs of our local environments and communities. Our route to secure future value creation is through understanding our environmental performance as an integral part of our social and financial sustainability."

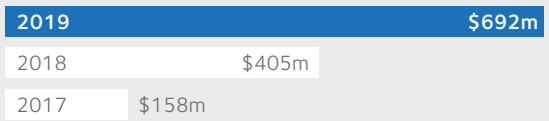
Frank Schulz
Vice president, head of governmental affairs, environment, and real estate

In addition to our focus on global carbon, a fundamental theme in our sustainability strategy is the management and safeguarding of our local environments and communities. At each of our sites around the world, and in all our activities, we aspire to be a trusted user of air, land and water. This means being fully compliant with regulatory standards, but also listening to stakeholders, and being proactive in maintaining their trust (see Engaging with communities, p.57).

We understand the critical role environmental management has to play in preserving our licence to operate, as well as in ensuring profitable market share and achieving long-term value. This is why we are pursuing a major environmental investment programme, including, in 2019, a total of $692 million allocated by the Investments Allocations Committee (IAC) to 38 projects with environmental benefits. At the same time, we are significantly strengthening our environmental oversight at the Board level, as well as accelerating our R&D commitment to technologies that will enhance our environmental performance in the years to come.

$692m

allocated by the IAC to 38 projects with environmental benefits in 2019



Strengthening our environmental strategy through governance, innovation and new standards

We monitor performance on air, water, energy and residues at all of our production sites, and report each quarter against environmental KPIs to the ARCGS. This governance system – fully implemented in 2019 – gives us strengthened levels of direct Board oversight on environmental issues. We are also working towards all major sites committing to a five-year sustainable development plan, which will likewise be reviewed by the Board. For any new mine or steel plant, before development starts, we carry out extensive environmental impact assessments and establish an environmental management plan.

Innovation will play a crucial role in progress. Environmental improvements are the subject of an accelerated R&D effort, as we work towards developing more efficient technologies, processes, and advanced monitoring techniques for existing and emerging challenges. Digitalisation will be increasingly significant – for example, we are pioneering new systems using lasers and sensors to detect diffuse emissions, and feed the data to predictive monitoring systems driven by artificial intelligence. This will enable us to predict elevations in emissions before they occur, and thereby take pre-emptive steps to mitigate them.

Through ResponsibleSteel™, we are leading global environmental standards for the steel industry (for more on ResponsibleSteel™, see p.54). And in 2019, we took the further step of bringing expertise in-house to study the environmental health implications of our activities, and deepen our understanding of the wellbeing of our communities and workforce.

Section 2.4 Driving environmental and social sustainability
Managing environmental impacts

Driving circular processes

Steel is ideally suited to the circular economy: it is infinitely recyclable and, being magnetic, easily recoverable. Over 85% of steel is currently recycled worldwide, and we are a significant driver within this resource loop. In 2019 we processed 26 million tonnes of scrap into new steel (both via the EAF and BoF – see climate change section on p.48), yielding an average recycled input rate of 30%, in line with that of the steel industry as a whole. We are also working to improve the quality of scrap we use, as well as exploring automated sorting processes for treating scrap.

Circular processes apply equally to steelmaking itself, where there is significant potential to close resource loops through the innovative redeployment of by-products. For example, we are pioneering the use of blast furnace slag as a valuable resource for many applications, including as a construction material in the cement industry, as well as ballast for offshore wind turbines, and as a source of fertiliser. We are also applying new processes to the recycling of blast furnace sludge to yield zinc by-products. Other circular economy initiatives include working on the use of mining tailings as a secondary raw material, either by finding marketable solutions, or by generating valuable products for use in-house.

21Mt

In 2019, over 21 million tonnes of blast furnace slag were reused, 15 million tonnes of this as cement – 19% more than in 2018 – thereby avoiding the emission of over 11 million tonnes of CO_2.

Making cement sustainable with blast furnace slag

Cement is in great demand around the world, but its production accounts for over 8% of global carbon emissions. The innovative Ecocem process offers a superior quality, low-carbon alternative by using blast furnace slag, a by-product from steelmaking, to create Ground-Granulated Blast Furnance Slag (GGBS).

GGBS is a prime example of the circular economy in action. Its carbon footprint is 95% lower than that of traditional cement and, as a construction material, it offers significant technical and architectural advantages such as strength and longevity, while remaining price competitive (even more so if the cost of carbon is factored in). And by reusing a steelmaking by-product, it reduces waste, saves energy and emissions, and eliminates the disruption caused to ecosystems by the extraction of fresh raw materials.

Ecocem France was established in 2007 by ArcelorMittal with Ecocem Materials,and has production facilities at Fos-sur-Mer (since 2009) and Dunkerque (commissioned in 2018). To date, Ecocem has saved over 4.5 million tonnes of CO_2 and is targeting a further reduction of more than 1 million tonnes in 2020.

The partnership with Ecocem is one example of the initiatives ArcelorMittal is pursuing globally to market our blast furnace slag for reuse. In 2019, over 21 million tonnes were reused, 15 million tonnes of this as cement – 19% more than in 2018 – thereby avoiding the emission of over 11 million tonnes of CO_2.

Ecocem GGBS is being used for The Grand Paris project, Europe's largest transport project.

Section 2.4 Driving environmental and social sustainability
Managing environmental impacts

Air

Air quality is among the most salient issues for the communities around our operations, as well as an ongoing focus for regulators. We are therefore continuing to invest significantly in programmes to reduce both ducted and diffuse emissions, and developing new technologies. We have extended our research on cleaning fumes to investigate a holistic combination of technologies for multipollutant abatement (of dust, SO_x, NO_x and dioxins), and have made significant progress in improving the efficiency of dust filters.

We have made a wide range of environmental capex investments at many sites in recent years, aimed at reducing our environmental emissions – $692 million was authorised by the Investments Allocation Committee in 2019 alone. Our mining operations in 2019 saw reductions in dust, NO_x and SO_x emissions across the group. However, some of the environmental improvement programmes at steelmaking sites remain work in progress, and some new technologies being installed are still in the demonstration phase of innovation, and therefore our investments to date are not yet translating into visible reductions in our environmental performance: the average levels of dust and NO_x emissions per tonne of steel show no improvement year on year. Results for SO_x emissions, on the other hand, were positive, with year on year reductions in both absolute emissions and intensity.

0.63
dust kg/tonne steel
2018: 0.61
2017: 0.67

1.15
NO_x kg/tonne steel
2018: 1.11
2017: 1.17

1.80
SO_x kg/tonne steel
2018: 1.82
2017: 1.62

We will continue to intensify our efforts to improve in the coming years, with investment plans across a number of sites. Major ongoing air quality projects in 2019 include:

Initiative	Our progress
Termitau, Kazakhstan	We have developed a comprehensive environmental action plan, built with local stakeholders, involving a $198m seven-year investment programme focused on de-dusting a range of facilities. Progress made in 2019 includes: ● The reconstruction of sinter machines 5-7 and upgrades to the sinter plant de-dusting equipment. ● The construction of the new electrostatic precipitator (ESP) behind rotary kiln 2 has been tendered. ● The installation of bag filters in the sinter plant, lime shop, BOF shop and coke shop (nearly complete). ● The installation of automatic measurement equipment to track progress. ● The design and engineering of a new biochemical plant to clean effluence. Once these projects are complete, we expect dust emissions to be substantially reduced compared with 2018 levels.
Fos-sur-Mer, France	We acknowledge historic stakeholder concerns and non-compliance issues at Fos-sur-Mer, and invested €100m in the site over the period 2012-17, successfully achieving emissions reductions of dust and sulphur dioxide by 50%, and of dioxins by 70%. In recent years we have invested a further €130m in substantive work on the coke ovens, completed in 2019, and which are now compliant. Investment will continue with an additional €100m by 2023 to reduce environmental impact by an additional 30%.
Taranto, Italy	We are creating the biggest raw materials coverage facility in the world at Taranto. This ambitious engineering project comprises a series of structures, each covering an area the size of 17 football pitches, that together will achieve zero dust emissions from the yards. Coverage of the iron ore yard was completed in late 2019, and completion of the coal yard coverage will follow in 2020. This €350m project is the cornerstone of a €1.2bn environmental investment plan in Taranto that aims to make it the most advanced integrated steelmaking plant in Europe using today's best available techniques; and start rebuilding stakeholder's trust lost under previous leadership.
Krivyi Rih, Ukraine	We have invested $4.4bn in production processes in Krivyi Rih over 14 years of operating which have resulted in improved competitiveness and reduced environmental footprint, including a 48% reduction in dust emissions. Our strategy is to continue investing and reducing impact from dust – for example, we are planning to build a pellet plant to replace two sinter plants, and to modernise a third sinter plant, to achieve a further 43% reduction in dust emissions by 2024. We are also planning further environmentally beneficial works covering all the main types of production.
Tubarão, Brazil	We have signed a cooperation agreement worth R$3.9m with the State of Espírito Santo Federal University (UFES) in 2018 to support their study into the relationship between pollutants and asthma cases in Vitória, Brazil. Over three years, 20 engineering and health specialists will work to identify which pollutants, from particulate matters and gases, most influence the intensifying of asthma symptoms. The results will help guide regulatory agencies when establishing maximum pollution limits and prevention policies.

Land and water

Water is crucial to the steelmaking process, but because we successfully treat and recycle the same water repeatedly, we are able to reduce our fresh water intake. Treatment facilities therefore play a vital role in our water management, and our R&D team is working on innovative technologies to further increase water recovery rates, and reduce energy usage, in ways that enhance both our competitiveness and sustainability. In 2019 we saw a decrease in net water use per tonne of steel from 3.9 to 3.4 m^3/t following improvements in our monitoring systems. A very low level – some 1.6% of our intake – is withdrawn from groundwater sources.

Our application of new water technologies is responsive to local conditions. Where freshwater is scarce, we explore the best alternative sources – for example, at Tubarão in Brazil, we constructed an award-winning seawater desalination plant (see Spotlight on Tubarão, p.53); while in South Africa, we have investigated the potential for using treated sewage water. Also in 2019, we developed promising new technologies for the deionisation and microfiltration of water that could be applied to treatment plants in a versatile and cost-effective fashion.

When issues occur, we aim to act swiftly and cooperatively with local authorities. In Burns Harbor, in the US, in August 2019 we experienced a failure at the pump station for the water recycling system, which is believed to have contributed to reported exceedances of ammonia-N and cyanide at two outfalls. We believe the circumstances leading up to the failure were unique, and we have since been working in coordination with the regulatory authorities to investigate what happened, and implement measures to prevent recurrence. We are also continuing with daily sampling to check for related water concerns, and reporting results to the water authorities with a strong focus on maintaining compliance.

Tailings thickening plant at Peña Colorada, Mexico.

Equally in our mining operations, we work to conserve and recycle water, achieving rates of up to 98% at several facilities. Our commitment to thickening tailings and developing dry tailings solutions are further improving our water efficiency, while also safeguarding communities from the risks associated with wet tailings dams (see Spotlight on Mining, p.25).

We also seek to improve the quality of effluent discharge at mine sites, and conduct regular water monitoring at all operations. Run-off is treated either chemically or through sediment control dams, and tested before being released, or reused if possible. At ArcelorMittal Mining Canada (AMMC), we are implementing a multi-year holistic water management project, including the construction of collector ditches and the installation of water treatment units to control surface effluents on waste rock piles.

Our management of biodiversity is most active in relation to mining, as our steel operations are primarily in urban areas, and we therefore run a range of mining programmes aimed at protecting and enhancing natural ecosystems. For example, in Liberia we operate a Biodiversity Conservation Programme, in which we have invested US$2 million in the last three years to support sustainable forest management and create local livelihoods.

SPOTLIGHT

Tubarão: increasing water security with award-winning innovation

"The project puts ArcelorMittal Tubarão at the forefront of water management, with an appropriate strategy for future adaptation to climate change."

Erick Torres
Vice president, Flat carbon operations, ArcelorMittal, Brazil

To increase water security and ensure the stability of our operations at Tubarão, Brazil, we are pioneering a bold and innovative US$17 million desalination project. At its centre is a desalination plant that will collect seawater and transform it into industrial water using the reverse osmosis process.

With an initial capacity to produce 12,000 m^3/day, and with the potential for subsequent expansion, the plant will provide our steelmaking in Tubarão with this guaranteed water source for the future, reducing the use of water resources shared with society. And to further enhance the sustainability and circularity of the project, the energy consumed in the desalination process will be produced by the ArcelorMittal Tubarão site.

The Tubarão desalination project was recognised with an award for the most innovative project in 2019 by the International Desalination Association. Construction is set to conclude in two years.

Read more about Tubarão on our website

Section 2.4 **Driving environmental and social sustainability**

Reassuring our customers on sustainability performance from mine to steelmaking

"At ArcelorMittal, we are leading the global conversation on steel certification and customer reassurance. With ResponsibleSteel™, we have pioneered the world's first multi-stakeholder steel industry initiative, which has the power to build sector-wide consensus and contribute to a more sustainable society. We understand the scale of the opportunity sustainability presents, and see our leadership role as a crucial advantage."

Alan Knight
General manager, head of corporate responsibility and sustainable development

In a world increasingly concerned with sustainability, responsible production techniques and high ethical and business standards are becoming ever more important. We want our customers to have total confidence in their choices, and therefore need to be able to offer them full supply chain reassurance – from mine to steel plant to final delivery.

We believe standards, auditing and accreditation are required to meet sustainability expectations in a credible and cost-effective fashion. ResponsibleSteel™ is the centrepiece of our world-leading strategy to provide customers, investors and stakeholders with reassurance regarding the social and environmental quality of our steels.

ResponsibleSteel™: pioneering new standards

ResponsibleSteel™ was established in 2015 to maximise steel's contribution to sustainable society through the development of a market-facing, certifiable steel standard. We were a founding member, and have since led the initiative to become the world's first multi-stakeholder steel industry forum, with the power to build trust and achieve sector-wide consensus. The collaborative conversation has been crucial to the formation of a single, global standard; while the multi-stakeholder aspect – including over 40 members, ranging from steel producers to customers, NGOs, mining majors, financial institutions and industry bodies – has been integral to ensuring the standard is robust and credible.

In November 2019, ResponsibleSteel™ published its first site certification standard. Together with the forthcoming product certification standard, this will enable steel producers to reassure customers that their processes and products meet rigorous global benchmarks across a broad range of social and environmental criteria – including climate change, water and biodiversity, human and labour rights, community relations and business integrity.

We anticipate that our leading role in developing ResponsibleSteel™, along with certification for our own sites, will yield significant benefits. Taking the initiative in reassurance gives us a crucial advantage when competing for market share and enhances relations with our customers by responding to their needs. And ResponsibleSteel™ labelling has the potential to drive up demand for certified steel products, thereby contributing both to market expansion and the positive transformation of the industry.

We have carried out ResponsibleSteel™ readiness assessments for our operations in Europe and plan to roll out certification for all European Flat sites.

Read more about
ResponsibleSteel™

Section 2.4 Driving environmental and social sustainability

Reassuring our customers on sustainability performance from mine to steelmaking

ResponsibleSteel™ is a world-leading, market-facing steel standard that provides customers, investors and stakeholders with reassurance regarding the social and environmental quality of certified steel. In November 2019, ResponsibleSteel™ published its first site certification standard.

Implementing certification standards in mining

To be holistic, reassurance needs to cover the full steel value chain, including our sourcing of primary raw materials. Our vision is to buy iron ore and coal only from mines that are independently certified as operating to strong environmental, social and governance standards. This will bring our supply chain in line with ResponsibleSteel™ product certification, which will encompass mining, and takes as its base existing standards such as Towards Sustainable Mining (TSM), and the Initiative for Responsible Mining Assurance (IRMA), where we also play a leading role on the steering committee.

In 2019 we wrote to our key raw materials suppliers to recommend they follow one of these certification routes, and next year we will have a comprehensive timeline for supplier progress. In parallel, we are applying the same expectations and standards to our own mining operations, which supply 52% of our iron ore requirements. We already have a TSM assessment for ArcelorMittal Mines Canada (AMMC), which represents 42% of our iron ore production, and our operations in Liberia and Brazil have the ambition to be IRMA assessed in three to five years. Our new mining CEO Sustainable Development Council is mapping all of our mining assets for certification-readiness, and likewise drawing up timelines for next year (for more, see Spotlight on Mining, p.25).

Responsible Steel standards & certification

12 SD principles

50+ criteria

200+ auditable requirements

ResponsibleSteel™ site certification standard

Section 2.4 Driving environmental and social sustainability

Reassuring our customers on sustainability performance from mine to steelmaking

Managing risk in our supply chain

Beyond iron ore and coal, we have a complex supply chain, including tin, tungsten, manganese, zinc, nickel and other metals that we alloy in small quantities to create our thousands of grades of specialist steels. Our Code for Responsible Sourcing sets out our minimum standards for all suppliers, and every year we assess our core suppliers against the Code.

In order to further minimise risk, we carry out additional risk mapping and analysis, and apply further layers of due diligence based on OECD guidelines where we identify areas of social and environmental concern. We develop action plans where these are needed, in particular in relation to conflict minerals, and identify suppliers who have the potential to take part in certification schemes in the future. As a steering committee member of the Responsible Minerals Initiative (RMI), and a supporter of the Tin Working Group (TWG), we are helping shape certification here too.

Key activities in 2019		
ResponsibleSteel™	The steel industry's first global multi-stakeholder standard and certification programme.	In November 2019, ResponsibleSteel™ published its site certification standard. We have committed to certifying all sites in ArcelorMittal Flat Europe.
IRMA (the Initiative for Responsible Mining Assurance)	An initiative that aims to certify social and environmental performance at mine sites globally using an internationally recognised standard.	As a member of the IRMA steering committee, we participate in the multi-stakeholder expert panels shaping its standards. The standard and self-assessment platform were both launched in June 2018. Our mining operations in Liberia and Brazil are investigating assessment by IRMA, and it is our intention to achieve accreditation in three to five years. We are also looking into implementing IRMA across our other mines in the coming years.
Toward Sustainable Mining (TSM)	A sustainable mining standard established by the Mining Association of Canada (MAC) and recognised worldwide.	ArcelorMittal Mining Canada (AMMC) has been implementing the protocols of TSM since 2004, and our mines in Canada are all TSM-assured and 5-star rated.
The Tin Working Group (TWG)	A multi-stakeholder collaboration on sustainable tin production in Indonesia.	We support the local advisory committee as it conducts pilot projects on health and safety and land reclamation.
Responsible Minerals Initiative (RMI)	A multi-stakeholder resource addressing responsible mineral sourcing issues.	As a steering committee member, we play an active role in discussions around shared standards and encouraging cooperation between assurance organisations.

"Responsible production techniques and high ethical and business standards have become increasingly important to our customers and consumers. It's at the heart of how we do business, giving our customers the reassurance that we meet their sustainability expectations by meeting carbon, environmental and social standards at every stage of production."

Geert Van Poelvoorde, CEO ArcelorMittal Europe – Flat Products

Section 2.4 **Driving environmental and social sustainability**

Engaging with communities and building a workplace for tomorrow

"We know that our relationships with our communities and stakeholders are key to our success. Our businesses see themselves as part of their local communities, and of the broader positive contribution we make to society. This is how we are embracing the concept of being a 'community brand' that is fit for the future."

Nicola Davidson
Vice president, communications and corporate responsibility

Engaging with communities

We play a significant role in the communities in which we operate and are committed to making a positive contribution. We want our communities to thrive, and for us to be a valued part of that success. This is a key aspect of our strategy for the future.

Communities are better connected than ever before, and new forms of communication are driving a strong trend of rising stakeholder expectations – regarding local issues, but also global ones such as climate change. Our global stakeholders, equally, are showing growing levels of interest in what goes on at the local level. This means that engagement with our communities is increasingly important both to maintaining our licence to operate, and to safeguarding a strong global reputation.

Listening, learning and transparency are integral to our approach to engaging with communities, and to operating effectively and responsibly in all parts of the world. Given the central role we play in many of our communities, we like to think of ourselves as a 'community brand' with our communities as critical stakeholders. We are therefore embracing the concept of regular, open, two-way dialogue with local stakeholders on all of our sites. We want our communities to have confidence that we will anticipate and address the challenges that matter to them, and to trust us to listen and show respect, even when there may not be full alignment. And for our part, we must be proactive in explaining what we are doing in response, and communicating the value we create – both as partners in local socio-economic development, and in helping build the circular and sustainable economy of the future.

$30.3m

Community investment spend (including STEM spend)
– of which, voluntary spend **£18.1m**
– of which spend on STEM projects **$7.4m**

Conducted in the right way, stakeholder engagement helps us to understand changing expectations, foresee future problems, and minimise surprises. We understand stakeholder trust to be a key value driver, and accordingly adopt a Board-led strategic approach to deepening that bond, and learning more about our communities than ever before.

A new level of social governance and community awareness

In 2019, we implemented in full our new system of governance and corporate oversight of local community sentiment and relations. Every quarter, the ARCGS reviews the community relations dashboard and related KPIs, as well as a 'traffic light' community risk rating of red, amber or green for every site. This serves to call attention to critical sites, while achieving an unprecedented depth of Board-level awareness of community issues.

Read more about our STEM initiatives on p.62

The traffic light ratings are prepared on a quarterly basis by the corporate responsibility (CR) team and are based on a number of sources of information. These include:

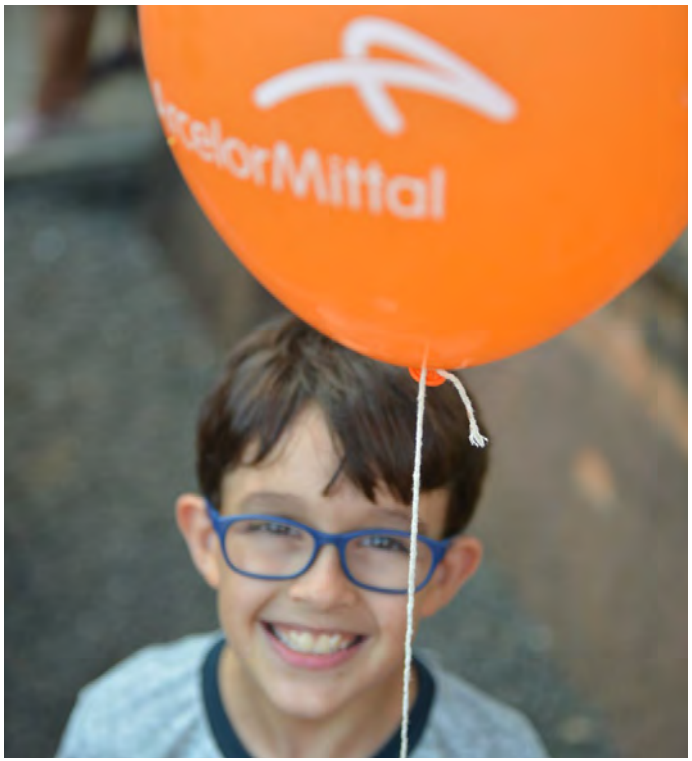
- Insights from corporate functions (e.g. communications, security) and local management
- Results of internal or external assessments of community and social management systems (including, for example, ResponsibleSteel™ audits or Towards Sustainable Mining assessments)
- Media alerts and news
- Community reputation and sentiment surveys where available
- Environmental non-compliances

A site is considered 'red' if it faces significant social and/or environmental issues that could impact on our global reputation; 'amber' if there are significant issues but these are currently being effectively managed; and 'green' if issues are only minor, local and well managed. For all sites that are rated red, a deeper dive is performed by the corporate CR team – usually including site visits – to better understand the underlying factors behind the situation. This root cause analysis is used to identify trends and patterns behind challenging community relations. A similar but less in-depth approach is taken with amber sites, while performance improvements are driven by adopting models and best practice from green sites.

In addition, the CR team conducts in-depth conversations with a sample of CEOs from around the globe, regularly discussing their perspective on the evolving expectations of stakeholders to ensure that as an organisation we have a comprehensive view.

Learning, developing and leading

Our global oversight system enables us to compare sites, and leverage our scale to identify best practice and share learning. We have always been proud to apply a single set of community standards globally which, in many of the environments where we operate, exceeds local standards. Gap analysis of current performance on community relations and engagement is now empowering us to develop these standards further – both in relation to external definitions of best practice, and our own experience of implementation and learning from around the world.



This work has led to the creation in 2020 of our new Community relations guidance and toolkit, which sets out our most ambitious stakeholder engagement procedures to date. Implementation will build on the existing plans and projects that sites have in place, while working towards a more systematic global approach to understanding and managing what is important to stakeholders, and delivering on our unique position as a community brand. The approach is defined by four priorities:

- **Understanding our communities:** regular review of any trends and changes that could impact our licence to operate, including community perception surveys, social context analysis, and assessment of social and human rights impacts.
- **Comprehensive planning:** detailed annual plans for: community issues and impact management, stakeholder engagement, community investment, and complaints and grievance mechanisms.
- **Effective implementation:** strong leadership and culture to support trusting stakeholder relationships, robust governance frameworks, good internal and external communication, and appropriate resources.
- **Monitoring performance:** regular monitoring of management plans, oversight of feedback from local communities and use of appropriate metrics.

ArcelorMittal Brazil 'Ver e cover' community project focusing on diagnosis and treatment of children with sight issues.

Section 2.4 Driving environmental and social sustainability
Engaging with communities and building a workplace for tomorrow

Leadership will be crucial to success, and for this reason we have been focusing on building a global network for knowledge sharing among ArcelorMittal corporate responsibility teams across our operations. We bring together function members from across the organisation to share knowledge and progress discussion and planning on SD- and CR-related issues, as well as holding regular global webinars. We are also working with our human resources function and ArcelorMittal University to build stakeholder engagement and communication into leadership training.

Making our contribution

In 2019, our estimated direct economic contribution to society amounted to $72.2 billion. Of this, $53.7 billion went to our suppliers and contractors around the world, $9 billion to our employees' salaries, wages and pensions, and our total tax contribution was $4.5 billion. $30.3 million went to the communities in which we operate.

$30.3m
invested in community projects

$4.5bn
paid in income tax and other taxes

Read more about our STEM initiatives on p.62

ArcelorMittal Brazil 'Ver e cover' community project focusing on diagnosis and treatment of children with sight issues.

Working with communities	
ArcelorMittal Kryvyi Rih, Ukraine	In August 2019, ArcelorMittal Kryvyi Rih launched a new Ecocity project to support the social and environmental initiatives of the residents of Kryvyi Rih. Initiatives relate to the improvement and landscaping of urban areas, the safeguarding of resources and the rational use of waste. We finance the best initiatives through allocating grants from a total prize fund of 1 million UAH.
ArcelorMittal Acindar, Argentina	For several years, ArcelorMittal Acindar has been participating in the Hábitat para la Humanidad project 'Seed Houses'. The project helps families that don't have access to proper housing by providing finance and materials for them to build their own homes in stages. Over the past two years, we have donated a total of 7.46 tonnes of steel to the project, facilitating the construction of 10 seed houses ('Casas Semillas'), and enabling 10 families to become owners of their own homes in La Matanza.
ArcelorMittal Temirtau, Kazakhstan	In line with our continuous environmental improvements, as well as in response to the rising expectations of governmental agencies, environmental activists and the public at large, ArcelorMittal Temirtau has introduced the position of Green Officer. The officer will work in close collaboration with the environmental and communications teams and the local community on environmental issues. ArcelorMittal Temirtau has also introduced a new online system to enable communities to track the levels of air emissions. The system collects data automatically every 10 minutes from three air quality control systems, located at the borders of the 'sanitary protection zone', and publishes the results directly on the website.
ArcelorMittal USA	Every year, ArcelorMittal invests millions of dollars in charitable grants to non-profit organisations in the communities where we operate. But many of our community partners additionally benefit from the involvement of our people. When ArcelorMittal leaders serve on the boards of non-profits, they contribute world-class expertise, leadership, perspective and connections. At the same time, they gain valuable insights into community needs as well as civic leadership experience that can strengthen their roles at ArcelorMittal. Non-profit organisations that our leaders have been involved with include the Bradywine Red Clay Alliance, the Girl Scouts of Greater Chicago and Northwest Indiana, and the United Way of Northeastern Minnesota. Read more about this here.

Section 2.4 Driving environmental and social sustainability

Building a workplace for tomorrow

"The world of work is changing fast. There is intense demand for the best talent and we want to ensure that we attract and retain the right people to take up the opportunities and challenges we face. I believe that ArcelorMittal is an employer of choice with a strong, inspiring employee value proposition."

Bart Wille
Executive vice president, head of human resources

New technologies and social media are shifting the dynamics of the global talent market. Employees now have much more information about their current and potential future employers, enabling them to make more informed decisions. If we are to secure the strong and diverse talent pipeline that our ambitious business goals demand, we need to be an aspirational place to work.

Our employees are our most important asset. In 2019, we launched our new Employee Value Proposition and with it our employer promise, 'MAKE YOUR WORLD'. Together, these communicate the values, culture and unique set of benefits ArcelorMittal offers to its employees in return for their skills, capabilities and experience. Our Employee Value Proposition is based around four key pillars:

- **Fabric of life:** this demonstrates the reality that steel is essential to modern life.
- **Driven by excellence:** this highlights our leadership position in the industry and our hunger to keep improving and to meet the ever-changing needs of our customers.
- **Run with it:** this focuses on the entrepreneurial spirit of our employees and the opportunities they have to develop, grow and progress in their careers.
- **Shoulder to shoulder:** this showcases the strength that comes from diverse, high-performing, multi-cultural teams, each working together effectively in order to achieve the same organisational goals.

The Employee Value Proposition's design follows extensive internal and external research and represents what is true for ArcelorMittal today and what differentiates us from our competitors. It also enables us to consistently weave relevant messages into our content whenever we talk to our current and future employees, and to communicate our core purpose of inventing smarter steels for a better world.

To continue attracting and retaining the best talent – both for now and for tomorrow – we also want to be a high-performing organisation. This requires having the right systems, technologies and policies in place to ensure we are as inclusive and connected as possible, while supporting leaders to lead effectively and to set the right culture.

These have been significant areas of focus in 2019, as we have developed our leadership training with ArcelorMittal University, moved to respond to the results of our Speak Up! employee survey and continued to improve our HR systems and practices by leveraging the strengths of our diverse teams in different parts of the world. We know our people are key to our success, and with 191,248 employees we are more than just a company, we are a community.

Section 2.4 Driving environmental and social sustainability
Engaging with communities and building a workplace for tomorrow

R&D engineer and 3D-printed automotive part at Maizières-lès-Metz R&D centre, France.

Accessing and supporting diverse global talent

ArcelorMittal is a global organisation with a presence in over 60 countries and employees from many more, who all bring fresh perspectives and experiences to our business. We see our diversity as a key asset and a condition for our success. We also understand the significant shift that is taking place in employee demographics and the impact it is having on the workplace. We value our employees' contribution, and various parts of our business have implemented programmes to express our deep appreciation. As a leader in our industry, we have some of the best and most experienced people across different functions, and we take pride in providing young talent with opportunities to work alongside our more experienced colleagues and to benefit from their expertise.

We encourage employees to seize the opportunities we offer to learn, develop and progress, and in 2019 we introduced a new system that allows us to share information more easily between business segments and with candidates regarding new opportunities from our operations around the world.

As our business evolves, we have a growing requirement for new talent and skillsets, especially regarding new technologies. To be competitive in these new fields, we need to ensure that we are continuing to access and support the full range of available talent – irrespective of gender, culture, ethnicity, or social and country background.

57.5
hours of training per employee (excluding ArcelorMittal Italia and AM/NS India)

$64.7m
training budget

Section 2.4 Driving environmental and social sustainability

Engaging with communities and building a workplace for tomorrow

To encourage the inflow of more senior women, we have been benchmarking our sites for inclusive policies (for example family-friendly policies and flexible working hours). We also continued to expand our programmes and training for women employees, including mentoring, coaching, networking, and our online learning channel, Women@ArcelorMittal, which encompasses both webinars and face-to-face sessions.

In our ArcelorMittal University, Leadership Pipeline programmes include training on unconscious bias and the importance of gender and ethnic diversity and inclusion. These issues also feature in our ArcelorMittal University series on Valuing Difference and Borderless Workplace, and they are integrated into our programmes in several countries to support people with disabilities in the workplace. Learning initiatives work alongside our Country and Team Navigator tools for self-assessment on diversity and they contribute to our broader programme of promoting the innovative and collaborative environments that diverse teams create.

1/3
of the members of our Board of Directors are female

28%
women recruited (exempt population)

To build our technical skills for the fast-moving production areas of tomorrow, including digitalisation and 3D printing, we also focus on developing our STEM capabilities. This includes offering ArcelorMittal University technical training courses and performing skills assessments in 'hot spot countries', which give management a picture of critical skills levels. In 2020, we plan to roll out globally a standard skills assessment method and develop targeted plans in response. Looking further into the future, we are investing in STEM programmes as part of our community work.

Investing in STEM for tomorrow

Our business environment is evolving rapidly and we need new and different skillsets to be fit for the future. Our investments in the development of STEM capabilities respond to this need. We engage with diverse talents of all ages from around the world, with a particular focus on women and young girls. Unique initiatives include:

- **STEM with Fundación Talentum, Spain:** together with Fundación Talentum, we organised workshops for children with high abilities, focusing on robotics, arduino, 3D printing, Artificial Intelligence and other STEM topics.
- **'The Challenge' hackathon, Belgium:** we challenged tech-driven students and enterprising young adults to find creative solutions to industry-based problems.
- **Science in Femening, Spain:** we participate regularly in educational events organised by public bodies to attract girls to STEM subjects. Through these, some of our most successful researchers have been able to talk with young girls directly and share their experience of life as researchers in the steel industry.
- **Circular Economy Masterclass for the STEM Talent Girl Programme, Spain:** we gave a national level masterclass to 12-14 year-olds, participating in a STEM mentoring programme.
- **ArcelorMittal Brazil:**
  - Application of the My Robot Programme, which addresses robotics and STEM careers with 9th grade students. Partnership with Junior Achievement enabling training of around 40 teachers and 800 students.
  - Maker Day in partnership with UFMG (Federal University of Minas Gerais) and 4Lab offering science workshops where students can learn more about synthetic biology, robotics and basic electronics.
  - My STEM Community Programme in partnership with the Municipality of Mateus Leme and the Municipal Department of Education, benefiting 50 students from 2 public schools.
  - II Maker Experience offered to students from the municipal education network and in partnership with the Municipality of Piracicaba. Activities: Steel Journey Program (virtual reality), Innovation Camp and Robotics with Junior Achievement, Fantastic Machine with 4Lab.
  - The 'Conhecer' Programme promotes monitored visits to ArcelorMittal Tubarão for students from kindergarten to high school. Activities carried out during the visit are organized according to the visitors' education level. The schedule includes a panoramic visit to the industrial area, lectures and conversation about specific topics, like our production process, sciences, technologies and sustainability.
  - Engineering Week at UFES – Federal University of Espírito Santo, Vitória.
  - XII Academic Week of Materials Engineering – annual technical/scientific meeting of material engineering students to discuss topics related to the future of the profession, stimulating entrepreneurship and interest in industrial and academic research.
- **Internal STEM network:** in 2019, we created an internal STEM network, through which STEM leaders participate in quarterly global webinars to share learning and experience.

Section 2.4 Driving environmental and social sustainability
Engaging with communities and building a workplace for tomorrow

Inspiring leadership

As part of our strategy to be a high-performing organisation, we conduct a biennial Speak Up! Survey amongst our employees, which we follow up with concrete action plans that address the identified issues and needs. The 2019 survey involved 25,000 employees globally across all levels of the business and demonstrated a 70% favourability score. This result is stable since 2017, despite challenging global economic conditions. A major learning point was that our HR policies, systems and procedures are generally well-regarded and effective. Hence we focus on their use, in particular on the development of leadership. 'Inspiring leaders to lead and managers to manage' is therefore our central theme for leadership development in 2020. We will promote this through five key principles:

- inspiring leadership
- encouraging communication
- fostering an environment of continuous learning
- working with ethics and integrity
- ensuring leaders lead by example

These principles will define our leadership communications and they are embedded into our Global Employee Development Process (GEDP), which we use to evaluate employee performance. Identifying and retaining people with the right leadership qualities and potential for key roles is a crucial aspect of our business strategy and it is central to our ambition to be a high-performing organisation.

ArcelorMittal Italia

Being a responsive employer

At ArcelorMittal we engage in an open and continuous dialogue with our employees, to create a working environment based on mutual trust, understanding and respect for workers' rights. We pride ourselves on maintaining productive working relationships with unions, and collective labour agreements cover 88% of our workforce across all countries of production.

In 2019, we dealt with two strikes of more than one week. During 2019, we received 162 complaints relating to alleged fraud, which were duly referred to and reviewed by the Company's Internal Assurance Department. Following further review by the Audit & Risk Committee, none of these complaints were found to be significant.

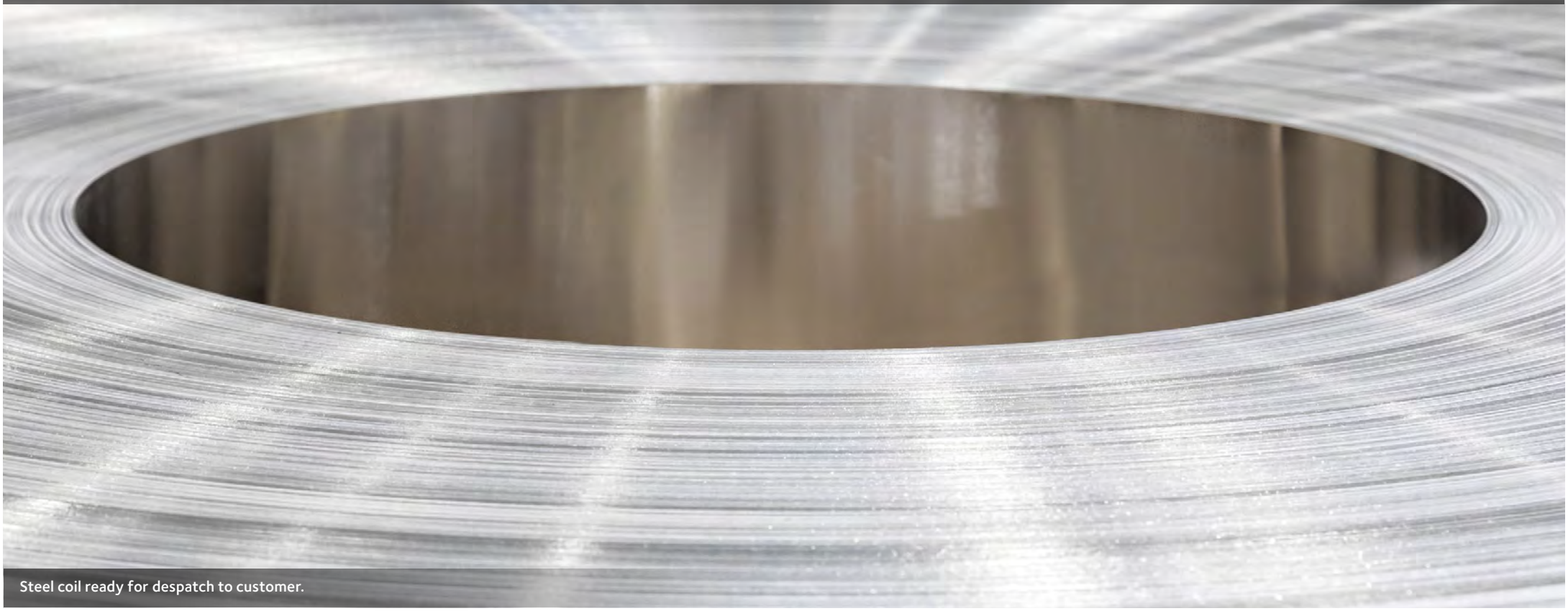
We have also worked to improve our onboarding experience: in 2019, we redesigned our onboarding practices and implemented the new designs throughout the business. We were awarded the 2019 Luxembourg HR onboarding excellence award in recognition for this innovative approach.

Section 3

Transparency and good governance

"Good governance is fundamental to our values, integrity and reputation, as well as being key to our success as a company. This year we have continued to improve our governance processes and implement new structures that ensure the highest levels of internal and external oversight and transparency."

Lakshmi N. Mittal, Chairman and CEO



Steel coil ready for despatch to customer.

Section 3 **Transparency and governance**

Governance

We place a strong emphasis on good corporate governance, and aim to maintain a culture of integrity that ensures compliance and the sensible management of business risks. Demonstrating responsibility and respect for our colleagues and all stakeholders, and actively listening and responding to their concerns, are central to our business.

Governance structure

ArcelorMittal S.A., the parent company of the Group is a public limited liability company (société anonyme) incorporated in Luxembourg. It is governed by a Board of Directors in accordance with the requirements set out in the Company's Articles of Association.

The Board of Directors oversees the governance and direction of the business. Responsibility for the implementation of the company strategy, the overall management of the business and all operational decision-making is delegated to the CEO Office, which comprises the Chief Executive Officer, Mr. Lakshmi N. Mittal, and the President and Chief Financial Officer, Mr. Aditya Mittal, and further supported by five other executive officers.

The Board of Directors is composed of nine directors, of whom eight are non-executive directors and five are independent directors. The one executive director on the Board is Mr. Lakshmi N. Mittal, the Chairman of the Board and Chief Executive Officer. To ensure strong governance, a Lead Independent Director is appointed to support the Chairman in setting the agenda for Board meetings. He meets the independent directors regularly before every Board meeting.

In 2018, the former Appointments, Remuneration & Corporate Governance (ARCG) committee added Sustainability to its scope and was renamed the Appointments, Remuneration, Corporate Governance and Sustainability Committee (the ARCGS), reflecting our emphasis on integrating sustainable development throughout the business. The Board's Audit and Risk Committee and the ARCGS are each comprised exclusively of independent directors.

Board of Directors

We describe the background and experience of each board member in our Annual Report. The Board of Directors is of the view that its members have the appropriate range of skills, knowledge and experience, as well as the degree of diversity that enables it to govern the business efficiently.

The Board's composition and its members' skills are reviewed on a regular basis and in line with the expected development of the business. Additional skills and experience are actively sought when appropriate. The Board is also involved in succession planning.

The Company Secretary, Henk Scheffer, oversees compliance with statutory and regulatory requirements.

Name	Age[4]	Date of joining the Board[5]	End of term	Position within ArcelorMittal
Lakshmi N. Mittal	69	May 1997	May 2020	Chairman of the Board of Directors and Chief Executive Officer
Vanisha Mittal[6] Bhatia	39	December 2004	May 2022	Director
Jeannot Krecke	69	January 2010	May 2022	Director
Suzanne P. Nimocks[2,3]	60	January 2011	May 2022	Director
Bruno Lafont[1,2,3]	63	May 2011	May 2020	Lead Independent Director
Tye Burt[2,3]	62	May 2012	May 2021	Director
Michel Wurth	65	May 2014	May 2020	Director
Karyn Ovelmen[1,3]	56	May 2015	May 2021	Director
Karel de Gucht[1,3]	65	May 2016	May 2022	Director

1. Member of the Audit and Risk Committee.
2. Member of the Appointments, Remuneration, Corporate Governance and Sustainability Committee.
3. Non-executive and independent director.
4. Age as of 31 December 2019.
5. Date of joining the Board of ArcelorMittal or, if prior to 2006, its predecessor Mittal Steel Company NV.
6. Mrs. Vanisha Mittal Bhatia is the daughter of Mr. Lakshmi N. Mittal and sister of Mr. Aditya Mittal.

Read more about ArcelorMittal governance on our website

Section 3 Transparency and governance
Governance

In line with the worldwide effort to increase gender diversity on the boards of directors of listed and unlisted companies, the Board of Directors of ArcelorMittal set the goal to increase the number of women on the Board to at least three by the end of 2015. This target was accomplished with the election of Mrs. Karyn Ovelmen in May 2015. As a result, out of nine members of the Board, women represented 33.33% in 2019.

Details of the Directors' remuneration can be found in our Annual Report.

Chairman and CEO

Being a company registered in Luxembourg, ArcelorMittal S.A. complies with the 10 Principles of Corporate Governance of the Luxembourg Stock Exchange and international best practices in all its aspects.

At their Annual General Meeting in 2007, the shareholders decided to combine the roles of the Chairman of the Board of Directors and of the Chief Executive Officer, approving the nomination of Mr. Lakshmi N. Mittal for both positions. Since having the same person in both roles proved to be a good choice for the Company, the decision was confirmed several times with a strong majority, most recently at the Annual General Meeting of 2017. The Board of Directors believes Mr. Mittal's strategic vision for the steel industry in his position as Chairman and for ArcelorMittal in his role as CEO is a key asset for the Company that provides significant shareholder value.

The governance structure is further strengthened by the Lead Independent Director whose role is to provide leadership to the Board, to act as liaison between the Board and management, and to identify guidelines for the conduct of the directors.

Risk management

ArcelorMittal has set up a process of risk identification and management, in which risks are owned and managed by line management. The risk function facilitates conversations and helps the monitoring of action plans. Critical risks are escalated through existing reporting lines, and critical risk decisions are not dissociated from other decisions.

The Audit and Risk Committee is established by and among the Board to ensure that the interests of shareholders are properly protected in relation to risk management, internal control and financial reporting. The Committee assists the Board of Directors with the oversight of risks to which the ArcelorMittal Group is exposed and in the monitoring and review of the risk management framework and process.

Our Risk Factors are outlined in our 20-F report, item 3D on page 9.

Sustainable development

Fully integrating sustainable development (SD) into the business is essential to reach our aim of achieving long-term value for our shareholders and other stakeholders, while maintaining a profitable market share.

In 2015, ArcelorMittal introduced a new SD framework including 10 SD outcomes. In 2018 the ARCGS Committee of the Board introduced a structured approach to overseeing the business pursuit of the 10 SD outcomes according to five management themes: safety, climate change, environment, social and customer reassurance.

The approach includes:

- A set of key performance indicators (KPIs) for every business segment to report against overseen by the ARCGS.
- An expectation that SD is integrated into each business segment plan, acting on its material SD issues. Some segments integrate the management of SD into existing structures whilst others, such as the Mining segment, have set up a distinct CEO SD Council to establish best practices and effectively manage the environmental, social and governance (ESG) risks to the business.
- Corporate initiatives on SD for the benefit of the Group, for example to accelerate progress towards low-carbon steelmaking; to innovate steel solutions for a positive SD impact; and to develop a 'mine to metal' chain of assurance against multi-stakeholder environmental and social standards.
- A robust articulation of our approach and progress through clear narrative and transparent, third-party assured reporting.

Climate change governance

In 2018, climate change was identified as one of the above five themes to be overseen by the ARCGS. The ARCGS nominated senior officers to take responsibility for its low-carbon transition strategy, its carbon performance, and its work on advocating for the introduction of carbon-related government policies.

They are supported by corporate functions covering strategy, technology, R&D, corporate responsibility and communications, all of which are represented on the Climate change and Environment Committee and report to one executive vice-president, who works closely with the CEO and CFO on climate issues. The Company also convenes a number of councils and working groups to oversee CO_2-related capex investment decisions, public policy work, stakeholder relations, technology planning, target development and progress against these across each segment. These governance processes are described in more detail in the company's Climate Action reporting.

Section 3 Transparency and governance
Governance

Business ethics

We encourage our employees to be good corporate citizens, acting with integrity in everything they do. We strive to create a positive culture in which everyone wants, and knows how, to do the right thing.

Our commitment to integrity is embodied in our Code of Business Conduct and is supported by a comprehensive framework of policies and procedures in areas such as human rights, anti-corruption and insider dealing. These documents reflect the principles and concepts of the UN Global Compact, the OECD Guidelines on Multinational Enterprises and UN Sustainable Development Goal 16 – Peace, justice and strong institutions.

Compliance and our Code of Business Conduct

Our Code of Business Conduct defines what acting with integrity means in practice. It applies to all directors, officers and employees of ArcelorMittal S.A. and its subsidiaries worldwide. Based on a training matrix, our employees undergo training on the Code of Business Conduct and other aspects of compliance every three years. In 2019, 88.6% of ArcelorMittal's employees worldwide have completed the training on the Code of Business Conduct, and 95.4% have done their mandatory anti-corruption training.

We continuously monitor legal requirements and best practices in the USA, the European Union, Luxembourg and all countries where we operate, and make improvements to our corporate governance standards and procedures when necessary.

Confidential reporting of breaches

Employees as well as other stakeholders can report any breaches of our policies and procedures through the confidential whistleblowing facility on our corporate website.

We also have confidential whistleblowing hotlines in our 30 major countries of operation. From these systems, in 2019 we received 162 complaints relating to alleged fraud. All allegations were referred to and duly investigated by our Internal Assurance Department. Following review by the Audit and Risk Committee, none of these complaints were found to be significant.

		2017	2018	2019
Employees trained on Code of Business Conduct	(%)	85	87.5	**88.6**
Employees trained on anti-corruption*	(%)	82	90.4	**95.4**
Employees trained on human rights*	(%)	66	94.1	**90.1**
Whistleblowing systems	Number	30	27	**30**

*Percentage of employees in appropriate functions targeted for training.

Human rights

We developed our first human rights policy in 2010 and reviewed it regularly in line with the United Nations Guiding Principles on Business and Human Rights and the UK Modern Slavery Act.

Our current policy was approved by the Board of Directors in May 2017. It draws on the UN Universal Declaration of Human Rights, the International Bill of Human Rights, the core Conventions of the International Labour Organization, and the UN Global Compact. It is reviewed regularly in line with evolving international standards such as the United Nations Guiding Principles on Business and Human Rights and the UK Modern Slavery Act. It also aims at incorporating the UN SDG 8's focus on decent working conditions, including target 8.7 on eradicating modern slavery. The policy includes commitments to workers, local communities and business partners and covers health and safety, labour rights and the rights of indigenous people.

In line with these undertakings the Company's remuneration policy links 10% of the bonuses of its leadership – from managers to the CEO – to safety KPIs in the business where he or she works, where relevant.

We require all employees in appropriate functions to undergo human rights training every three years. In 2019, 90.1% of the Company's relevant workforce had completed up-to-date human rights training, down from 94.1% in 2018.

We provide our stakeholders – including employees, contractors, and community members – with the facility to raise a grievance of any kind through a confidential grievance mechanism at site level, or through whistleblowing lines at country level. We also have a central whistleblowing line on our corporate website.

In 2019, we continued to deepen our understanding of the relevant risks in our supply chain by strengthening our supply chain risk management and audit processes. The most salient human rights risk was identified in the raw materials part of our supply chain and this is also the focus of interest for our customers. In 2019, we prepared our sites in Europe to be certified against ResponsibleSteel™ and continued to progress our certification programme for marketable mines using TSM and IRMA. We also wrote to our key raw materials suppliers to recommend they follow either one of these certification routes, and next year we will have a comprehensive timeline for supplier progress – read the Reassuring our customers on sustainability performance from mine to steelmaking, p.54 for more details.

Stakeholder relations

Since we endeavour to be transparent and honest with all our stakeholders and make all efforts to take their interests into account, we engage with them regularly, including through this report, according to our internal stakeholder relations proceeedure.

We identified our key stakeholders in an exercise undertaken in 2014: customers, workforce, governments, investors and communities. The top non-financial issues raised by these stakeholders continue to be safety and climate change.

We discuss these issues on p.14 and p.42 of this report.

To facilitate engagement with our stakeholders, we carry out a range of engagement processes at site, country and corporate level, including surveys, direct conversations, roundtables and roadshows, and also reference external analysis to keep track of trends in stakeholder expectations. These are explained in more detail, stakeholder by stakeholder, in Step 2 of the Assessment of our SD-related material issues on p.70.

Transparency and balance

Reporting is central to our promise of openness with stakeholders. We are committed to applying best practice standards in corporate governance in our dealings with shareholders and other stakeholders, and with respect to transparency, balance and quality of disclosure and reporting. This commitment underpins this Integrated Annual Review and our first focused and detailed Climate Action Report in 2019. Our materiality process is described in the next section.

We also published a number of country sustainability reports in 2019, alongside our disclosures to the CDP (formerly the Carbon Disclosure Project) on climate change and water, and a number of investor and customer surveys. In 2019, we published our Report on Payments to Governments in respect of Extractive Activities for the year ended 31 December 2018. We also report in line with the Mine Safety Disclosure Requirements of the Dodd-Frank Act.

Section 3 **Transparency and governance**

Materiality and risk management

Summary of ArcelorMittal's risk management process

ArcelorMittal identifies, assesses and manages risks – including climate-related risks – on an ongoing basis. The Group-level strategy, R&D and sustainable development functions, and segment level experts where appropriate, assess social, environmental, regulatory, stakeholder and technological trends on an ongoing basis. Key risks are analysed by building models and developing scenarios to understand potential financial impacts. Short-term risks within a 12-month timeframe are identified through a bottom-up process by site management teams. Business segments consolidate the identified risks and report the top risks to the CEO office quarterly.

The company uses a risk management framework based on a blend of a COSO, an ISO 31000 and an in-house model. Sites assess risks by assigning them a probability of occurrence and a potential financial impact and/or non-financial consequence such as environmental harm.

The corporate risk officer uses Monte Carlo simulations to conduct a stress-testing exercise for the consolidated top ten short-term risks above a $50 million materiality threshold. This exercise quantifies the financial impacts for each top risk to an appropriate confidence level, and the outcome is shared with the Audit and Risk Committee.

The Audit and Risk Committee is established by and among the Board to ensure that the interests of shareholders are properly protected in relation to risk management, internal control and financial reporting. The Committee assists the Board of Directors with the oversight of risks to which the ArcelorMittal Group is exposed and in the monitoring and review of the risk management framework and process.

Climate-related trends and risks identified by management are used to inform the company's strategic outlook. This is discussed on a regular basis by the Group management committee.

Our Risk Factors are outlined in our 20-F report.

Summary of the SD materiality process for our Integrated Annual Review

In addition to the risk management process, the company manages the stakeholder materiality process which assesses what is material to our stakeholders and to the business to maintain a strong licence to operate. The materiality process focuses on the most important SD-related issues, opportunities and risks from the perspective of our stakeholders and business impact.

ArcelorMittal's approach to materiality is based on an ongoing analysis of global sustainability challenges, reputation surveys, commercial challenges and business disruptors. Back in 2014, this work informed a series of strategic conversations about steel and sustainable development across the business, resulting in the development of our 10 sustainable development outcomes, aligned with the 17 UN Sustainable Development Goals to help us drive our transformation into the steel company of the future. These cover the topics that ArcelorMittal considers the most material to meet stakeholders' expectations on SD and for our business to maintain its licence to operate (see the breakout box on p.70).

In 2018, in order to achieve more active, specific and robust governance on progress toward our SD outcomes, the company formed the Appointments, Remuneration, Corporate Governance & Sustainability Committee (ARCGS) of the Board of Directors. The ARCGS grouped the 10 SD outcomes into five SD management themes, and reviews quarterly comprehensive plans from all of our operations against the five themes, including performance dashboards and detailed sets of KPIs.

Assessing stakeholder expectations is a continuous materiality process at all levels of the business to validate and improve understanding of the key SD topics important for the business. This feeds directly into ArcelorMittal's strategic planning by every business segment against the five themes. These assessments are undertaken through a number of different processes, consolidated at corporate level, as outlined on p.70.

Section 3 Transparency and governance
Materiality and risk management

Material SD topics underpinning the 10 sustainable development outcomes, resulting from ongoing materiality process

01	**SD outcome 1** Social	– Occupational health and safety – Employee development – Gender diversity – Human rights - workforce
02 03	**SD outcome 2 and outcome 3** Product Innovation	– Product innovation
04	**SD outcome 4** Environment	– Recycling – Waste and by-products – Process innovation
05	**SD outcome 5** Environment	– Air emissions – Water efficiency in stressed areas – Tailings dam management – Biodiversity (mining) – Process innovation
06	**SD outcome 6** Climate change	– Carbon – Energy – Process innovation
07	**SD outcome 7** Supply chain	– Due diligence on environment, workforce, community, ethics and human rights issues in our supply chain – Customer reassurance via standards and certification
08	**SD outcome 8** Social	– Community trust – Community health – Community investment – Human rights – community
09	**SD outcome 9** Social	– STEM talent pipeline – STEM education projects to encourage gender diversity
10	**SD outcome 10** Social	– Economic and social impact

Assessment of our SD-related material issues

Step 1: Identify and track relevant trends and topics: using the 10 SD outcomes as a foundation, we continually assess the social, environmental, governance and technological trends in the changing world to understand emerging topics that might impact the business now and, in the future, for example through:

- Social media monitoring to identify trends in stakeholder concerns, competitor trends (further details in section below).
- Research and opinion pieces relevant to the sector to identify emerging stakeholder views on risks and opportunities.
- Active participation in a number of cross-sector working groups and industry bodies, giving it exposure to key emerging focus areas of stakeholders.

Step 2: Assess stakeholder expectations affecting the business outlook: engage across a variety of channels to understand how important key topics are for stakeholders and their relationship with ArcelorMittal.

ArcelorMittal uses a wide range of channels to engage key stakeholders on the 10 SD outcomes and key topics and continually tracks their importance.

Employees

ArcelorMittal conducts a Speak Up! survey with employees every two years on a range of topics in order to seek employee views, concerns and areas for improvement. Each business unit develops an improvement plan following the survey.

In 2018-9, the company also worked with a consultant to speak to focus groups of current employees and also 14 senior leaders to understand which business values resonate most with employees and are important to them. This has informed our employee value proposition.

Customers

SD is engrained in customer engagement at all levels. Feedback on importance of particular topic areas is gathered through one-to-one meetings with key customers on carbon, social and environmental topics, customer satisfaction surveys, conducted on a business unit level, and the requirement of surveys from our customers, such as ResponsibleSteel™, Ecovadis, NQC and SACS (Sustainability Automotive Customer Service). We assess our experience of each of these channels to confirm the changing importance of SD topics to our customers.

Investors

ArcelorMittal engages with shareholders and lenders and ratings agencies on a continual basis throughout the year via one-to-one calls, roundtables, conferences and meetings. ArcelorMittal also respond to over 15 SRI surveys. ArcelorMittal tracks investor areas of interest and records the environmental, social and governance topics that are raised during any engagement. ArcelorMittal analyses the frequency at which each topic is raised over the year and uses this to get a view of priority, standard and emerging topics for investors.

Section 3 Transparency and governance
Materiality and risk management

Communities

ArcelorMittal actively engages with local communities to make a positive contribution in terms of creating economic and social value through employment, procurement, taxation and sustainable development initiatives and through strong risk management and respect for human rights. To do this, we aim to take a partnership approach, listening to the concerns of stakeholders at site, country and segment levels, to give them the confidence that ArcelorMittal will address the impacts it has on them and their environment. Indeed, every major operation is expected to develop a regular stakeholder engagement plan. This approach is an essential part of the Company's integrated approach to managing risks and impacts, and thus maintaining the Company's social licence to operate. Direct management of community issues, monitoring of local risks and opportunities and how these are being addressed is led by local operations. In 2019, community dashboards were established with the ARCGS Committee to oversee the significance of a site's risks and opportunities. The aim is to use the dashboards to improve performance at sites identified as being at risk, in particular those considered to be high risk.

Step 3: Internal process to determine priority topics requiring executive oversight and governance. In 2018, the company formed the Appointments, Remuneration, Corporate Governance & Sustainability Committee (ARCGS) of the Board of Directors. The ARCGS grouped the outcomes into five SD management themes, and reviews quarterly comprehensive plans from all of our operations against the five themes, including performance dashboards and detailed sets of KPIs.

Step 4: Disclose. The outcome of the ongoing materiality process is an internal understanding of the key social, environmental, technology and regulatory external trends, the topics of concern to stakeholders at each level of the business, and the implications of both for ArcelorMittal's business. Key topics are managed and reviewed internally with oversight from the Board, and reported on externally. We disclose information to our stakeholders that reflects both the key challenges and opportunities we currently see, our ability to create value and a longer-term perspective on materiality. This is delivered via our Form 20-F, the Integrated Annual Review, the CDP, our Climate Action Report and our quarterly SD leadership reviews.

ResponsibleSteel™: identifying priority topics for the steel sector

ResponsibleSteel™ is a multi-stakeholder initiative that has identified priority issues for the steel industry through extensive dialogue between steel companies, automotive companies (key customers), financial institutions and NGOs.

The dialogue led to the ResponsibleSteel™ standard that is based on 12 principles covering social, environmental and governance aspects:

1. Corporate Leadership
2. Management Systems
3. Occupational Health and Safety
4. Labour Rights
5. Human Rights
6. Stakeholder Engagement
7. Local Communities
8. Greenhouse Gas Emissions
9. Noise, Emissions, Effluent, Waste
10. Water Stewardship
11. Biodiversity
12. Decommissioning and Closure

ArcelorMittal has carried out ResponsibleSteel™ readiness assessments for our operations in Europe, and plans to roll out certification for all European Flat products sites.

Section 3 **Transparency and governance**

Our reporting

Our approach to reporting

Integrated reporting framework

This Integrated Annual Review 2019 describes the context for and progress of our business as the world's leading steel and mining company, and so outlines what the key considerations are in creating value for our stakeholders now and in the future.

Through this report we aim to reflect the guiding principles of the International Integrated Reporting Framework (IIRC). We detail the alignment with the IIRC framework in our Reporting Index.

"Along with members of the ARCGS Committee of the Board, I have reviewed this report and am satisfied that this 2019 Integrated Annual Review describes the context for and progress of our business as the world's leading steel and mining company, and so outlines what the key considerations are in creating value for our stakeholders now and in the future. I believe its content aligns with the principles and concepts of integrated reporting."

Lakshmi N. Mittal, Chairman and CEO

UN Sustainable Development Goals (SDGs)

There is significant alignment between our 10 SD outcomes and the 17 UN SDGs. We contribute to many of the SDGs and we have identified 10 SD outcomes and five SD themes through which we manage and provide oversight for our strategic response, as outlined on p.41.

EU directive on non-financial reporting

European Union law requires large companies to disclose certain information about the way they operate and manage social and environmental challenges. Directive 2014/95/EU lays down the requirement for disclosure of non-financial and diversity information by large companies. As a company registered in Luxembourg, we are guided by the Luxembourg implementation of the directive, using the IIRC framework to guide our reporting on risks and materiality.

Global Reporting Initiative (GRI)

We continue to report in line with the GRI across our reporting landscape, including this Integrated Annual Review, our ongoing online narrative reporting, and our local sustainability reports. We are now using their latest guidelines – GRI Sustainability Reporting Standards 2016 – and you can find details in our reporting index. Whilst we cover those Standards that are material on a global scale within this report, many more are material to stakeholders in certain countries, and most meaningfully reported within our country SD reports. Most of these used the GRI G4 guidelines in 2019.

"We have supported the United Nations Global Compact since 2008. This Integrated Annual Review serves as our communication on progress of our implementation of the 10 UN Global Compact principles."

Lakshmi N. Mittal, Chairman and CEO

Sustainability Accounting Standards Board

The Sustainability Accounting Standards Board (SASB) published a draft disclosure standard for the iron and steel industry in 2014, and launched their first public standard in December 2018. ArcelorMittal recognises the value of SASB's approach to create disclosures expectations based on the material issues for each sector, even if there is not full consensus as to what these are. For the first time in 2020, ArcelorMittal publishes an index to guide users to its disclosures according to the SASB Sustainability Accounting Standard for the iron and steel industry.

Reporting format

We believe that online reporting is the most practical and efficient way to communicate with the widest number of stakeholders, and we have produced this report as an interactive, downloadable pdf. To bring our Integrated Annual Review further in line with the IIRC principle of conciseness, we have focused the content on the progress of the year and our outlook; where appropriate, we signpost the reader to further information published elsewhere online.

Section 3 Transparency and governance
Our reporting

Scope, boundaries and methodologies

This Integrated Annual Review covers ArcelorMittal S.A. and its significant operating subsidiaries, excluding joint ventures and associates where we do not have operating control, except for those noted below. A list of these subsidiaries, joint ventures and associates can be found within our Form 20-F filed with the US Securities and Exchange Commission.

All data is reported for the period from 1 January to 31 December 2019. Our reporting cycle is annual, and the previous annual review and sustainable development report were published in April 2019.

Financial data – basis of presentation

Financial information has been extracted from the consolidated financial statements. The consolidated financial statements have been prepared on a historical cost basis, except for available-for-sale financial assets, derivative financial instruments, biological assets and certain assets and liabilities held for sale, which are measured at fair value less cost to sell and inventories, which are measured at the lower of net realisable value or cost and the financial statements of the Company's Venezuelan operations, for which hyperinflationary accounting is applied (see our Form 20-F). The consolidated financial statements have been prepared in accordance with International Financial Reporting Standards (IFRS) as issued by the International Accounting Standards Board (IASB) and as adopted by the European Union and are presented in US dollars with all amounts rounded to the nearest million, except for share and per share data.

Non-financial data – basis of reporting

We report on a large number of non-financial metrics in our SD performance table. The methodology behind the calculation and reporting of these indicators, and our reporting boundaries, are set out in our Basis of Reporting document.

Changes to scope and boundaries in 2019

Our 2019 performance data excludes any sites from our organisational perimeter from the date on which they were idled. See more information on our assets in our Form 20-F – Item 4D: Property, plant and equipment.

On June 30, 2019, ArcelorMittal completed the sale of the ArcelorMittal Italia remedies to Liberty House Group, namely ArcelorMittal Ostrava; ArcelorMittal Galati; ArcelorMittal Skopje; ArcelorMittal Piombino; ArcelorMittal Dudelange and several finishing lines at ArcelorMittal Liège.

Following acquisition, the German manufacturer, Münker Metallprofile GmbH came into scope as of June 4, 2019.

ArcelorMittal Shipping went out of scope as of December 31, 2019.

Details of changes in our scope of consolidation can be found in our Form 20-F – Note 2: Scope of consolidation.

Since 2018, we no longer report on absenteeism rate as a meaningful indicator of employee health.

Forward-looking statements

This review may contain forward-looking statements that represent the expectations, beliefs, plans and objectives of ArcelorMittal's management regarding its financial and operational performance in 2019 and beyond, and assumptions or judgements based on such performance. Future performance expectations are forward-looking and accordingly involve estimates, assumptions, judgements and uncertainties. Many factors may cause actual results or outcomes to differ materially from the expectations of our management. These risk factors are set out in the Form 20-F, filed each fiscal year with the US Securities and Exchange Commission.

Reporting Index

Our Integrated Annual Review 2019 aims to reflect the principles and guidelines of the International Integrated Reporting Council's integrated reporting framework, and the Global Reporting Initiative Sustainability Reporting Standards 2016. It also reflects how ArcelorMittal contributes to the UN SDGs, and serves as our 2019 communication on progress of our implementation of the United Nations Global Compact (UNGC) principles.

Details of how it meets these various frameworks can be found here.

Section 3 Transparency and governance
Our reporting

Assurance statement

We believe that independent assurance leads to quality and process improvements, and reassures readers and ArcelorMittal's management that the information we publish is accurate and material, and therefore contributes to building trust and credibility with key stakeholders.

This is the tenth year that our sustainable development reporting has received independent assurance.

In 2019, we asked our group non-financial auditors, DNV GL, to provide limited assurance on the following sustainability performance indicators, in accordance with the International Auditing and Assurance Standards Board's International Standard on Assurance Engagements – Revised (ISAE3000 Revised):

- Absolute CO_2e footprint (steel and mining) (million tonnes)
- Absolute CO_2e footprint (steel) (million tonnes)
- Absolute CO_2e footprint (mining) (million tonnes)
- Primary energy consumption (steel) (petajoules)

DNV GL provides an independent third-party assurance statement. This assurance covers the specified data in the Fact Book and on the relevant pages of this report.

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Independent Limited Assurance Report

to the Directors of ArcelorMittal Société Anonyme

DNV GL Business Assurance Services UK Limited ("DNV GL", "us" or "we") were engaged by ArcelorMittal Purchasing S.A.S. to provide limited assurance to ArcelorMittal Société Anonyme ("ArcelorMittal") over Selected Information presented in the ArcelorMittal Fact book 2019 (the "Fact book") for the reporting year ended 31 December 2019.

Our Conclusion

Our conclusion: Based on the procedures performed and the evidence obtained, nothing has come to our attention that causes us to believe that the Selected Information is not fairly stated and has not been prepared, in all material respects, in accordance with the Criteria.

This conclusion relates only to the Selected Information, and is to be read in the context of this Assurance Report, in particular the inherent limitations explained overleaf.

Our competence, independence and quality control

DNV GL established policies and procedures are designed to ensure that DNV GL, its personnel and, where applicable, others are subject to independence requirements (including personnel of other entities of DNV GL) and maintain independence where required by relevant ethical requirements. This engagement work was carried out by an independent team of sustainability assurance professionals. DNV GL holds other contracts with ArcelorMittal, none of which conflict with the scope of this work. Our multi-disciplinary team consisted of professionals with a combination of environmental and sustainability assurance experience.

Our Observations

Our observations and areas for improvement will be raised in a separate report to ArcelorMittal's Management. Selected observations are provided below. These observations do not affect our conclusion set out on the left.

- We note that ArcelorMittal has responded to our recommendation from last year's assurance process to review and update emissions factors, and have used an updated global warming potential for methane emissions this year.
- We found some of ArcelorMittal's Mining sites had misreported methane emissions data. The majority of these errors were corrected prior to publication by ArcelorMittal, however there could be a possibility that low materiality errors remain in the data. To improve data quality in the future, we recommend that ArcelorMittal provides additional training on environmental data reporting processes for sites within the Mining business.
- We recommend that the Basis of Reporting document is updated over the coming year to specify the requirements for environmental data reporting from power plants linked to integrated steel sites. We recommend that these requirements should be aligned to the approach taken for EU ETS reporting of Greenhouse gas (GHG) emissions.
- As noted in the Basis of Reporting, a small number of sites have been excluded from the scope of reported data. We restate our recommendation for ArcelorMittal to consider implementing an online database for improving the accuracy and completeness of environmental data. Such a system could reduce the risk of errors arising from manual manipulation of data, and from issues linked to the sale or acquisition of sites.
- A number of omissions and areas for improvement were identified in the Basis of Reporting document, which could potentially impact the consistency of how data is reported in the future. The majority of these changes have been addressed, and we understand that this document will continue to be updated during the coming year.
- Neither the Basis of Reporting nor the Fact book currently define the sites and legal entities covered by the data. We recommend that a list of sites and legal entities are included and also aligned with those used for 20-F reporting.
- ArcelorMittal may wish to consider a broader range of high materiality KPIs, for instance safety indicators, for external assurance in the future.
- We note ArcelorMittal's target to reduce CO2 emissions by 30% by 2030 within ArcelorMittal Europe – Flat Products. We recommend including the company's reported progress towards this target within the scope of next year's external assurance.

Selected information

The scope and boundary of our work is restricted to the 2019 Key Performance Indicators included within the Fact book (the "Selected Information"), listed below:

- CO2e intensity (steel) (tonnes CO2e per tonne of steel)
- Absolute CO2e footprint (total) (million tonnes)
- Absolute CO2e footprint (steel) (million tonnes)
- Absolute CO2e footprint (mining) (million tonnes)
- Primary energy consumption (steel) (petajoules)

To assess the Selected Information, which includes an assessment of the risk of material misstatement in the Fact book, we have used ArcelorMittal's Basis of Reporting (the "Criteria"), which can be found **here**. We have not performed any work, and do not express any conclusion, on any other information that may be published in the Fact book or on ArcelorMittal's website for the current reporting period or for previous periods.

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Standard and level of assurance

We performed a limited assurance engagement in accordance with the International Standard on Assurance Engagements (ISAE) 3000 revised – 'Assurance Engagements other than Audits and Reviews of Historical Financial Information' (revised), issued by the International Auditing and Assurance Standards Board. This standard requires that we comply with ethical requirements and plan and perform the assurance engagement to obtain limited assurance.

DNV GL applies its own management standards and compliance policies for quality control, in accordance with ISO/IEC 17021:2011 - Conformity Assessment Requirements for bodies providing audit and certification of management systems, and accordingly maintains a comprehensive system of quality control including documented policies and procedures regarding compliance with ethical requirements, professional standards and applicable legal and regulatory requirements.

The procedures performed in a limited assurance engagement vary in nature and timing from, and are less in extent than for, a reasonable assurance engagement; and the level of assurance obtained is substantially lower than the assurance that would have been obtained had a reasonable assurance engagement been performed. We planned and performed our work to obtain the evidence we considered sufficient to provide a basis for our opinion, so that the risk of this conclusion being in error is reduced but not reduced to very low.

Basis of Our Conclusion

We are required to plan and perform our work in order to consider the risk of material misstatement of the Selected Information; our work included, but was not restricted to:

- Assessing the appropriateness of the Criteria for the Selected Information;
- Conducting interviews with ArcelorMittal management to obtain an understanding of the key processes, systems and controls in place to generate, aggregate and report the Selected Information;
- Site visits to the following sites to review process and systems for preparing site level data consolidated at Head Office for the Selected Information listed on the previous page: ArcelorMittal Temirtau, Kazakhstan (steel); ArcelorMittal Lázaro Cárdenas Flat, Mexico (steel); ArcelorMittal Lázaro Cárdenas Long, Mexico (steel); ArcelorMittal Gent, Belgium (steel); ArcelorMittal Belval, Luxembourg (steel); ArcelorMittal Bremen, Germany (steel); ArcelorMittal Eisenhüttenstadt, Germany (steel); ArcelorMittal Abayskaya, Kazakhstan (mining); ArcelorMittal Kostenko, Kazakhstan (mining). DNV GL were free to choose the sites on the basis of materiality and their contribution to the Group's overall data.
- Planning a site visit to ArcelorMittal Fos-sur-Mer, France. Due to the impacts of COVID-19 this was not completed, however the exclusion of this site visit does not affect our conclusion set out above.
- Performing limited substantive testing on a selective basis of the Selected Information to check that data had been appropriately measured, recorded, collated and reported;
- Recalculating the Selected Information using suitable conversion factors and/or as established by ArcelorMittal's Criteria;
- Reviewing data at source and following this through to consolidated Group data;
- Reviewing that the evidence, measurements and their scope provided to us by ArcelorMittal for the Selected Information is prepared in line with the Criteria; and
- Reviewing the Fact book with regard to the Criteria.

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DNV GL Business Assurance Services UK Limited

London, UK
30 April 2020

Inherent limitations

All assurance engagements are subject to inherent limitations as selective testing (sampling) may not detect errors, fraud or other irregularities. Non-financial data may be subject to greater inherent uncertainty than financial data, given the nature and methods used for calculating, estimating and determining such data. The selection of different, but acceptable, measurement techniques may result in different quantifications between different entities.
Our assurance relies on the premise that the data and information provided to us by ArcelorMittal have been provided in good faith. DNV GL expressly disclaims any liability or co-responsibility for any decision a person or an entity may make based on this Independent Limited Assurance Report.

Responsibilities of the Directors of ArcelorMittal and DNV GL

The Directors of ArcelorMittal have sole responsibility for:

- Preparing and presenting the Selected information in accordance with the Criteria;
- Designing, implementing and maintaining effective internal controls over the information and data, resulting in the preparation of the Selected Information that is free from material misstatements;
- Measuring and reporting the Selected Information based on their established Criteria; and
- Contents and statements contained within the Fact book and the Criteria.

Our responsibility is to plan and perform our work to obtain limited assurance about whether the Selected Information has been prepared in accordance with the Criteria and to report to ArcelorMittal in the form of an independent limited assurance conclusion, based on the work performed and the evidence obtained. We have not been responsible for the preparation of the Fact book.

DNV GL Business Assurance

DNV GL Business Assurance Services UK Limited is part of DNV GL – Business Assurance, a global provider of certification, verification, assessment and training services, helping customers to build sustainable business performance.
www.dnvgl.co.uk/BetterAssurance

Published in May 2020

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