



Crescent Steel and Allied Products Limited



Building SUSTAINABLE VALUE

Corporate Responsibility Report 2022

CONTENTS

CEO Message	02
About the Report	04
About the Company	06
Sustainability Roadmap	09
Our Business	20
Business Model and Value Creation	26
An Overview of our Performance over the Years	30
Economic Performance	38
Stakeholder Engagement	42
Human Capital	48
Social Performance	68
Environment Performance	87
Product Stewardship	98
Material Consumption	100
Appendices	102



CEO MESSAGE

Being a good corporate citizen is not only the right thing to do, it is critical to the long-term success of our business.

I am pleased to present 2022 Corporate Responsibility Report. This report is now in its ninth edition since we first started formally reporting on our sustainability performance in 2013, covering ten years. The report supplements our Annual Report 2022 and reflects how the company's core values of safety, health, environment, quality, and transparency guide daily activities, and presents the information in perspective, reporting four to five years back in all areas. Going forward we intend to augment our annual reporting into one report that covers both our financial as well as our sustainability performance.

Reflecting on Crescent Steel's journey since our last sustainability report, I am reminded of the driving force behind our decisions and actions - our purpose. Our purpose serves as the link between our business strategy and our commitment to remaining competitive while also contributing to greater economic, environmental, and social prosperity.

Energy and water security is essential to economic and social development and have a profound impact on lives everywhere. Planned projects to augment the country's pipeline infrastructure - particularly for the transportation of imported fuels - and much-needed water and sanitation projects are, therefore, material for both, our business as well as for sustained growth and development in Pakistan.

Incorporated in 1983, we commenced commercial production in 1987 with an API licensed line pipe manufacturing unit about 100 KM from Karachi, in Nooriabad. Today, we operate four independent business sectors in the engineering, textile, power, and capital markets sectors. Our strategic thrust, however, remains in the engineering sector.

Our flagship operations manufacture and coat large diameter steel line pipes, used for hydrocarbons transportation in the energy cycle. Pipes transport oil and gas, safely across rivers and mountains, through towns and villages. Communities and the environment rely on long-term integrity of pipelines, to ensure their well-being. Large diameter steel pipes are also used for transportation of water and wastewater systems, and for piling in the construction of ports, jetties and buildings.

We understand that our industry and Company can have a profound impact on people's lives.

As I write this note, the dynamics of trade and in particular, energy and steel markets are going through dramatic disruption amidst global geo-political and economic turmoil and, Pakistan faces growing humanitarian crisis left by the crippling floods that swept away homes and livelihoods for millions of Pakistanis. To add to this, Pakistan faces extreme economic challenges that are spilling over and making the operating environment increasingly difficult.

We find ourselves confronting this new reality, adapting our supply chain and our commercial strategy to an unprecedented level of volatility, uncertainty, and low demand. At the same time, we are making contributions to support the people displaced by the floods.

Despite the challenges faced, the past fiscal year was a pivotal one. Emerging from the pandemic crisis and into a climate catastrophe that caused widespread damage, allowed us to see more clearly the vital role we play in building essential national infrastructure and promoting development throughout Pakistan.

At the close of the outgoing fiscal year, we were in the advanced stages of negotiating a contract award for the K-IV water project that will supply 2.6 mgd to Karachi through a 120 Km pipeline and at the time of writing this note, we have commenced production on this order which is expected to be completed by the end of calendar year 2023. This pipeline has been in plan for a long time and in addition to providing reliable water supply to Karachi, the modern pipeline will eliminate seepage and evaporation losses that one sees in the traditional open canal system.

During the year we supplied 92.04 Km aggregating 5,082 tonnes of high quality bare and coated line pipes and applied line pipe coatings of 95,377 square meters at a capacity utilization¹ of 14.1% and 18.1%, respectively. We also added a grid tied Solar Power System with a capacity of 565 kWh, which is now approved for net metering from the DISCO - this will help us in minimizing energy costs particularly during periods of idling.

Over the last few years, demand for line pipes remained low as planned projects for the supply of imported RLNG and national infrastructure augmentation were put on hold. Given current circumstances and the stresses in the energy sector, we expect some of this demand to trickle through over FY23-24, triggering demand of about 600 Kms of line pipe in the medium term.

Our business is tightly linked with development; as with all development, it goes through cycles of feast and famine. To buffer the periods of famine, we have built a strong corporate structure, including ancillary revenue wallets and cash flow buffers.

Our business line in secondary steel manufacturing, operating as an independent business unit Crescent Hadeed, manufactures high quality steel billets by processing steel scrap through induction melting and continuous casting process. Our billets are used as inputs by steel re-rolling operations to produce a range of steel construction products. We feel there is ample room for growth in this sector as Pakistan's per capita consumption of steel - 49 Kgs is significantly lower than the world average and regional peers. Pakistan's annual Steel consumption is however around ~11 million metric tonnes as against a gross production of ~3.8 million metric tonnes, indicating massive room for growth in this segment. Pakistan is an importer of raw iron and steel scrap - the primary raw materials used in steel production. Steel is critical for industrial progress, infrastructure development, and construction-related projects in a developing country like Pakistan.

Our billet manufacturing unit has a planned capacity of 85,000 tonnes per annum; during the year the unit manufactured and sold 17,707 tonnes of high-quality steel billets for use in the construction segment- plant capacity utilization for the year stood at 20.83%.

Today our engineering segment businesses cater to local demand for steel line pipes and steel long products; both of which are imported as final products to meet local demand-supply gaps.

Our successes mean a durable and sustainable, energy and water infrastructure for Pakistan and sustainable indigenous sources of steel raw material.

Adjacent to this unit is a 16.5 MW bagasse-fired thermal co-generation plant that generates and supplies energy and steam. During the year, the unit produced and sold 24,724 MW of energy, of which 12,171 MW was supplied to Crescent Hadeed and 208,635 tonnes of steam, of which 21,213 tonnes were reused to generate additional power of 1 MW. The division also holds investments in a 100 MW solar park through a wholly owned subsidiary, Solution de Energy (Private) Limited. The project aims to develop, own, operate, and maintain a 100 MW solar power project in Solar Power Park, established by the Government of Punjab in the Cholistan desert. The Company has been granted a Letter of Interest (LOI) by the Punjab Power Development Board (PPDB) and on completing LOI conditions, the Company has been allocated and granted an electricity generation license from National Electric Power Regulatory Authority (NEPRA) for its 100MW Solar Power Plant.

We also operate a cotton-spinning unit that produces high quality yarn for supply for the manufacturers of textile products. Our spinning operations produced 5,688 tonnes of yarn at a capacity utilization of 89.93% during FY22.

Through our portfolio management division, we remain active investors in Pakistan's capital markets. Our investment portfolio provided Rs. 2,059 million in working capital support (both

through investment income and through access to debt capital) to our core operations. During the year the unit contributed loss of Rs.153 million to the Company's Loss after tax and 18% to the LPS of Rs.8.34. However, it may be noted that the division has contributed Rs. 935 million to Company cashflows. On a standalone basis portfolio ROIs stood at (12.94)% and (3.19)% for CSAP and CSCL portfolios respectively.

On a consolidated basis, our balance sheet footing is Rs. 9,469 million, and the Book Value of the Company stands at Rs. 90.48 - a 36-year CAGR of 7.32%. During the fiscal year 2022, the Company posted aggregate revenue of Rs. 8,241 million, of which Rs. 6,588 million constituted payments to suppliers. Rs. 59.0 million was donated towards various causes that we support. Of the community investments we made, 85% constitute support for causes working towards an educated Pakistan. Rs. 1,631 million were paid in taxes and levies to the national exchequer, while Rs.252 million constituted payments to lenders.

We posted a loss after tax of Rs. 648 million as on 30th June 2022. We employ a diverse workforce with varying skill sets across 6 locations; on average, we had 769 people in employment during the outgoing fiscal year, receiving compensation and benefits of Rs. 526 million during the year.

From our earliest beginnings, our commitment has always been to deliver quality products responsibly, efficiently, and economically, and in doing so to make positive contributions to our community, provide fair returns to our shareholders and a desirable workplace for employees.

As a long-term industrial concern, our values are rooted in sustainable principles. Since we opened our first mill in Nooriabad in the 1980s to the start-up of our state-of-the-art steel melt shop in Bhone in 2016, with all our acquisitions and expansions during this time, we have grown with the communities where we work and live, have remained invested in the overall well-being of Pakistan, minimizing our environmental footprint and being a reliable partner for suppliers and customers.

I am proud that our entire leadership team displays an unwavering commitment to ethical business practices that are insisted upon from managers and the leadership team. Our Core Values and Governing Principles articulate our collective belief that all aspects of our Company's business should be conducted based on standards of honesty, openness, fair play, and decency. These principles were adopted before any Code of Corporate Governance was mandated on a publicly listed Company and before the Company was listed in 1987. They still serve as Crescent Steel's North Star, informing our thinking, behaviors, and expectations around doing what is right and responsible for our business and for all Crescent Steel stakeholders.

This demands the highest ethical standards, a culture of care embodied by safety first, a commitment to environmental stewardship, strong relationships with all our stakeholders, and the discipline and focus to stay the course in good times and bad. At Crescent Steel, we are proud of what we have been able to accomplish over the last 35+ years, and we look forward to the opportunities in front of us to continue to make a lasting difference.



AHSAN M. SALEEM

Chief Executive Officer

*Based on notional pipe sizes

ABOUT THE REPORT

This report, now in its ninth edition, complements our Annual Report 2022 and covers our performance in detail along with highlights of our financial performance for fiscal year 2022.

OUR PRIORITIES AND LEARNING FROM STAKEHOLDERS

We are responsible corporate citizens and strive to build and enhance value for all stakeholders. This includes maximizing returns for our shareholders, enhancing our product offerings and efficiency, keeping our people motivated and satisfied, practicing our business in a sustainable way to do our part in contributing to society and managing the impact of our operations.

Our approach to CSR branded as “Crescent Cares” has consistently witnessed higher engagement and appreciation of our efforts for a more universally sustainable future. We regularly collect key stakeholder feedback, both formally and informally, to determine where we stand and to ensure that we build a sustainable business with lasting positive impacts in all areas of our operations.

SCOPE AND BOUNDRY

We started formally reporting on our corporate responsibility performance in 2013. To do this we developed a reporting manual based on Global Reporting Initiatives reporting guidelines, which we augment to remain updated with GRI's latest sustainability reporting standard 2016 and to strengthen our internal and external reporting mechanisms. This report covers the performance of all business operations across five distinct Business Units and two wholly owned subsidiaries.

PERIOD COVERED

The report covers fiscal year 2022; content that describes efforts outside this period is indicated in the respective sections.

FINANCIAL AND NON-FINANCIAL REPORTING

This report complements our Annual Report and covers our non-financial performance in detail, along with highlights of our consolidated¹ financial performance for the fiscal year 2022. Financial reporting as well as our Risks and Opportunities Report (AR 2022 page 72) that discusses factors that impact our ability to deliver value to stakeholders is covered in detail in our Annual Report 2022.

REPORTING FRAMEWORK AND DATA COLLECTION

The report has been developed based on the Global Reporting Initiative's (GRI) - core option and ICAP's Sustainability Report Evaluation Criteria. Where standards have not been defined, they have been reported on management's best estimates using globally accepted methodologies and assumptions. The report also draws from guidelines of the Integrated Reporting Framework and showcases our contribution to the UN Sustainable Development Goals.

The Sustainability Action Team comprising representatives from each of our business units and across all core shared services functions, is responsible for maintaining respective data on an online database. We capture and consolidate sustainability-related data across all areas of our operations at each monthly close.

All material topics, which are of interest to different stakeholders, and which reflect significant impacts of our activities on economy, environment, and society are included in this report. There are no changes that can significantly affect the comparability of data from period to period. Previous years' figures may have been regrouped/rearranged wherever found necessary to conform to this year's classification.

To ensure accuracy and transparency in reporting, we have engaged our Internal Auditors to have our corporate responsibility reports reviewed; however, this remains a pending action to date on account of capacity gaps in sustainability reporting consulting and assurance.

Editorial Policy	Corporate Responsibility Report is a way for us to share information on our sustainability-related activities with stakeholders. This year's report reviews the progress and results achieved in the fiscal year 2022, focusing on the Company's approach and sustainability strategies on the management of economic, social, human and natural capitals.
Organization	Crescent Steel and Allied Products Limited and its subsidiary companies. Significant location of operations is Pakistan with the head office situated in Karachi.
Referenced Reporting Guidelines	This report has been prepared in accordance with the Global Reporting Initiative (GRI) Standards: Core option
Reporting Cycle	Annual; (1 st July 2021 to 30 th June 2022)
Reporting Period	Financial year 2022 (1 st July 2021 to 30 th June 2022)
Date of the Previous Report	Corporate Responsibility Report 2021, issued May 31st, 2022.
Date of Previous Report Audit (Internal/ External)	The Company's Corporate Responsibility Reports have never been audited by a third party and largely follow a self-audit theme.
Point of Contact and Feedback	For queries and clarifications on this report, please contact us at: sustainability@crescent.com.pk or at info@crescent.com.pk
Available Online	The report is available online at https://crescent.com.pk/wp-content/uploads/2022/10/CSAPL-CRR-Report-2022.pdf

² Consolidated financial reporting reflects equity accounting impacts on the balance sheet – these would otherwise reflect on the Company P&L in standalone reporting.

ABOUT THE COMPANY

VISION, MISSION AND VALUES

Our Mission, Vision and Core Values are the Driving Force of the Strategy Setting Process

Vision

To excel across all our operations and deliver sustainable value to all stakeholders.

Mission

- Grow and enhance company value and pursue new growth opportunities.
- Maintain cost and quality leadership in an internationally competitive environment.
- Promote the best use of human talent in a safe environment, as an equal opportunity employer.
- Conduct business as a responsible corporate citizen and support local communities in areas where we operate.

Core Values

Our core values are at the heart of our business – they define who we are, how we work, what we believe in, what we stand for, how we act and how we expect to be treated as part of Crescent Steel.



INTEGRITY

Consistently doing the right thing

Being ethically unyielding and honest in the way we conduct business.



OWNERSHIP

Acting with stewardship

Building a better, stronger and more dynamic organization.



CUSTOMER FOCUS

Leveraging relationships for out-performance

Delivering value through responsiveness to internal and external customers.



CONTINUOUS IMPROVEMENT

Continuous improvement gives us competitive advantage

Fostering collaboration, innovation and, creativity as individuals and as teams.



COMMUNITY CARE

Social responsibility is at the heart of our business

Facilitating social equity in communities where we operate.

GROUP STRUCTURE

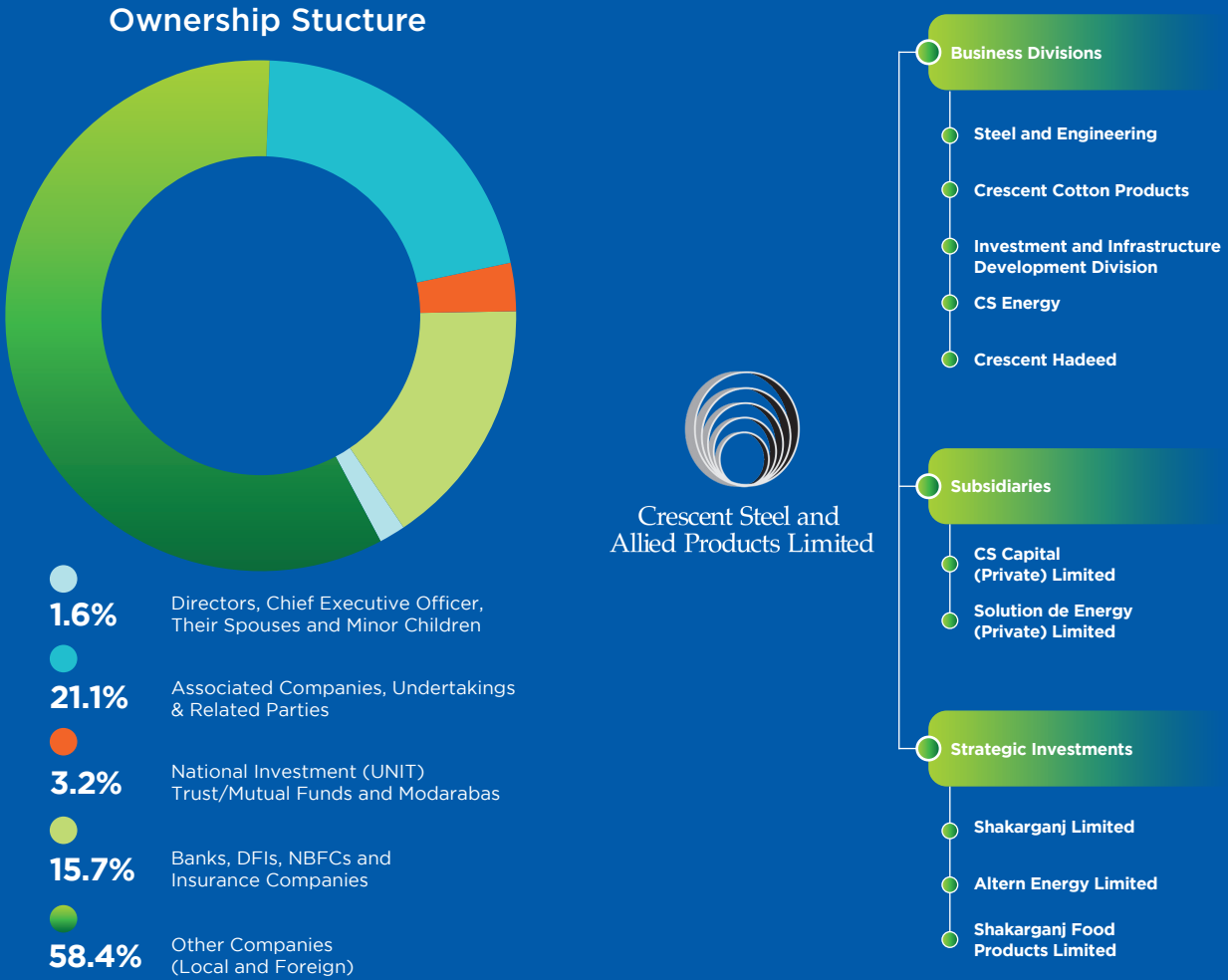
Our business operations are structured as separate business units and as subsidiary units within Crescent Steel.

The Company operates five divisions: Steel and Engineering, Crescent Cotton Products, Investment and Infrastructure Development (IID), CS Energy and Crescent Hadeed.

The Company also has two wholly owned subsidiaries: CS Capital (Private) Limited and Solution de Energy (Private) Limited. CS Capital forms part of the IID Division as a standalone investment holding company while Solution de Energy holds strategic investments in a 100 MW Solar Park project and forms part of the CS Energy division.

Additionally, the Company holds strategic investments in energy through investments in Altern Energy Limited (17.5% minority stake) which translates into investments in energy of 53 MW. As such the Company’s aggregate investments in power production, including own source power, stands at 184.5 MW.

A detailed organisation structure is covered separately on Page 26 of our Annual Report 2022.

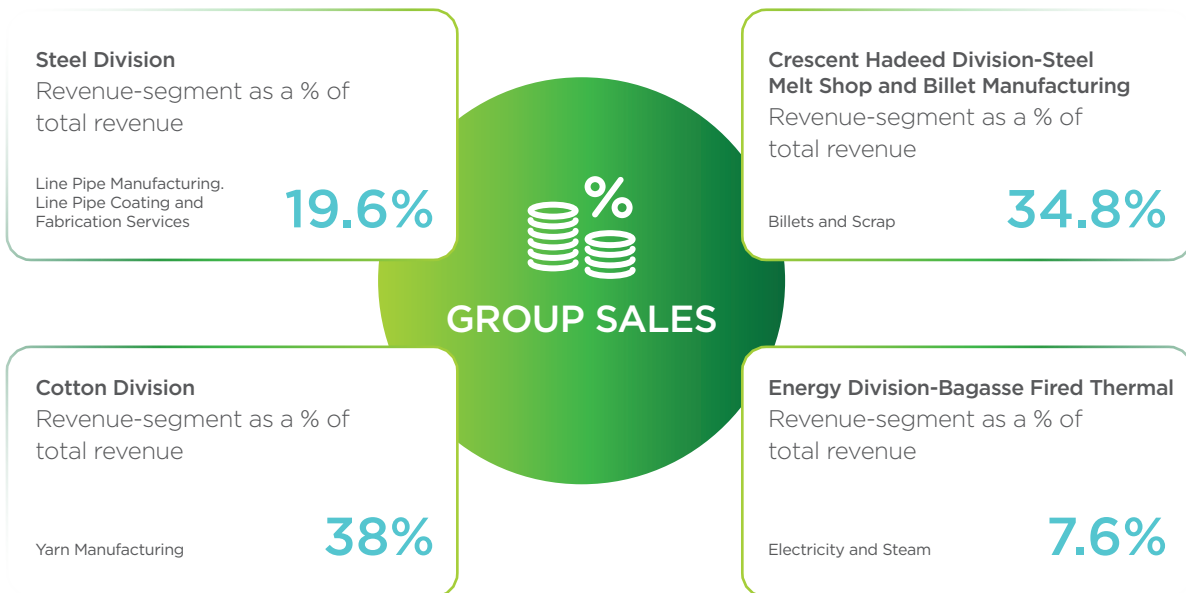


TWENTY TWENTY TWO AT A GLANCE

Today's accomplishments for a better future

Revenues	Capex	Cash generated from operations	LBITDA	Loss After Tax	
8,241 (Rs. in million)	94.5 (Rs. in million)	74.2 (Rs. in million)	325.6 (Rs. in million)	647.2 (Rs. in million)	
Bare Pipe Production	Line Pipe Coating	Machinery and other Equipment	Steel Billets Production	Yarn	Energy
5,082 t	95,377 meters	981 Units	17,707 t	5,687.5 t	89,008 GJ
Total Sales	A dividend from associated undertaking	GHG Emissions Intensity	Customer Satisfaction Index (Steel) (Out of 100)	Employee Satisfaction Index (Out of 5)	Water recycled / reused
7,090 (Rs. in million)	1,183.4 (Rs. in million)	0.00016 MT CO ₂ /MT	96%	3.77	42.30%

* All figures are on consolidated basis as on 30 June 2022



SUSTAINABILITY ROADMAP

OUR APPROACH TO SUSTAINABILITY

STRATEGY

Sustainability has always been a core component of our business strategy and continues to form the foundation of long-term business success. Reporting on sustainability performance brings transparency and provides a strategic picture of our business, explaining how we create and sustain value now and in the future.

Our Corporate Strategy is geared towards sustainable and organic growth to enable long-term success and health of our businesses. As a business, we are driven by calculated risks and financial gains; but as an organization, we are guided by a clear conscience of coexistence and our conduct anchored on integrity, is in continuous pursuit of undisputed trust and reputation as a safe, responsible, and reliable corporate citizen.

We use sustainability principles to drive process innovation, new product development, improve manufacturing efficiencies and reduce material and energy consumption. Our strategy, objectives, goals, and commitments towards business sustainability are mentioned in the relevant sections of this report; a detailed overview of our Corporate Strategy and Objectives is available on page 09 of the Annual Report 2022.



MATERIALITY

ASSESSMENT METHODOLOGY

We use the Global Reporting Initiative (GRI) reporting framework to inform our definition of sustainability, materiality, and in identifying issues material to our business.

Materiality assessment is periodically reviewed using a self-developed materiality assessment toolkit that ranks issues in terms of significance (significant, high, medium and low) and relevance (yes or no). Our goal is to understand which corporate responsibility issues are most likely to affect Crescent Steel's business strategy now and in the future. We use the following indicators to select issues that will have the greatest impact:

- Relevance of the issue
- Impact on the Company and Business
- Importance and relevance to stakeholders

We rank the list of sustainability issues (which have been derived from the GRI standards) in terms of relevance and significance to Crescent Steel and its stakeholder groups (ranking for stakeholder groups is based on management's best estimates), assess Crescent Steel's performance and strategy plan on these issues and, estimate the impact of non-performance in these areas. As a Company operating multiple business units across four distinct sectors, impact is financially linked to Company sales.

Consolidated scores on each aspect form a materiality matrix. The matrix provides an initial understanding of issues which are of primary importance today, and those that Crescent Steel considers an opportunity and a responsibility in the future.

Ranking corporate social responsibility issues (derived from the GRI's topic specific standards) by individual business units, and service area leaders, enables us to assess Crescent Steel's performance and in developing future strategic plans related to these issues; while simultaneously monitoring the current progress of the issues at hand. The matrix provides us with an overview, enabling greater visibility on future opportunities and emphasizing areas of importance in the context of what is material to the sustainability of our business today.

The sustainability aspects we report are aligned with the risks identified in the Risk and Opportunity Report section of our Annual Report 2022. This report along with sustainability reporting in the past, discloses our management of, and performance in, aspects considered to be material to our business.

REVIEW AND IDENTIFICATION

We last reviewed our materiality assessment in FY20 to evaluate changing economic, environmental, and social impacts and to recognize stakeholder expectations regarding our performance, strengths, and weaknesses.

In alignment with our strategy which is reviewed annually for a three-year term we target to review our materiality assessment once every three years. The triennial materiality review, which includes examining each sustainability aspect according to its level of risk to the Company, the level of stakeholder interest and its relevance, has identified 16 key sustainability issues in economic, environmental, and social aspects. All deserve focus, but seven priority issues had emerged as focus areas for fiscal years 2021-2023 which we have carried forward to 2022-2024; these are further defined later on in this section.



ECONOMIC

Economic Performance
Indirect Economic Impact
Procurement Practices
Market Presence



ENVIRONMENTAL

Energy
Materials
Effluents and Waste
Water

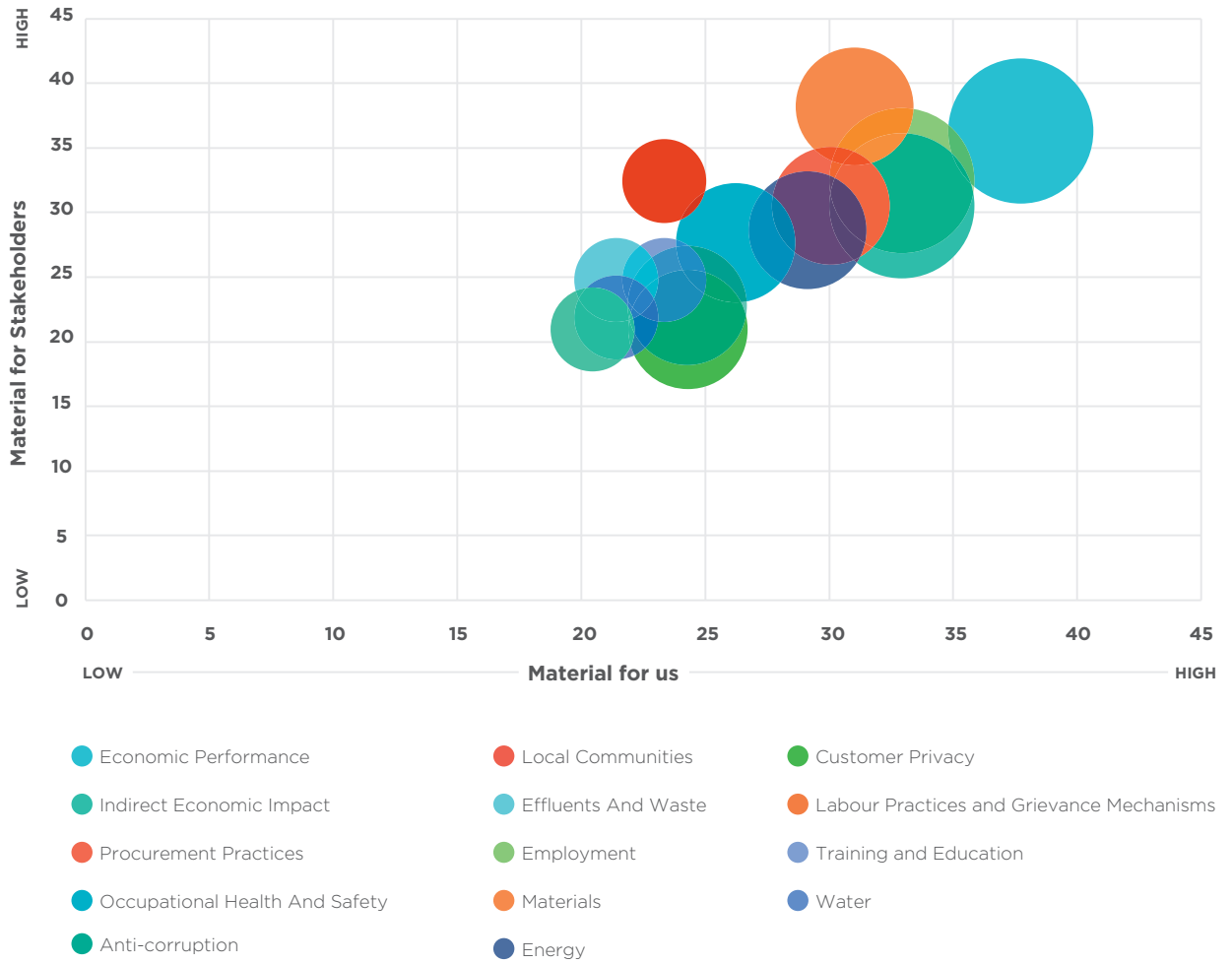


SOCIAL

Employment and Labor Relations
Health and Safety
Customer Privacy
Anti-Corruption
Labor Practices and Grievance Mechanisms
Local Communities
Training and Education
Compliance

The outcome of this analysis can be seen in the graph.

MATERIALITY MATRIX



MATERIAL ASPECT AND BOUNDARY IDENTIFICATION

The impact of every material aspect, inside and outside the organization is measured based on management best estimate and analysis using the materiality toolkit. These impacts are being reported for the seven items we consider material to our business sustainability over the next three years.

Moreover, the concern of stakeholders and limits of the boundary for disclosures are considered in accordance with GRI industrial characteristics and industry experiences. The reporting principles of GRI Standard - GRI 101 Foundation 2016, have been utilized to report on the significance and distinguishing limits for material issues.

We continuously identify and survey any threats to our businesses and consider the opinions and advice of our stakeholders seriously, to understand fully, the importance of the sustainability of our operations.

The company uses GRI standards' and concepts of materiality to report on any material information. Understanding and setting a threshold for our material aspects play an important role in the interest of our business and stakeholders. Regular performance reviews, integrated monitoring of processes, and persistent consultation from our stakeholders are all pivotal for the evaluation of material aspects.



Aspect	Material Issue	Material Aspect	GRI Indicator	Boundary Inside	Boundary Outside
Economic	Revenue generation through sales and distribution of wealth to internal and external stakeholders.	Economic Performance	GRI 201-1	CSAPL	Community, Shareholders, Government
	Corporate Responsibility Performance i.e. Cash, Kind and Time contributions/ Community Investments. Focus areas i.e. Education, Health and Environment.	Indirect Economic Impacts	GRI 203-2	CSAPL	Community, Government
	Company's strategic direction enhances business opportunities through local suppliers to contribution in economic development.	Procurement Practices	GRI 204-1	CSAPL	Our Suppliers, Community, Government
Environmental	Environmental impacts in view of use of non-renewable resources for energy production.	Energy	GRI 302-1	CSAPL	Community
	Depleting raw material resources affecting finite resources.	Materials	GRI 301-1	CSAPL	Suppliers, Community
Social	Compliance with laws and regulations leads towards better productivity in line with diversified workforce.	Employment and Labor Relations	GRI 401-1	CSAPL	Community
	Productivity of an organization is directly related to workers health and safety to deliver the best product to consumer.	Occupational Health and Safety	GRI 403-1	CSAPL	Community

OUR CONTRIBUTION TO THE UNITED NATIONS SUSTAINABLE DEVELOPMENT GOALS (SDGs)

We map our contributions to the United Nations Sustainable Development Goals (SDGs) to remain aligned with global goals on sustainable practices at the organisation, team and individual levels.





From the commencement of our operations, our commitment has always been to deliver quality products, efficiently and economically, minimising the negative impacts of our operations, contributing to the communities where we operate, providing fair and consistent returns to our shareholders and a desirable workplace for our employees where they are assessed and rewarded with fairness.

Our contributions towards the UN SDGs are listed below, however our focus remains on SDG 4, 8 and 12:

SUSTAINABLE DEVELOPMENT GOALS	OUR (GOALS)/STRATEGY	HOW WE HAVE CONTRIBUTED OVER FISCAL YEAR 2022
 <p>End poverty in all its forms everywhere</p>	<ul style="list-style-type: none"> - To promote social entrepreneurship and tertiary education to enhance the employability of our people and of Pakistanis at large. -Empowering through education. -Contributing to social safety nets such as education for all, healthcare access and relief. 	<ul style="list-style-type: none"> -Topped up the Expendable Endowment Fund to sponsor tertiary education of CSAP school graduates from TCF. -Provided counselling to TCF students during Crescent Cares Week and the Rahbar Program. -Collaborated with NUST to promote social entrepreneurship by sponsoring their initiative - Finding Innovative and Creative Solutions for Society (FICS). -Disbursed the first tranche of donation to Habib University for a named scholarship pledge to support tertiary education of a TCF alumni for the entire degree program. -Sponsored tertiary education for students at IVS by contributing to the financial assistance / scholarship fund. -Donated Rs. 3,413,500 to community partners in health for free healthcare access and free of cost hepatitis treatments. -Manage a scholarship scheme for children of employees with 4 active scholars . -Educate 2,470 children through 15 TCF school units supported by us with an annual estimated pass out of 352 and 155 from primary and secondary schools, respectively . -Average pay increase to eligible employees in FY21 stood at 13.95% and for FY22 it stood at 21.72% - much higher than the industry averages of 8% and 12%.
 <p>End hunger, achieve food security and improved nutrition and promote sustainable agriculture</p>	<p>Contribute towards food security and distribution programs/centers.</p>	<ul style="list-style-type: none"> Our employees volunteered for iftar distribution drives organized by The Robin Hood Army. Through the drive we were able to feed approximately 200 individuals at old age homes and orphanages. All excess food from the Head Office Mess is distributed to underprivileged in the surrounding area.

SUSTAINABLE DEVELOPMENT GOALS	OUR (GOALS)/STRATEGY	HOW WE HAVE CONTRIBUTED OVER FISCAL YEAR 2022
 <p>Ensure healthy lives and promote well-being for all at all ages</p>	<p>Promote a healthy Pakistan by catering to basic health care needs of the people through awareness campaigns and initiatives while contributing financial support leading to a hepatitis free Pakistan.</p>	<p>In collaboration with The Health Foundation, a Hepatitis C screening drive was organized for Nooriabad employees.</p> <p>Sponsored Hepatitis B and C vaccinations in the Tando Allahyar District, Inayat Shah Rizvi area in collaboration with The Health Foundation.</p> <p>With the help of The Health Foundation, 5,471 people were screened for hepatitis B and C and 277 new cases of hepatitis C were registered during the year.</p> <p>Sponsored chemotherapy sessions of 285 cancer patients in collaboration with the Indus Hospital and Health Network.</p> <p>Donated 18,500 ml of blood through the Indus Hospital Blood Drive held during the year.</p> <p>In collaboration with the Indus Hospital and Health Network, awareness sessions on breast cancer and the benefits of blood donation were organized for Crescent Steel employees.</p> <p>Sponsored treatment of patients at Jinnah Postgraduate Medical Centre (JPMC) in collaboration with the Patients' Aid Foundation.</p>
 <p>Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all</p>	<p>Our mandate is to build an educated Pakistan through a focus on primary education.</p> <p>We selectively support programs for tertiary education, especially when those resources may be absorbed into our businesses.</p>	<p>Our contributions helped educate 2,479 TCF students and 5 deaf students at Deaf Reach in 2022.</p> <p>Provided scholarships to 4 children of our employees.</p>
 <p>Achieve gender equality and empower all women and girls</p>	<p>We are committed to providing equal opportunities and are gender-blind in our recruitment. We ensure that the workplace is rewarding, safe and comfortable for all employees.</p>	<p>In 2022, 19% of our employees across our corporate offices were females. 20% of the Executive Management Team and 6% of the management roles were filled by women.</p>
 <p>Ensure availability and sustainable management of water and sanitation for all</p>	<p>We aim to conserve, reuse and recycle water at every opportunity.</p>	<p>We reused 41.97% of water consumed in 2022 across all our campuses.</p>
 <p>Ensure access to affordable, reliable, sustainable and modern energy for all</p>	<p>To manage our energy consumption, reduce our dependency on the national grid and mitigate the risk of recurring power outages.</p>	<p>We continue to conserve energy through various means and advocate to develop a culture of energy conservation in the organization.</p>

SUSTAINABLE DEVELOPMENT GOALS	OUR (GOALS)/STRATEGY	HOW WE HAVE CONTRIBUTED OVER FISCAL YEAR 2022
 <p>Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all</p>	<p>We aim to provide equal growth opportunities to our people and encourage them to innovate, discuss and present new ideas.</p>	<p>We employ a staff of 769 people across our locations and strive to provide the right resources and an environment that supports their growth and development needs.</p> <p>We continue to retain standard certifications (ISO 14001:2015 and ISO 45001:2018) and encourage a strong safety-first culture with a mission zero goal alignment</p> <p>We hold sessions to inform employees about better financial planning, savings and more.</p>
 <p>Build resilient infrastructure, promote inclusive and sustainable industrialization and foster innovation</p>	<p>We support sustainability advancement and transformational change across our business and use the best technology to make our operations environment friendly.</p>	<p>All our emissions and discharges are compliant and within the prescribed limits set by the National Environmental Quality Standards (NEQS).</p> <p>As a part of our continued commitment to our stakeholders, we work hard to mitigate the environmental impact of our operations</p>
 <p>Reduce inequality within and among countries</p>	<p>We provide equal opportunities to grow and encourage innovation and new idea generation.</p>	<p>Our businesses continue to provide equal opportunity employment to hundreds of citizens across Pakistan. Our priority towards society and people are effectively integrated with our business offering and how we work on a day to day basis.</p> <p>In 2022, 3% of our workforce consisted of minorities and for the Head Office minorities constitute 8% of the workforce</p>
 <p>Make cities and human settlements inclusive, safe, resilient and sustainable.</p>	<p>We strive to make a meaningful impact in the communities where we operate.</p>	<p>The line pipes we supply are used in hydrocarbon transmission to businesses and households across the country. This year we have supplied 4,241 km in quality line pipes to major utilities of the country.</p> <p>We also ensure that we hire people from localities near our operations, as far as reasonably possible and in line with business requirements. Over the last year, 86% of new entrants represent rural communities and 84% of our total workforce is from rural Pakistan.</p> <p>Contributed to Citizens Police Liaison Committee's monthly expenditures to play our part in providing a safer city for all.</p> <p>Provided operational support to TCF for running 10 CSAPL sponsored TCF campuses.</p> <p>Topped up the Non-Expendable endowment fund being maintained by TCF in order to eventually make the school units built by us self-sustainable or to utilize it for a new school unit</p>

SUSTAINABLE DEVELOPMENT GOALS	OUR (GOALS)/STRATEGY	HOW WE HAVE CONTRIBUTED OVER FISCAL YEAR 2022
 <p>Ensure sustainable consumption and production patterns</p>	<p>To minimize wastage by reducing material consumption as far as reasonably possible.</p>	<p>Our products contribute significantly towards import substitution and towards a sustainable energy and water infrastructure for Pakistan. 4,241 km of transmission pipelines in Pakistan use pipes produced by us.</p> <p>We seek to ensure that as far as possible we practice reuse, where reuse is not possible, we ensure proper disposal of waste matter in accordance with local regulations imposed on us and international best practices. Disposal methods include landfilling, recycling, and incineration.</p>
 <p>Conserve and sustainably use the oceans, seas and marine resources for sustainable development</p>	<p>We strive to conserve natural resources by partnering with WWF.</p>	<p>Mangrove forests serve as a valuable nursery for fish and other invertebrates. To date we have planted 3,700 mangroves which have reduced our carbon footprint by 63.24 tonnes.</p>
 <p>Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss</p>	<p>We strive to support marine conservation and environmental advocacy activities.</p>	<p>During the year, we planted 13,142 trees. Over the years our plantation size has increased to over 43,300+ trees. These trees will help reduce our carbon footprint by 256 tonnes annually.</p> <p>Sponsored Ayesha Chundrigar Foundation's Mass Trap-Neuter-Vaccinate Release (TNVR) Program against which 100 dogs were neutered and vaccinated.</p>
 <p>Promote peaceful and inclusive societies for sustainable development, provide access to justice for all and build effective, accountable and inclusive institutions at all levels</p>	<p>We strive to promote sustainable business practices throughout our value chain.</p>	<p>Sponsored a study by Pakistan Centre for Philanthropy (PCP) on the State of Philanthropy in Pakistan being conducted jointly with the Dean of the Pardee School of Global Studies at Boston University.</p> <p>Through our business, we increase stability, improve economic prospects and contribute socially and economically towards the community.</p>

SUSTAINABLE DEVELOPMENT GOALS



2,215
Million in wealth distribution



123,719
tonnes of bagasse and 35,760 tonnes of steam used to generate 27,031 MW renewable power. 945 GJ of renewable power produced through solar panels



18,500 ml
of blood donated



92.04
KM of quality line pipes delivered



Supported
2,479
TCF students



13,142
trees and 1,000 mangrove saplings planted



19%
female representation across our corporate offices



108,340
GJ of self-generated electricity, 5,082 tonnes of steel pipes and 17,707 tonnes of steel billets produced.



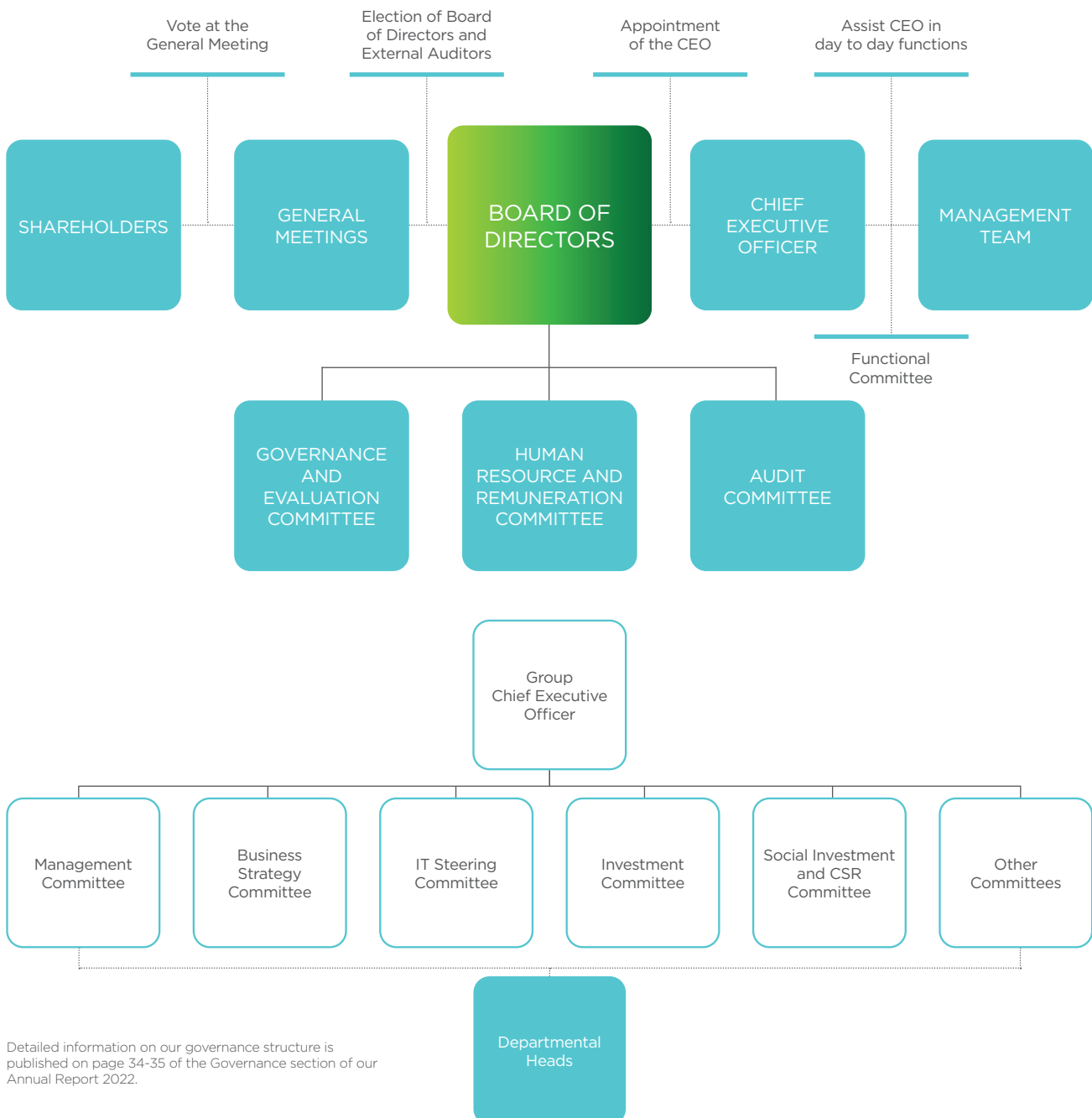
10.53
million Liters of water reused



CORPORATE GOVERNANCE

Crescent Steel conducts its business in a responsible manner and with honesty, integrity and in line with best practices. We also have the same expectations from all those with whom we have relationships. We insist on doing what is right, and this sets the tone of our actions and underpins the functioning of our employees. We also insist that all transactions be open, transparent and within the legal framework culminating in responsible financial reporting.

OUR GOVERNANCE STRUCTURE



Detailed information on our governance structure is published on page 34-35 of the Governance section of our Annual Report 2022.

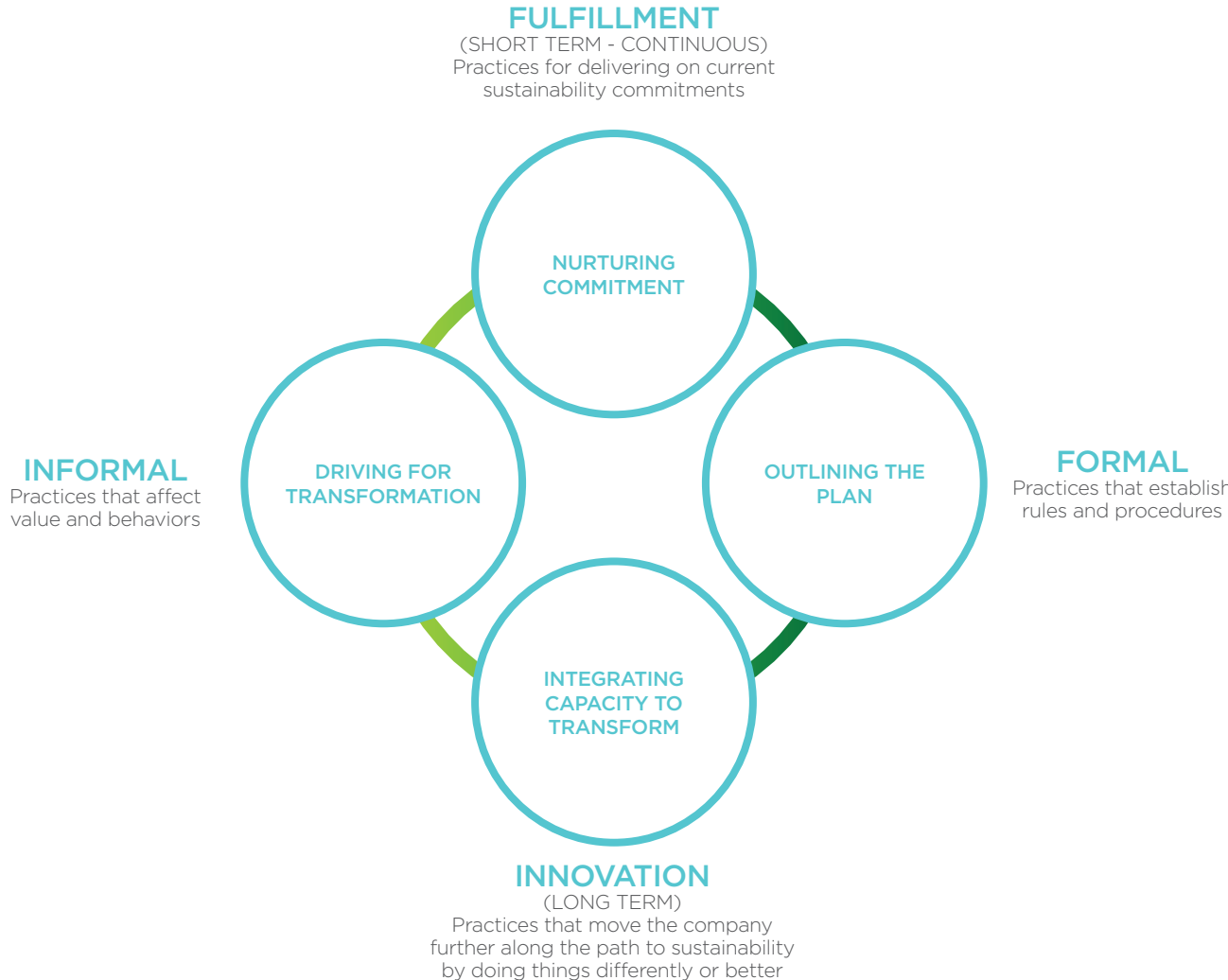
MONITORING AND EVALUATION

We have consciously chosen not to introduce an independent monitoring process to evaluate performance on sustainability objectives because our sustainability and corporate strategies and objectives are essentially the same. The way we manage our business helps to ensure performance on sustainability objectives is monitored through various systems already in place. These systems monitor performance at a corporate, BU, team and at an individual level.

- Monthly reporting to management by each Business Unit on sustainability factors and KPIs (linked with GRI disclosures)
- Aligning our people with our values and guiding principles
- Engage employees in corporate responsibility for collective action
- Governance and transparency
- Encouraging innovation and communication
- Strengthening internal communication
- Fostering a culture of collaboration
- Monitoring and informing stakeholders of our corporate responsibility performance

SUSTAINABILITY CULTURE

Action plans with formal and informal initiatives help guide us in sustaining a culture of responsible actions - some of our planned actions include:



OUR BUSINESS

The success and growth of our business benefits all along the value chain: the government, our suppliers, our customers, their customers, service providers, utilities, infrastructure owners, investors, and more.

Crescent Steel incorporated in 1983 as a steel line pipe manufacturing business, today is a conglomerate listed on the Pakistan Stock Exchange with diversified business units operating in four defined sectors; engineering, textiles, capital markets, and power. The Company's operations are spread across six campuses in Sindh and Punjab with headquarters in Karachi and a liaison office in Lahore.

STEEL DIVISION

The Steel Division operates three plants across two campuses, a Pipe Manufacturing and Coating Plant in Nooriabad, Sindh and, a Machinery Fabrication Plant (Shakarganj Engineering) in Dalowal, Punjab. The pipe plant operates two Spiral Pipe (SP) production lines, specializing in large diameter spiral submerged arc welded steel line pipes. The Coating Plant applies flow efficient and anti-corrosion, external and internal pipe coatings on steel line pipes. The unit is also capable of applying weight coatings. Shakarganj Engineering fabricates machinery and equipment for the Sugar, Cement, Power and Engineering industries, including our own manufacturing units.

LINE PIPE MANUFACTURING

The Spiral Pipe Plant has the capability of manufacturing high-quality steel pipes in the diameter range of 8 inches -120 inches (219 mm - 3,048 mm) with wall thickness up to

25 mm and material grades up to API 5L X-100. The unit's pipe production capacity is 200,000 metric tonnes per annum.

The notional annual capacity for production based on a single shift of eight hours is 66,700 tonnes. Both plants are capable of operating for 24 hours at an annual plant capacity of 200,000 tonnes per annum. The notional pipe size is taken as diameter size of 30 inches with 12 inch thickness for SP-1600 and diameter of 40 inches with 58 inch thickness for SP-2003.

The actual production achieved during the year was 5,082 tonnes (FY21: 15,400 tonnes) of line pipes in varied sizes and thickness, in 198 extended shifts i.e. total production of 2,370 hours. Actual production is equivalent to 28,205.6 tonnes [FY21: 52,113 tonnes] when translated to the notional pipe sizes.

Hot-rolled coils (HRC) are processed and converted into Submerged Arc Welded Helical Seam Line Pipes. If required, internal and/or external coatings of high-density polyethylene are applied and line pipes are supplied primarily to public utility companies for use in the national oil and gas transmission network and, to other customers.

SUPPLY CHAIN BARE LINE PIPES



HR Coils and consumables are imported from steel manufacturers and inspected for specs and quality parameters.



Crescent Steel procures and processes HR Coils that pass quality testing, to manufacture steel line pipes.



Bare steel line pipes, are tested for quality and are either dispatched to customers or processed for coating.



Steel line pipes are primarily used in transmission pipelines in the oil, gas, and water sectors. These line pipes are also used in construction, usually as piles at ports and jetties.

LINE PIPE COATINGS

Crescent Steel is one of the first in the country to introduce anti-corrosion and flow efficiency internal and external pipe coatings with a state of the art external coating line in 1992.

External coatings include Multi-Layer Polyolefin Coating, Fusion Bonded Epoxy Coating, Tape Coating, and Liquid Epoxy Coating while internal coatings include Anti-Corrosion Epoxy Coatings, Flow Efficiency Coating (FEC) and Cement Lining.

We carry the capability to coat steel line pipes ranging from 4 inches - 60 inches (114 mm - 1,524 mm), tape coatings on pipe diameter above 60 inches (1,524 mm) and internal epoxy coatings on diameters ranging from 8 inches - 60 inches (219 mm - 1,524 mm).

The annual notional capacity of the plant works out to 600,000 square meters based on 14-inch diameter pipes operating single ten-hour shifts. We coated 95,377 meters [FY21: 30,528 meters] of different pipes. 96,677 square meters surface area [FY21: 22,587 square meters surface area] was achieved during the year over 533.5 hours of production, translating into a capacity utilisation of 18.1%.

ENGINEERING UNIT

SUPPLY CHAIN INDUSTRIAL EQUIPMENT

The Engineering Unit established in 2005 and located in Dalowal, Punjab was acquired by Crescent Steel in 2009.

The workshop fabricates machinery and spare parts on design specifications it owns, or as provided by the customers, for various local industries especially in the food and cement sectors. The raw material, mainly metal sheets, is procured and converted into industrial equipment.

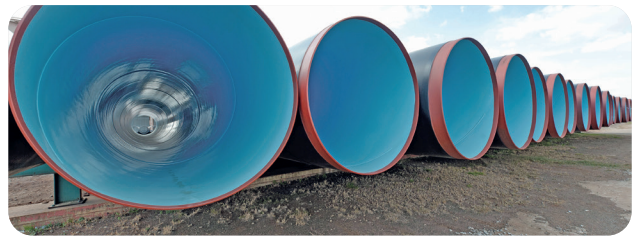


The engineering unit workshop fabricates and mills industrial machinery and equipment as per design specifications

SUPPLY CHAIN INTERNAL AND EXTERNAL PIPE COATINGS



Crescent Steel receives bare pipes from clients/Crescent Steel's line pipe manufacturing unit.



External and/or internal coating is applied to bare pipes and pipes are tested for quality.



Coated pipes help improve flow efficiency, reduce material and energy use, enhance durability and help manage future costs better.



Metal sheets and other raw material is procured



Fabricated equipment is used by customers in the sugar, cement and other industries.

This unit was leveraged in the commissioning of our steel melting and billet manufacturing unit and supplied key infrastructure and equipment to the plant including the fabricated components of the continuous casting machine, overhead cranes, vibro-feeders and furnace

hoods. Most recently the unit has fabricated and supplied key components to our line pipe coating and manufacturing units enabling us to augment capacity for higher diameter sizes.

<ul style="list-style-type: none"> • Cane Shredders 	<ul style="list-style-type: none"> • Juice Heaters, Vapour Juice Heaters 	<ul style="list-style-type: none"> • Evaporators with Stainless Steel Multi-jet Condensers
<ul style="list-style-type: none"> • Batch and Continuous Vacuum Pans 	<ul style="list-style-type: none"> • Crystallizer “U” shape & Vertical 	<ul style="list-style-type: none"> • Centrifugal Machines • Stainless Steel Spray Clusters for Spray Pond
<ul style="list-style-type: none"> • Stainless Steel Deep Bed Filters 	<ul style="list-style-type: none"> • Hydraulic Tilting Trolleys for Cane Harvesting 	<ul style="list-style-type: none"> • Perforated Plates and Vibro Screens for Paper Plants
<ul style="list-style-type: none"> • High Voltage Transformer Tanks 	<ul style="list-style-type: none"> • High-Pressure Boilers 	<ul style="list-style-type: none"> • Fabrication and Erection of Steel Structure of Hood Duct Line with Chimney for Air Pollution Control
<ul style="list-style-type: none"> • Fabrication and Erection of Steel Structure of Continuous Casting Machine with Ladle and Tundish 	<ul style="list-style-type: none"> • Fabrication and Erection of Steel Structure of Hood Duct Line with Chimney for Air Pollution Control 	<ul style="list-style-type: none"> • Compact Imported Type Vibratory Scrap Feeders for Steel Plants
<ul style="list-style-type: none"> • Fabrication and Erection of Steel Furnace with Structure and Chimney having 275 Feet Height for Glass Factory. 	<ul style="list-style-type: none"> • Fabrication of Furnaces for Pipe Coating Plants, • Diabolo Rollers with structure for Pipe Plant. 	

CRESCENT HADEED DIVISION – BILLET MANUFACTURING UNIT

The unit manufactures G-40 and G-60 steel billets in ASTM 615 standards specifications, through a steel induction melting and continuous casting process.

Re-rolling mills use our billets to manufacture reinforced steel bars, angles, channels, sections, and other steel products for use in the construction and engineering sectors. The unit was set up with the mission to provide high-quality, sustainable steel construction materials for national infrastructure development requirements.

The plant operates in two shifts of 12 hours each with an annual production capacity of 85,000 metric tonnes in various widths and a standard length of 6 meters.

The Company manufactured 17,707 metric tonnes [FY21: 20,950 metric tonnes] of billets. Owing to power constraints, the unit operated only for about four months on self-generated (inter division) power supply that was only available during crushing season. Production was suspended for the remaining eight months of the fiscal year because of no alternative power supply arrangements. We expect that it will remain in-operational over fiscal year 2023 as well.

SUPPLY CHAIN STEEL LONG PRODUCTS



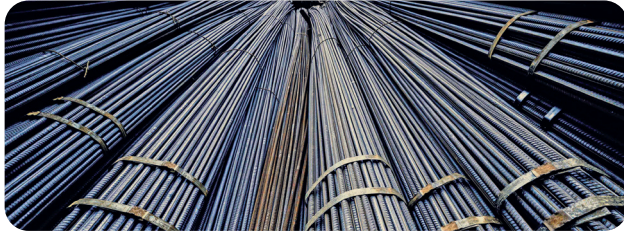
Steel scrap and alloys are imported/procured locally for melting and processing



Secure reliable power sourced from CS Energy



Billets are produced through a steel melting and ladle refining process. These billets are sold to re-rolling mills and converted to rebar



Re-rollers convert the billets into rebar and other long products.



Rebar/long products are used in the construction of buildings, dams, bridges, housing, and other infrastructure development projects.

CRESCENT COTTON PRODUCTS

Crescent Cotton Products, acquired in 2000, is the textile division of the Company, located in Jaranwala, Punjab. The unit is registered with Ministry of Textile Industry Pakistan and is a member of All Pakistan Textile Mills Association (APTMA).

Specializing in producing high-quality cotton/synthetic and blended carded yarn equipped with Slub, Siro and Compact attachments CCP operates 19,680 spindles and has a production capacity of 385 bags per day.

SUPPLY CHAIN COTTON YARN



Farmers grow and harvest cotton crop. Raw cotton balls are picked and sold to ginners

The unit is equipped with modern high-tech European and Japanese machinery ensuring high-quality yarn processing, in counts from 10s to 31s.

The plant capacity converted to 20s count polyester cotton yarn based on three 8-hour shifts per day, for 1,092 shifts is 9,197,007 kilogram. Actual production converted into 20s count was 8,546,895 kilograms for 1,092 shifts [FY21: 8,790,199 kilograms for 1,092 shifts] - a capacity utilisation of 89.93%.

The Supply chain for cotton apparel is complex. Farmers grow and harvest cotton. Raw cotton is sold by farmers to the ginning industry where cotton lint is separated from seeds and trash. Ginned Cotton is sold through agents in the local and international markets to spinning mills. We obtain cotton lint in bulk from cotton agents and convert it to yarn based on global standards and purchase synthetic polyester staple fibre (PSF) from local and foreign producers. The fibre is produced through a continuous polymerization process and available in different cut lengths from 32 mm to 51 mm, procured as per requirements. Viscose is imported from different countries including Indonesia, China, and India or purchased from local producers and stockists.

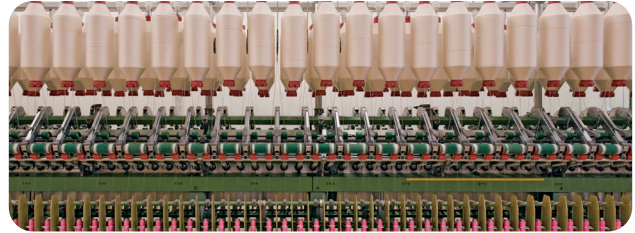
The yarn we produce at Crescent Cotton Products is sold to fabric Manufacturers who weave or knit the yarn into the fabric and sell it for further processing to garment manufacturers.



Ginners separate lint from seeds and other materials



Middle market of lint cotton (agents / intermediaries)



Crescent Cotton Products procures cotton and synthetic fibre from local agents / manufacturers and international suppliers. The cotton and synthetic fibre is mixed and spun into various counts



Yarn is sold to weaving and knitting units that convert yarn into fabric



Fabric is dyed or printed for finishing



Crescent Cotton Products purchases fabric for onward exports to garment manufacturers



Garment manufacturers design and manufacture the fabric into finished product



Retailers / whole sellers sell garments



Consumers use final product

CS ENERGY - ENERGY DIVISION

The primary function of this unit is to generate and supply electricity for own source consumption and to customers and distribution companies, as permitted. Initially equipped with a 15 MW co-generation, thermal generation power plant at Bhone, Punjab, the unit commenced commercial operations in December 2014. The unit also employs a 16.5 MW condensing and extraction turbine to process steam during off-season periods to ensure uninterrupted supply to our billet-manufacturing unit throughout the year. The thermal co-gen plant uses bagasse in the combustion process to produce power and process steam. Bagasse, a by-product of sugar cane processing, is an alternate and renewable source of power. CS Energy purchases bagasse and uses it as a fuel to generate electricity and steam. The condensing turbine processes surplus steam to generate energy. During the year 123,719 tonnes of bagasse [FY21: 106,485 tonnes], 217,272 tonnes of water [FY21: 213,589 tonnes] and 208,635 tonnes of steam [FY21: 206,030] were used for the generation of 24,724 MWh of renewable power [FY21: 27,031 MWh] of which 12,171 MWh [FY21: 13,971 MWh] was supplied to Crescent Hadeed, and 11,988 MWh [FY21: 12,236] was supplied to Shakarganj Limited-Bhone and Captive Load 565MWh [FY 21: 824MWh]. While 187,422 tonnes [FY21: 170,270 tonnes] of low-pressure steam was also supplied to Shakarganj Limited - Bhone

SUPPLY CHAIN ENERGY



Sugarcane grown and harvested by local farmers



Sugar mills procure and process sugarcane



Bagasse is produced as a by-product



CS Energy buys bagasse and produces electricity and steam



Steam is supplied to Shakarganj and power is supplied to Crescent Hadeed, Shakarganj, and FESCO

SOLAR ENERGY INVESTMENTS

Solution de Energy which was a fully owned subsidiary of CS Energy (Private) Limited, is now a fully owned subsidiary of CSAPL, post amalgamation of CS Energy (Private) Limited and CSAPL.

The principal activity of the Company is to build, own, operate and maintain a 100MW solar power project in Solar Power Park, being established by the Government of Punjab in the Cholistan desert.

The project aims to generate, accumulate, distribute, sell and supply electricity/power to Pakistan Electric Power Company (PEPCO) / Distribution Companies (DISCOS) under the agreement with the Government of Pakistan or to any other consumer as permitted.

The Company had been granted Letter of Interest (LOI) by the Punjab Power Development Board (PPDB) and been allocated land from PPDB and the interconnectivity study report was vetted and approved by National Transmission & Dispatch Company (NTDC) . Further, the Company has been granted electricity generation license from National Electric Power Regulatory Authority (NEPRA) for its 100MW Solar Power Plant and the Company has submitted the tariff petition to NEPRA on July 22, 2020.

Capitals Engaged

Financial Capital	The financial assets available to Crescent Steel	
Owner's Equity	Rs.7,025 million	
Net Worth	Rs.7,025 million	
Total Debt	Rs. 1,113.3 million	
Manufactured Capital	The raw materials, plant and machinery and infrastructure required to manufacture goods	
5 Manufacturing Facilities	Capacity	
2HSAW Steel Pipe manufacturing lines	200,000 Tonnes (Notional) Core Raw Material: Hot Rolled Coils	
Coating Plant	600,000 square meters (Notional) of various line pipe coatings Core Raw Material: Epoxy, HDPE	
Billet Manufacturing Plant and Steel Meltshop	85,000 tonnes Core Raw Material: Steel Scrap	
Yarn Spinning Unit	19,680 spindles	
Power Plant	15MW (Co-generation, thermal generation power plant) 16.5MW (condensing and extraction turbine) Core Raw Material: Bagasse	
1 Container Yard	2 Offices	
Intellectual Capital	Organisational knowledge, licenses, systems, brand equity	
Systems and Processes	Strong management systems, detailed procedures and a strong Internal Audit function	
Tacit Knowledge and Knowledge Sharing	Strong knowledge base, legacy staff, sharing personal and professional experiences	
Brand Value and Reputation	Customer focus, reliability and product quality	
Company Culture and Values	Workplace environment, strong performance culture, open door policy, high levels of employee engagement and focus on core values in day to day work	
Corporate Governance	Transparency, focus on corporate governance beyond regulatory requirements	
Strategies	Ability to position ourselves in industry, strong management team	
Human Capital	The Knowledge, skills and expertise of our people.	
Number of Employees	769 (170 in management and 599 shop floor personnel)	
Strong Leadership	Highly qualified management team	
Highly Skilled Engineers Technical Staff	Technically strong team at manufacturing sites	
Positive Employee Relations	<ul style="list-style-type: none"> - High performance culture - Regular communication - Open door policy - Annual Employee Opinion Survey 	
	<ul style="list-style-type: none"> - Annual engagement sessions with community partners - Reward programs - Competitive pay and benefits 	
Complex Supply Chain	<ul style="list-style-type: none"> - Strong supplier relationship management - Sourcing technically complex API grade steel and managing inland logistics - Quality Assurance and customer focus 	
Social and Relationship Capital	Crescent Steel's relationships with stakeholder groups	
Collaborative Partnership	<ol style="list-style-type: none"> 1. The Citizens Foundation 2. Indus Hospital 3. World Wide Fund (WWF) 4. The Health Foundation 5. Citizens Police Liaison Committee 6. Shaukat Khanum Memorial Cancer Hospital and Research Centre 7. Pakistan Centre for Philanthropy 8. COMMECS Institute of Business and Emerging Sciences 9. Deaf Reach 	<ol style="list-style-type: none"> 10. Sindh Institute of Urology and Transplantation 11. Layton Rahmatullah Benevolent Trust 12. The Robin Hood Army 13. National University of Science and Technology 14. Indus Valley School of Art and Architecture 15. Habib University 16. Patients Aid Foundation 17. Ayesha Chundrigar Foundation
Strong Customer and Industry Partnership	<ul style="list-style-type: none"> - Annual Voice of Customer Survey - Regular engagement with Engineering Development Board (EDB) - NSAC and other industry bodies - Strong partnership with Employers' Federation of Pakistan (EFP) 	
Engagement with Govt and Regulators	<ul style="list-style-type: none"> - Full compliance towards all legal and regulatory asks - Strong engagement with SECP - Engagement with relevant ministries and government bodies when needed 	
Natural Capital	Natural resources used in the value chain	
Energy and Fuel through Conventional and Renewable Resources	<ol style="list-style-type: none"> 1. National Grid 2. Bagasse 3. Gas 4. Steam 5. Solar 	
Energy Efficiency	<ul style="list-style-type: none"> - Energy efficient machinery, motors and electronics (including inverter HVAC and LED lighting) - Natural lighting interventions for conservation 	
Water	<ul style="list-style-type: none"> - Water treatment before discharge - Reusing water where possible - Sources include groundwater and municipal supply 	

OUR BUSINESS MODEL

BUSINESS CONTEXT

EXTERNAL VARIABLES IMPACTING VALUE

- Exchange rate volatility: PKR/USD
- Increasing inflationary pressures
- Rising cost of funds
- Volatility in the Pakistan Stock Exchange (PSX)
- CPEC associated energy and infrastructure projects
- National water and energy infrastructure projects and, infrastructure development in general
- Fluctuation in global commodities markets, especially steel (raw material) and political instability

OUR MATERIAL RISKS

- Rupee devaluation
- High inflation and high interest rate environment
- Policy hurdles in critical raw material imports
- Increase in raw material costs and other input costs
- Disruptions in planned infrastructure projects
- Geo political instability



MARKETING AND SALES

- Relationship Management and Sales
- Participation in Tenders
- Demand Planning
- Market Development and Needs Assessment



PROCUREMENT

- Raw Material Imports
- Inbound Logistics
- Relationship Management
- Demand Planning

OUR PROFIT BLUEPRINT

REVENUES

- Sales of bare and coated line pipes
- Coating of customer supplied line pipes
- Manufacturing pipes with customer supplied HRC
- Sales of cotton and synthetic yarns
- Sale of power and steam to steel melt shop and utilities
- Sale of billets to distributors and rerolling mills
- Portfolio gains on trading, dividend income and returns from strategic investments
- Rental income and gains on real estate appreciation

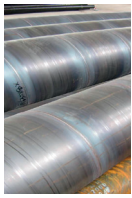
COSTS

- Procurement of raw materials, consumables, machinery, spares and parts
- Purchase and maintenance of equipment and facilities
- Investments in management and employees
- Costs of financial capital
- Negative exchange rate impacts
- Taxation
- Supplier and support services costs
- Regulatory and compliance costs

<p>Revenue</p> <p>-2% to Rs. 7.09bn</p>	-	<p>Cost of Sales</p> <p>6% to Rs. 7.16bn</p>	=	<p>Gross (loss) / profit</p> <p>-113% to PKR -0.07bn</p>	+	<p>Income from investments - net</p> <p>-158% to PKR 0.21bn</p>	-	<p>Distribution cost</p> <p>4% to PKR 0.02bn</p>	-	<p>Administrative expenses</p> <p>32% to PKR 0.33bn</p>	-	<p>Other operating expenses</p> <p>131% to PKR 0.06bn</p>	+	<p>Other income</p> <p>-69% to PKR 0.06bn</p>
---	---	--	---	--	---	---	---	--	---	---	---	---	---	---

Our business operates five divisions in four distinct industry segments. The flagship unit manufactures and coats steel line pipes primarily for Oil and Gas transmission and as a result sales in this segment are subject to volatility in line with the pace of development projects - our businesses in other areas provide us buffer to periods of low business in our flagship operations.

OUR PRODUCTS AND OUTPUTS (PAGE REF 20-25)



Spiral Welded Line Pipes and Line Pipe Coatings
Sectors Served: Oil, gas, (transmission) energy, water and sanitation



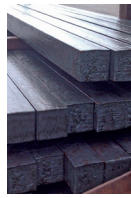
Steel scrap
Sectors served: Engineering Steel remelting units



Quality Assurance Laboratory
Outputs: Quality Reduced turn around times



Bio-energy/ Renewable Energy and Steam
Sectors Served: Manufacturing units



Steel Billets and Ancillary Waste
Sectors served: Engineering, Steel Product manufacturers, metal recycling and construction



PV and PC Yarn
Sectors served: Textile Manufactures

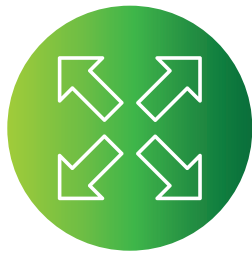


MANUFACTURING AND PROCESSING

Production

Quality Control

Quality Assurance



DISTRIBUTION

Inspection

Outbound Logistics

CUSTOMER AND SUPPLIERS

- Reliable partner for quality line pipes and line pipe coatings for the oil, gas and water transportation and construction segments
- Supply of quality polyester cotton yarn to weaving and knitting units
- Income stream and strong partnerships with suppliers
- Supply of energy and steam to businesses including our own units
- Supply of quality steel billets for re-rolling/rebars
- Active investor in Pakistan

SHAREHOLDERS

- Consistently deliver value
- Reasonable returns from well managed operations, through acquisitions and organic growth

VALUE PROPOSITIONS

EMPLOYEES

- Comprehensive compensation and benefit plans
- Employee development
- Innovate and grow
- Employee Engagement

SOCIETY

- Contributing towards development through the supply of quality line pipes for energy and water infrastructure projects, billets for construction materials
- Contributing to an educated and skilled Pakistan
- Supporting healthcare access
- Advocating for environmental protection, conservation and climate action

Capitals Engaged

Impacts and Outcomes

Financial Capital



Delivering sustainable returns
- 10 Year ROE: (9.2)%
- 1,653 million wealth distributed
- Turnover: Rs. 7,089.9 million
- Supplier payments: Rs. 6,588 million
- Finance Costs: Rs. 251.7 million

Manufactured Capital



Generating long term returns through investments in plant, machinery and equipment to maintain and enhance capacity and quality of output
- Bare Pipes produced: 5,082 tonnes at capacity utilisation of 26% and 92.04 KM of quality line pipes delivered to customers
- Coating application: 22,587 sq meter at capacity utilisation of 4.32%
- 981 units of various machinery and related fabrication
- Billets produced: 17,707 tonnes at capacity utilisation of 24%
- 5,687.51 tonnes of Yarn produced at capacity utilisation of 89.93%
- 24,724 MW Electricity Generation plant's installed production capacity 118,856 MWh

Natural Capital



Protecting the environment through reduced impacts
Our manufacturing operations produce air and other pollutants including waste which may lead to negative environmental impacts. Similarly energy is consumed in the sourcing, manufacturing and delivery of goods - we seek to reduce our impacts and have:
- Installed Energy Efficient Machinery and Equipment
- Installed Air Pollution Controls
- Reused 10.53 M Liters of Water
- Generated 24,724 MW of Renewable Power from 123,719 Tonnes Of Bagasse, 217,272 Tonnes of Water And 21,213 Tonnes of Steam
- Generated 102,480 GJ of Own Source Power
- Planted 13,142 + Trees and Mangroves Saplings
- Installed 584.2 Kwh of Solar Power Capacity

Human Capital



19% female representation across our corporate offices

Paid Rs 526 million in salaries and wages, 67% of PBT

Provided 3,002 hours of training to enhance workforce skills

A thriving culture for our people

Generating value through skilled, motivated and well cared for employees; ensuring fair labor practices

A safe working environment and conducive human resource management and compensation policies.

Investing in targeted training and development for technical and management personnel

Social and Relationship Capital



Creating value for the communities we operate in through investments in education, health and the environment
- Spent Rs 58.96 m in donations to causes we support
- 10,500 ml blood donated
- 1,749 hours of volunteering time contributed by employees
- 21 community partners engaged during the year
- Continued to support an educated Pakistan by supporting 2,408 TCF students and providing 13 higher education scholarships for TCF grads and children of our employees
- 2,088 people vaccinated against Hepatitis

Maintaining positive and productive relationships with employees, suppliers, shareholders and other stakeholders
- Employee Satisfaction Score: 3.77
- Customer Satisfaction Score: 94%
- Key Suppliers Evaluated: 100%

Intellectual Capital

Investments in innovative systems and resources; ensuring effective resource allocation i.e. placing the right roles by leveraging management systems and corporate culture

=	▲	-	▲	+	=	-	=
	Operating profit / (loss) before finance costs		Finance costs		Share of profit in equity accounted investees - net of taxation		(Loss) / profit before taxation
	-182% to PKR -0.62bn		18% to PKR 0.25bn		-78% to PKR 0.09bn		-185% to PKR -0.79bn
						-	=
						204% to PKR 0.14bn	Profit/(loss) for the year
							-182% to PKR -0.65bn

THE CAPITALS

AND VALUE CREATION

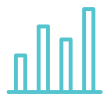
“We strive to develop a sustainable value chain by maximizing outputs from all forms of capital we deploy in our business process”

At Crescent, we look at everything through the lens of value creation because it strengthens our financial well-being and competitive positioning. We use the capitals at our disposal to deliver sustainable performance and augment value for all stakeholders. In addition to the economic value we generate, it captures our inputs, outputs, and impacts across the value chain which includes our customers, suppliers, employees, the community at large and the environment.

For a detailed business model that illustrates how we leverage our capitals for value creation please refer to page 26.

THE CAPITALS

Guided by the International Integrated Reporting Framework, we use the following forms of capitals to assess our position in industry, map the value creation in our business cycle and, the sustainability of our business operations.



FINANCIAL CAPITAL

Generating Funds

We generate our financial capital from current business operations and through financing from lending partners to support our working capital needs and to finance growth and investments in other forms of capital.



MANUFACTURED CAPITAL

Leveraging Infrastructure to ensure Quality Delivery

We continuously invest in our production units, our corporate offices and operational processes to ensure operational efficiency, workplace safety, product quality and reliability and, to grow responsibly.



HUMAN CAPITAL

Our Differentiator Strengthening Skill

We invest in skills development, collective knowledge, training, and organization health to drive performance excellence. Our operating ethos is focused on the safety, health, fair pay, competency enhancement and overall well-being of our employees.



SOCIAL AND RELATIONSHIP CAPITAL

Our Legacy as a Responsible Corporate Citizen

We believe in building long-term high impact relationships with stakeholders and ensure the impact of our operations is minimized in communities where we operate. We remain fully compliant with all applicable regulations, treat people fairly, are transparent in how we work and actively invest in causes we support.



INTELLECTUAL CAPITAL

Knowledge-Based Intangibles that make us Competitive

We have a strong culture guided by our values that fosters learning and values performance. Our management and information systems are robust; we gather and incorporate regular feedback from stakeholder groups to position ourselves better and meet stakeholder needs; our internal controls and monitoring systems ensure the relevance and strength of our management systems.



NATURAL CAPITAL

Voluntary Commitment for Environmental Stewardship

We use raw materials, water, energy, waste and track our contributions to GHG emissions. We also seek to minimize the environmental impacts of our operations, such as discharge of emissions, wastewater and effluents. We also actively advocate for environmental protection and care.

OUR APPROACH TO BUSINESS- CREATING VALUE

As a conglomerate with businesses diversified into four defined sectors; engineering, textiles, capital markets, and power, we are committed to offering high quality value added products and to providing equal employment opportunities that contribute to sustainable economic and social value.

DRIVERS FOR SUSTAINABLE VALUE CREATION

Our priorities are areas where our business intersects most closely with society, and where we can create the most value and make the most difference. Our business model is structurally strong; we focus on operational quality and strive to create value by maintaining our leadership position, through innovation in production and processes, by leveraging the technical expertise of our people and the diversity of our portfolio of businesses. We have a strong corporate culture that

underpins a strong commitment to the wellbeing of our people and the environment, institutional learning and continuous improvement through best practice benchmarking, knowledge sharing and technology. Our position as responsible corporate citizens with demonstrated ability to deliver consistent returns and a healthy balance sheet strengthens our access to capital and, to markets.

CREATING VALUE FOR SUSTAINABLE DEVELOPMENT

As a responsible corporate citizen, we map contribution to the following SDGs, with particular focus on SDG 4, SDG 8 and SDG 12.



AN OVERVIEW OF OUR PERFORMANCE OVER THE YEARS

AN OVERVIEW OF TWENTY TWENTY-TWO



ECONOMIC

2022

- Standalone EPS: Rs. 4.72; Consolidated LPS: Rs. 8.34
- ROE: (9.2%)
- Total sales of Rs. 7,089 million with a gross loss margin of 0.9%
- Loss before taxation, Rs. 787 million with a loss margin of (11.1) %
- Tax reversal of Rs. 140 million, 18% of LBT
- Loss from investments stood at Rs. 206 million and ROI on weighted average investments is (3.19%)
- Remuneration to employees constitutes 6.39% of revenues.
- Goods and services purchased constitutes 92.9% of sales
- 92.04 km of quality line pipes supplied on time, for national energy infrastructure projects

2021

- EPS: Rs. 10.19
- ROE: 9.9%
- Total sales of Rs. 7,259 million with a gross profit margin of 6.8%
- Profit before taxation, Rs. 925 million with a profit margin of 12.7%
- Taxes of Rs. 134 million, 14.5 % of PBT
- Income from investments stood at Rs. 356.38 million and ROI on weighted average investments is 31.35%
- Remuneration to employees constitutes 6.3 % of revenues
- Goods and services purchased constitutes 85% of sales
- 183.576 km of quality line pipes supplied on time, for national energy infrastructure projects



PEOPLE

2022

- 13 students supported through tertiary education scholarships in Pakistan
- 1,749 hours volunteered.
- Employed 769 employees across locations where we operate
- 21% employees in formal training programs; average training of 3.90 hours per employee across all tiers
- 2,096 + local, 81+ foreign contractors, service providers and suppliers engaged

2021

- 5 students supported through tertiary education sponsorships in Pakistan
- 981 hours volunteered
- 765 employees across locations where we operate
- 18% employees in formal training programs; average training of 0.96 hours per employee across all tiers
- 344+ local, 64+ foreign contractors, service providers and suppliers engaged



COMMUNITY

2022

- Rs. 50.4 million donated to support causes working in education during the year
- Rs. 58.96 million in community investments, an increase of 346% from the prior year, constituting 18.71% of PBT
- 18,500 ml of blood collected from donors during the year. 37 employees participated in blood drive held at the Head Office

2021

- Rs. 10.66 million donated to support causes working in education during the year
- Rs. 13.21 million in community investments, an increase of 712% from the prior year
- 15,000 ml of blood collected from donors during the year. 30 employees participated in blood drive held at the Head Office

- Rs. 386.91 million donated to support The Citizens Foundation educate Pakistan since 1995 at an average of Rs. 14.33 million per year. This translates to an average of 3.62% of PBT for the period.
- ROE over 10 years is 5.5%
- Sales growth of 6.04% per annum over the last 10 years
- 43,300+ trees planted since 2008, reducing 256 tonnes of CO₂ which is equivalent to burning approximately 33,735 gallons of gasoline.



ENVIRONMENT

2022

- Energy consumption: 210,820 GJ
Self-generated energy: 102,480 GJ
Energy received from the national grid: 108,340 GJ
- Energy supplied outside the business: 43,158 GJ
- GHG emission decreased by 1,932 tonnes of CO₂ against a decrease of 2% in sales
- Emissions intensity ratio 0.00016 MT CO₂/MT
- 13,142 trees planted to reduce our carbon footprint by 78 tonnes annually

2021

- Energy consumption: 226,277 GJ
Self-generated energy: 113,103 GJ
Energy received from the national grid: 113,174 GJ
- Energy supplied outside the business: 44,051 GJ
- GHG emission increased by 2,196 tonnes of CO₂ against increase of 90% in sales
- Emissions intensity ratio 0.00018 MT CO₂/MT
- 4,704 trees planted to reduce our carbon footprint by 28 tonnes annually



RECOGNITION

2022

- Our Company was ranked first in the category of Diversified Holdings by South Asian Federation of Accountants (SAFA) under the 'Best Presented Annual Report Awards' for 2020
- The Annual Report of the Company for the year 2021 secured a certificate of merit in the Engineering and Autos Sector

2021

- Our Company was ranked first in the category of Diversified Holdings by South Asian Federation of Accountants (SAFA) under the 'Best Presented Annual Report Awards' for 2019
- The Annual Report of the Company for the year 2019 secured a certificate of merit in the Engineering and Autos Sector
- The Annual Report of the Company for the year 2020 secured a certificate of merit in the Engineering and Autos Sector



MEMBERSHIP OF ASSOCIATIONS

- Pakistan Centre for Philanthropy
- Management Association of Pakistan
- Pakistan Engineering Council
- Pakistan Steel Line Pipe Industry Association
- International Cotton Association Limited
- Employer's Federation of Pakistan
- Pakistan Steel Melter's Association
- The Federation of Pakistan Chambers of Commerce & Industry
- Karachi Chamber of Commerce and Industry
- All Pakistan Textile Mills Associations
- Pakistan Institute of Corporate Governance



EXTERNAL INITIATIVES

- API Specification Q1 and API 5L
- ISO 9001:2015, ISO 14001:2015, ISO 45001:2018
- Global Reporting Initiative (GRI) and Sustainability Reporting Standards

AWARDS AND ACCOLADES

SOUTH ASIAN FEDERATION OF ACCOUNTANTS: ANNUAL REPORT AWARDS 2020

Our Company was ranked first in the category of Diversified Holdings by South Asian Federation of Accountants (SAFA) under the 'Best Presented Annual Report Awards' for 2020.

ICAP AND ICMAP BEST CORPORATE REPORT AWARDS 2021

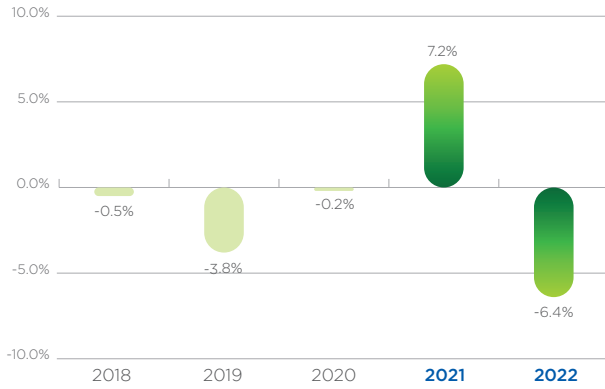
The Annual Report of the Company for the year 2021 secured a certificate of merit in the Engineering and Autos Sector.



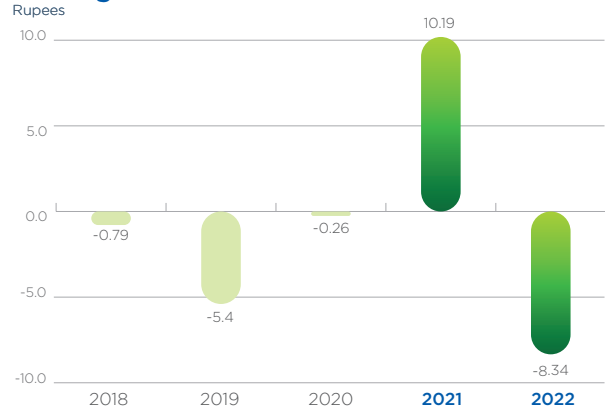
SUSTAINABILITY PERFORMANCE

PERFORMANCE HIGHLIGHTS

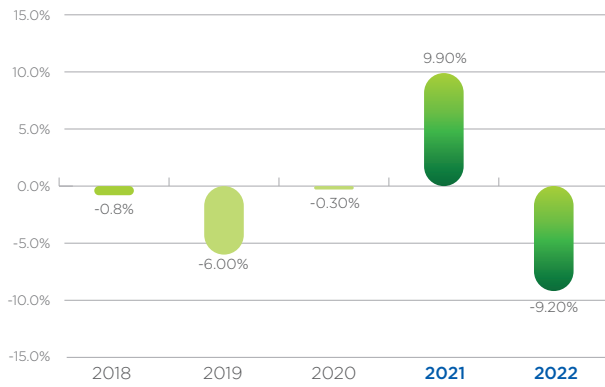
Return on Assets



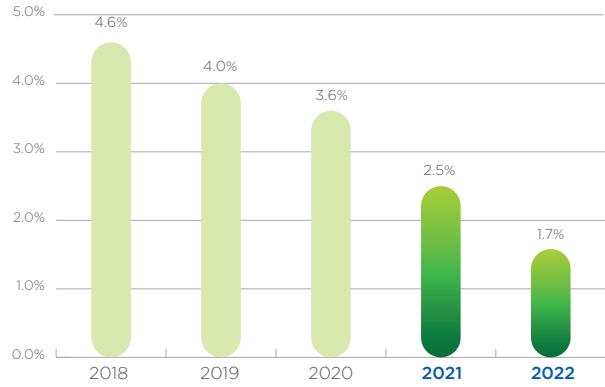
Earning Per Share



Return on Equity



Debt to Equity

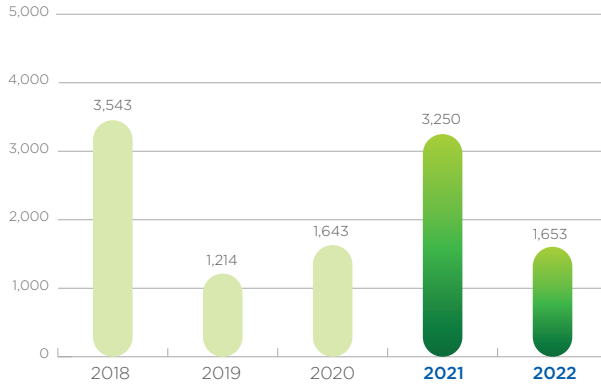


The variance in net profit margins and EPS is mainly due to exclusion of dividend income from equity accounted investees companies in consolidated financial information of Rs. 1,183.4 million.

WEALTH GENERATED AND DISTRIBUTED

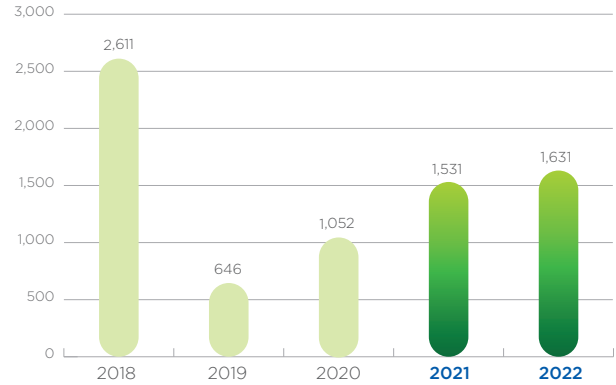
Net Wealth Generated

Rs. in million



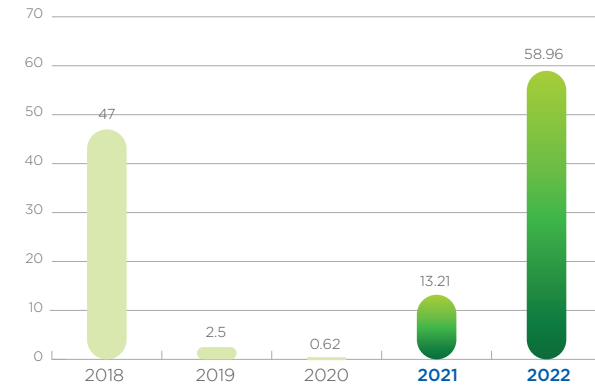
Contribution to Exchequer

Rs. in million



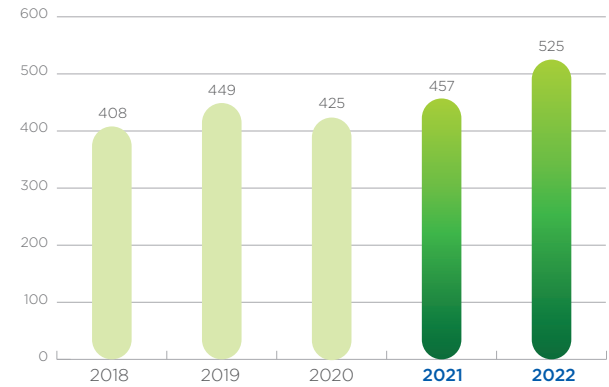
Social Investments

Rs. in million



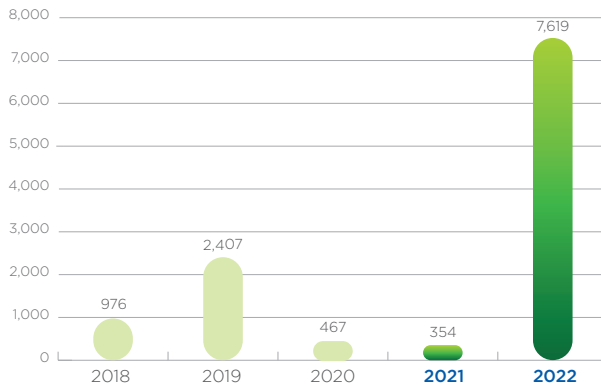
Contribution to Employees

Rs. in million



Training Expense

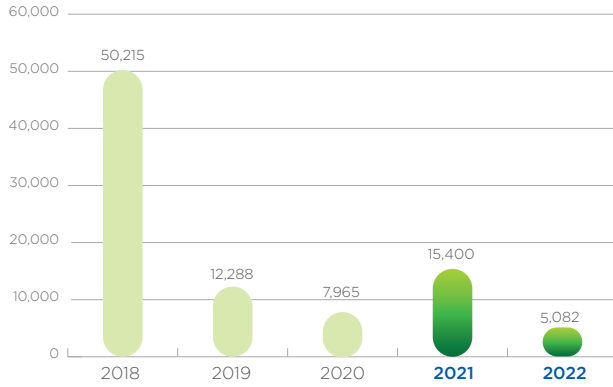
Rs. in thousands



PRODUCTION INFORMATION

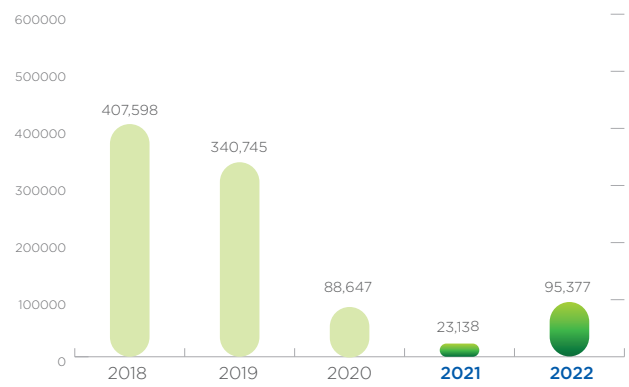
Steel Pipes

(Tonnes)



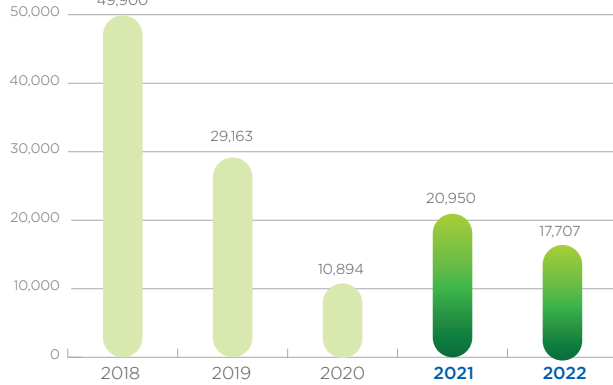
Line Pipe Coatings

(Sq Meters)



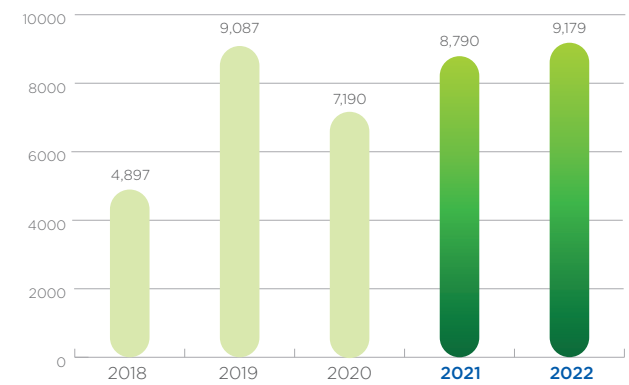
Steel Billets

(Tonnes)



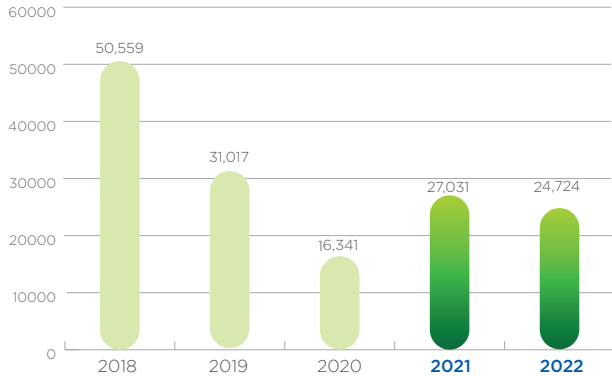
Yarn

('000 Kgs)

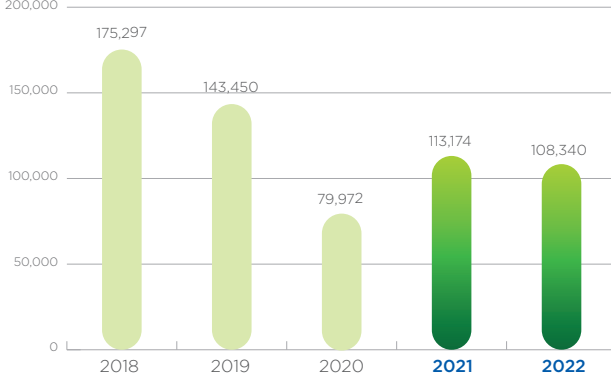


PRODUCTION INFORMATION

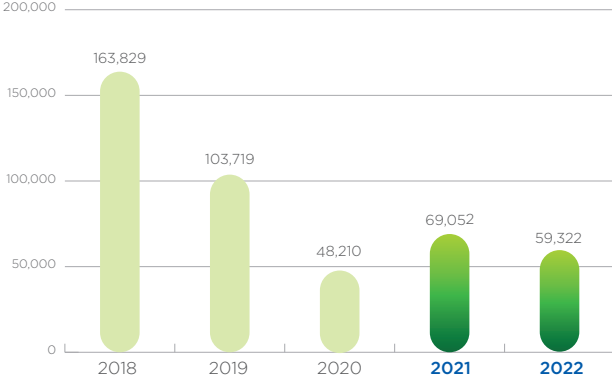
Energy (MWh)



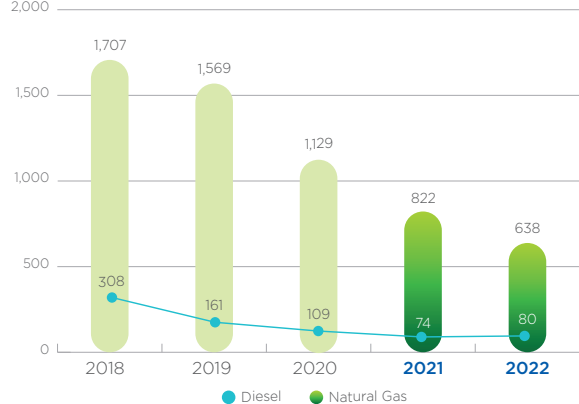
National Grid (GJ)



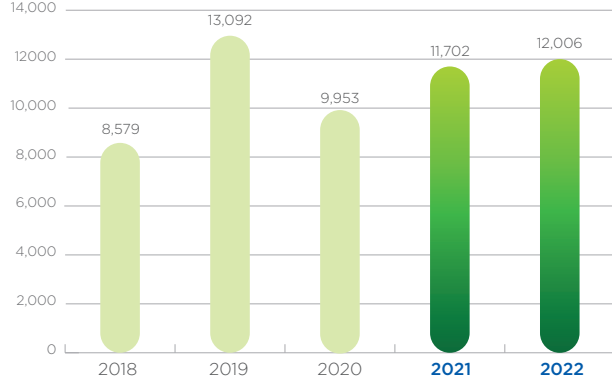
Self Generated Energy (GJ)



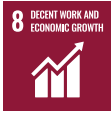
Direct GHG emissions in CO₂ Equivalent (Tonnes)



Indirect GHG emissions in CO₂ Equivalent (Tonnes)



ECONOMIC PERFORMANCE



ECONOMIC VALUE CREATION

Pakistan is a young country and offers a range of opportunities to leverage national resources and develop products to serve the needs of a growing nation. The operations and impact of the businesses we operate extend across Pakistan.

Our products serve public sector organizations and the industry at large, enabling them to provide goods and services to end consumers across Pakistan. We have diversified our business portfolio to address the needs of the future - we believe in delivering sustainable value through all our operations and strive to ensure that our sustainability and business strategies are aligned. We believe that the engineering sector will remain an engine for economic growth in Pakistan and our aim is to develop a solid engineering sector portfolio. We are continuously seeking out opportunities to invest in new technologies to expand the footprint of all our businesses with a clear focus on value addition. We strive to maintain and grow as a leading supplier of integrated pipeline solutions/ services in Pakistan and to emerge as the leading producer of high-quality steel products for the Pakistani market, specifically serving the water and energy segments of the country.

The boundaries of economic value generation and distribution are restricted to the organization itself, internally and, to the government and society at large, externally. It is our belief that the objective of healthy economic performance extends beyond the organisation and across the value chain, to contribute to the collective wellbeing of the economy and society.

We ensure the sustainable and responsible management of our business through compliance with all obligations imposed on us as well as those we choose to impose on ourselves.

Our revenues were Rs 8.24 billion [FY21: Rs. 9.43 billion] of which Rs. 6.6 billion [FY21: Rs. 6.2 billion] constitute payments to suppliers; representing a value addition of 20% or Rs. 1.7 billion [FY21: 35% or Rs.3.3 billion].

During the year, through the Steel Division and Engineering unit operations we produced 5,082 tonnes of steel pipes [FY21: 15,400 tonnes], applied 95,377 meters of line pipe coatings [FY21: 30,451 meters] and fabricated and sold 981 units of machinery and other equipment [FY21: 390 units]. Revenue from the division for the period stood at Rs. 1,391.7 million or 19.6% of total sales of Rs. 7,089.9 million.

The Cotton Division purchased 2,594.39 tonnes of cotton and 3,384.92 tonnes polyester [FY21: 3,285.17 tonnes cotton and 3,321.35 tonnes polyester] and produced 5,687.51 tonnes of yarn in FY22 [FY21: 5,633.17 tonnes]; sales from the unit aggregated to Rs. 2,695.4 million.

Through CS Energy we generated 89,008 GJ [FY21: 97,312 GJ] and sold 86,974 GJ of power in FY22 [FY21: 94,347 GJ]. As a byproduct of power generation, we produced 208,635 tonnes of steam [FY21: 206,030 tonnes] of which we sold 187,422 tonnes [FY21: 170,270 tonnes] and reused the remainder in the power generation process through a condensing turbine. Crescent Hadeed manufactured 17,707 tonnes [FY21: 20,950 tonnes] and sold 17,707 tonnes [FY21: 20,935 tonnes] of steel billets during the reporting period. Sales for CS Energy and Crescent Hadeed stood at Rs. 705.4 million and 2,465.6 million, respectively.

In 2022, through our capital markets segment we made investments of Rs. 295.56 million [FY21: Rs. 121.88 million] and realized losses of Rs. 13.62 million [FY21: Rs. 60.12 million] through sale of investments. We made profit through dividend and rental income of Rs. 1,260 million [FY21: 46.5 million] contributing Rs. 1.48 to the Consolidated Company LPS of Rs. 8.34. We distributed a significant part of the value we created through the payment of taxes and levies to provincial and federal governments and, for the year these stood at Rs. 1.6 billion [FY21: Rs. 1.5 billion] constituting 11% of loss before tax. We have defined benefits and contribution plans for our employees and during the year we distributed Rs. 526 million or 6.4% of revenues in wages and benefits to our workforce of 769 employees [FY21: 457 million or 4.8% of revenues in wages and benefits to our workforce of 765 employees].

We distributed Rs. 59 million, 18.7% of standalone PBT of Rs. 315.12 million in the form of community investments [FY21: Rs. 12.03 million] and, Rs. 252 million to providers of finance as interest payments [FY21: Rs. 213 million]. Sales stood at Rs. 7,089 million as compared to Rs. 7,259 million last year, a decrease of 2.3% YoY. Gross profit margins fell to negative 0.9% [FY21: 6.8%]. This is primarily due to two factors: a steep increase in input raw material prices especially steel raw material eroding margins and, low demand resulting in fixed costs further eroding profitability. Operating loss stood at Rs. 682.83 million or 9.6%, effected by loss from investments of Rs. 206.44 million.

Consequently, return on equity and capital employed moved from 9.9% to negative 9.2% and 7.9% to negative 7.2%, respectively, in comparison with last year.

Detailed financial statements of the Company can be found in the FY22 annual report (pages 214-291).

ECONOMIC VALUE GENERATED AND DISTRIBUTED

The value generated in the fiscal year 2022 stands at Rs. 1,653 million

	2022	2021	2020	2019	2018
Economic value generated	(Rs. in millions)				
Total Revenue	8,241,184	9,430,855	4,744,061	7,662,017	11,660,156
Bought-in-material and services	(6,587,632)	(6,180,580)	(3,101,110)	(6,448,043)	(8,206,962)
Value generated	1,653,552	3,250,275	1,642,951	1,213,974	3,453,194

Economic value distributed

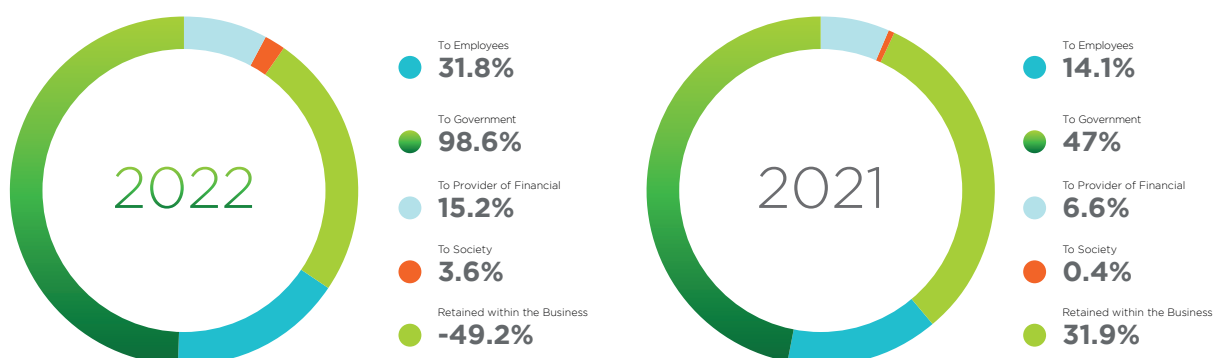
Employees' Salaries, wage, and other benefits	525,810	457,030	425,442	449,486	407,939
Value per Share	6.77	5.89	5.48	5.79	5.25
Government Income tax, sales tax, customs duties, WWF and WPPF	1,630,649	1,530,593	1,051,944	645,695	2,610,709
Value per Share	21.00	19.72	13.55	8.32	33.63
Shareholders Dividend*	-	-	-	-	155,265
Value per Share	-	-	-	-	2.00
Provider of Finance Finance cost	251,742	213,407	315,109	317,819	263,964
Value per Share	32.43	27.49	40.59	40.94	3.40
Society Donation towards education, health, and environment	59,014	12,013	618	2,836	35,087
Value per Share	7.60	1.55	0.08	0.37	0.45

	2022	2021	2020	2019	2018
Economic value retained					
Depreciation, amortization and retained earnings	(813,663)	1,037,232	(150,162)	(201,862)	(19,770)

	2022	2021	2020	2019	2018
Value distributed per share	31.78	28.51	23.10	18.24	44.74
Value generated per share	21.30	41.87	21.16	15.64	44.48

* This includes final dividend recommended by the Board of Directors subsequent to year end.

In 2022, Crescent Steel did not receive any direct or indirect financial assistance from the government except certain tax concessions as per applicable laws.



SUPPLY CHAIN

As a socially responsible business with high ethical, social, and environmental standards, Crescent Steel endeavors to propagate a culture of quality, transparency, accountability, and integrity across our supply chain.

Supply chain and logistics play a key role in ensuring efficient and profitable operations of all our businesses. The supply chain function is not limited to sourcing quality products and services with conducive price and volume variables; suppliers are strategic partners for our business. We leverage our relationships with key suppliers and work with them for planning, logistics, and the introduction of new products and services.

As a leading line pipe manufacturer engaged in oil and gas transmission projects of national and strategic importance, we have a rigorous protocol of supplier induction, evaluation, and monitoring. We engage with a range of foreign and domestic suppliers, for critical and non-critical goods and services. We assess our suppliers across several factors including inventory optimization, their flexibility and assuring compliance, visibility, and transparency. We consider labor management practices as a threshold encompassing community care and this forms a critical aspect of our supplier engagement criteria. We configure our supply chain model on three basic characteristics: product design and quality, risk assessment and opportunities for business growth.

Our supply chain is geared toward sustainability and is committed to developing indigenous sources where available. In this regard, we have worked with various domestic partners to enhance technical and professional capabilities. We aim to move beyond the boundaries of supplier-buyer relationships to create strategic partners; our suppliers engage with us at many levels, enabling us to generate additional revenue and leverage our relationships for cost savings. Our supplier engagement strategy aims to strengthen the supply chain effectiveness, as it helps to identify environmental and cost hotspots.

Our major imports include Hot Rolled Coils – we use high-grade alloy steel coils for manufacturing pipes for high pressure, large diameter transmission systems.

During the year we imported 5,007 metric tonnes [FY21: 9,380 metric tonnes] of hot rolled coils. We did not import any coating materials during FY22. The sourcing protocol of our raw material for our pipe and coating operations is critical. In accordance with API protocols, manufacturers of HRC are assessed and compliance of the raw material is verified against mill test certificates, manufacturing procedure specifications, and third-party quality assurance verifications.

We imported 16,648 metric tonnes [FY21: 23,000 metric tonnes] of ferrous scrap for our melting operations, purchased 1,463.1 metric tonnes of raw cotton locally [FY21: 1,951 metric tonnes] and imported 1,131.3 metric tonnes of raw cotton [FY21: 1,334.5 metric tonnes], purchased 1,749.6 metric tonnes of local polyester and, imported 1,635.3 metric tonnes of polyester in FY22 [FY21: 2,308 metric tonnes] for our spinning operations.

In addition to this we purchased various goods and services needed for day to day running of our businesses and office operations, including consumables for smooth manufacturing operations, valuing Rs. 6,588 million [FY21: Rs. 6,180 million].

Due to the nature of our business and the demand for superior product quality, we import a major portion of our raw material and consumables. However, as capacities improve, we are able to source more materials domestically.

In 2022 there were no significant changes in the supply chain structure. Mainly material for production was imported from Asian, European and Middle Eastern countries i.e. China, Turkey, UAE, Afghanistan, and Germany.

TYPE AND NUMBER OF UNIQUE SUPPLIERS ENGAGED 2022

Operational Area	Local	Import	Total	Local %	Import%
Steel Division	164	19	183	90%	10%
Cotton Division	113	11	124	91%	9%
Corporate Division	53	2	55	96%	4%
IID/CS Capital	5	-	5	100%	0%
Crescent Hadeed	62	28	90	69%	31%
CS Energy	33	-	33	100%	0%
Total	430	60	490	88%	12%

PROCUREMENT PRACTICES WITH TRUSTED BUSINESS PARTNERS

Suppliers are crucial strategic partners for any business, providing goods and services and enabling business continuity. Supply Chain is not just an area for suppliers to merely comply with quality, price, and volume variables. Our suppliers are strategic partners that adopt our standards to work towards the end goal of providing high-quality and reliable products to our customers. Crescent Steel aims to maximize indigenous procurement and minimize imports; however, due to lack of expertise, a range of products and services required for our operations are not available locally and must be imported. This includes our raw material, which accounts for 80% of our procurement cost. We have worked with our local partners to develop and enhance expertise

and capabilities to fabricate spares locally, in order to reduce the volume of imports. The core objective of our Supply Chain function is to reduce throughput time by minimizing the use of intermediaries, and by enabling supply chain depth to deliver the right materials, at the right time, at the right price.

After the successful evaluation of the vendor, the order is processed and re-evaluated based on quality control. The quality control criteria includes measured specifications, product lifecycle, and requirements by the customer. Despite

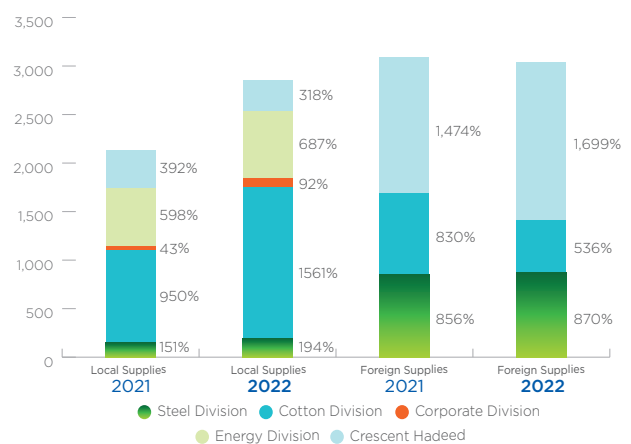
our long-term association with certain vendors, we do not compromise on material quality, as they constitute a hefty proportion of our production, as depicted in our financial statements.

The division between our local and foreign vendors and amounts in the transaction are described briefly in the table below:

	RS. IN MILLION	IN PERCENTAGE
Purchases in 2022		
Local Vendors	2,852	47.9%
Foreign Vendors	3,105	52.1%
	5,957	100%
Purchases in 2021		
Total Local Vendors	2,134	40.3%
Total Foreign Vendors	3,161	59.7%
	5,295	100%

LOCAL 47.9% AND FOREIGN 52.1%

Composition of Local and Foreign Supplies



Managing a Diverse Supply Chain

Up Stream



Raw Material Sourcing

Hot Rolled Coil, Steel Scrap Raw Cotton and Polyester

(Vendors + Suppliers)

Operations



Manufacturing/ Production

Bare Pipes, Steel Billets and Polyester Cotton Yarn

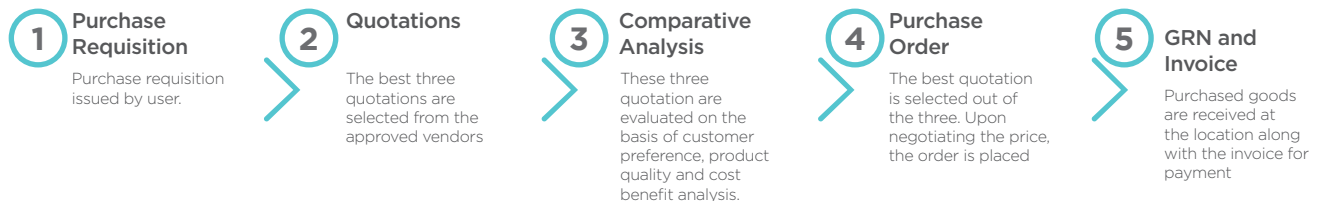
Down Stream



Down Stream

Storage and distribution of final product

Crescent Steel's Local Procurement Cycle



The procurement cycle follows specific steps from identifying requirements and needs to evaluating options and ensuring those needs are optimally met keeping customer preference, quality and price in mind.

The selection of vendors is reviewed every year, normally in January to assess decision-making quality and evaluate vendors for reliability, terms and more. Such reviews help us in determining if circumstances have changed significantly to trigger a change in vendors.

STAKEHOLDER ENGAGEMENT

Stakeholders play an essential role in Crescent Steel's continued success, especially in determining opportunities to collaborate towards common goals.

We define our stakeholders as those individuals and organizations that affect or are affected by the Company's business. Our management approach aims to align corporate activities with stakeholder needs. We focus on gathering feedback from stakeholders and building relationships of trust, reflecting this input in our operations.

Shareholders and investors provide financial capital to run the business; our employees drive and manage the business; our suppliers provide necessary products and services for our business and our customers are the source of revenue for our business. Similarly, financial institutions, regulators, auditors, and other strategic partners are essential and managing their expectations is vital to our future performance as a sustainable business.

Effective and meaningful stakeholder engagement is vital to the performance of our businesses.

We work to identify opportunities and risks in their early stages and provide a variety of opportunities for dialogue with stakeholders. This interaction takes place generally at our Head Office in Karachi and at other business facilities in Pakistan.

Effective and meaningful stakeholder engagement is vital to the performance of our businesses. Weak stakeholder engagement is a sustainability issue, and we strive to mitigate this through formal and informal engagement mechanisms. While engagement with our employees, suppliers, customers, shareholders, and investors is stronger, we recognise that we need to strengthen our engagement with other stakeholders that include the communities where we operate and regulatory authorities.

STAKEHOLDERS NEEDS AND EXPECTATIONS

Understanding and addressing the needs and expectations of our stakeholders is a sustainability imperative.

We prioritize our key stakeholders by creating and maintaining regular and honest communication with them. We work to strengthen our engagement with them. We believe in operating responsibly and addressing the needs of these interconnected groups to ensure commercial success and to enable us to deliver on sustainability priorities. We aspire to ensure that every employee, customer, and supplier takes responsibility for social issues and the design and execution of our engagement with the community, business, and strategic partners are impact oriented and sustainable.

Stakeholder Needs and Expectations



ENGAGEMENT BY STAKEHOLDER GROUP

We have consulted² stakeholder groups and identified the following areas of importance:

Stakeholder Group	Areas Identified	Our Response
1. Employees	<ul style="list-style-type: none"> Our impact on communities Working ethically Resilience of our business Career development opportunities Safe workplace Diversity and inclusion Skillset enhancement Strong organizational culture High performance culture and fair remuneration Our response to COVID-19, high inflation and, the flood disaster 	<ul style="list-style-type: none"> Annual Employee Opinion Survey to gather feedback HSE briefing and emergency drills to observe safety measures Female representation at corporate offices at 19% and minorities at 3% Participation in employee engagement activities 3,002 hours of training in FY22 [FY21: 739 hours] Support for further education of employees and their children Enabling mobility and capital formation through annual subsidized vehicle acquisition scheme Awareness sessions around financial planning, wellbeing etc. Awareness sessions on social issues relevant to the Pakistani community
2. Customers	<ul style="list-style-type: none"> Producing and delivering high quality, reliable products on time Customer satisfaction; improving through product offerings and aiming to meet needs of customer base, including remaining in touch with needs and expectations. Educating customers about new products such as Fusion Bonded Epoxy coatings etc. Enabling better execution of national projects by engaging customers at design phase 	<ul style="list-style-type: none"> Enhancing production capacity and adhering to international standards and best practices Customer satisfaction surveys Ensuring quality control and remaining up to date with the latest market trends and requirements
3. Suppliers	<ul style="list-style-type: none"> Growth through sharing information and expertise Improvement of formal and informal mechanisms to assess supplier-business relationships Improving HSE practices for a sustainable supply chain 	<ul style="list-style-type: none"> Regular evaluations of all suppliers for better business conduct Environmental assessments ensure trust and quality between the business and its suppliers
4. Shareholders and Investors Self-assessed through informal consultations	<ul style="list-style-type: none"> Stable and efficient economic performance Effective management of the company's major business operations Making sustainable decisions for enhanced financial performance in the long run 	<ul style="list-style-type: none"> Periodic technological advancement of processes of plant and machinery at manufacturing sites to augment sustainable revenues while persistently pursuing opportunities for business development through strategic annual objectives Annual corporate briefing by the CEO. Analyst briefings by the CFO to various brokerage houses Annual General Meetings On time, quality reporting on financial and non-financial performance On time material information circulations to investors through the Stock Exchange
5. Local Community Self-assessed through informal consultations	<ul style="list-style-type: none"> The need for heavy investments in the education, health and societal sectors 	<ul style="list-style-type: none"> Supported various community partners such as TCF, Indus Hospital, The Health Foundation and WWF Provided scholarship support to 13 students bringing total scholars to 37, of which 13 are children of employees Contributed 1,757 hours in time towards various causes 37 employees donated 18,500 ml of blood to the Indus Hospital blood bank Planted 1,000 mangroves at WWF wetland center

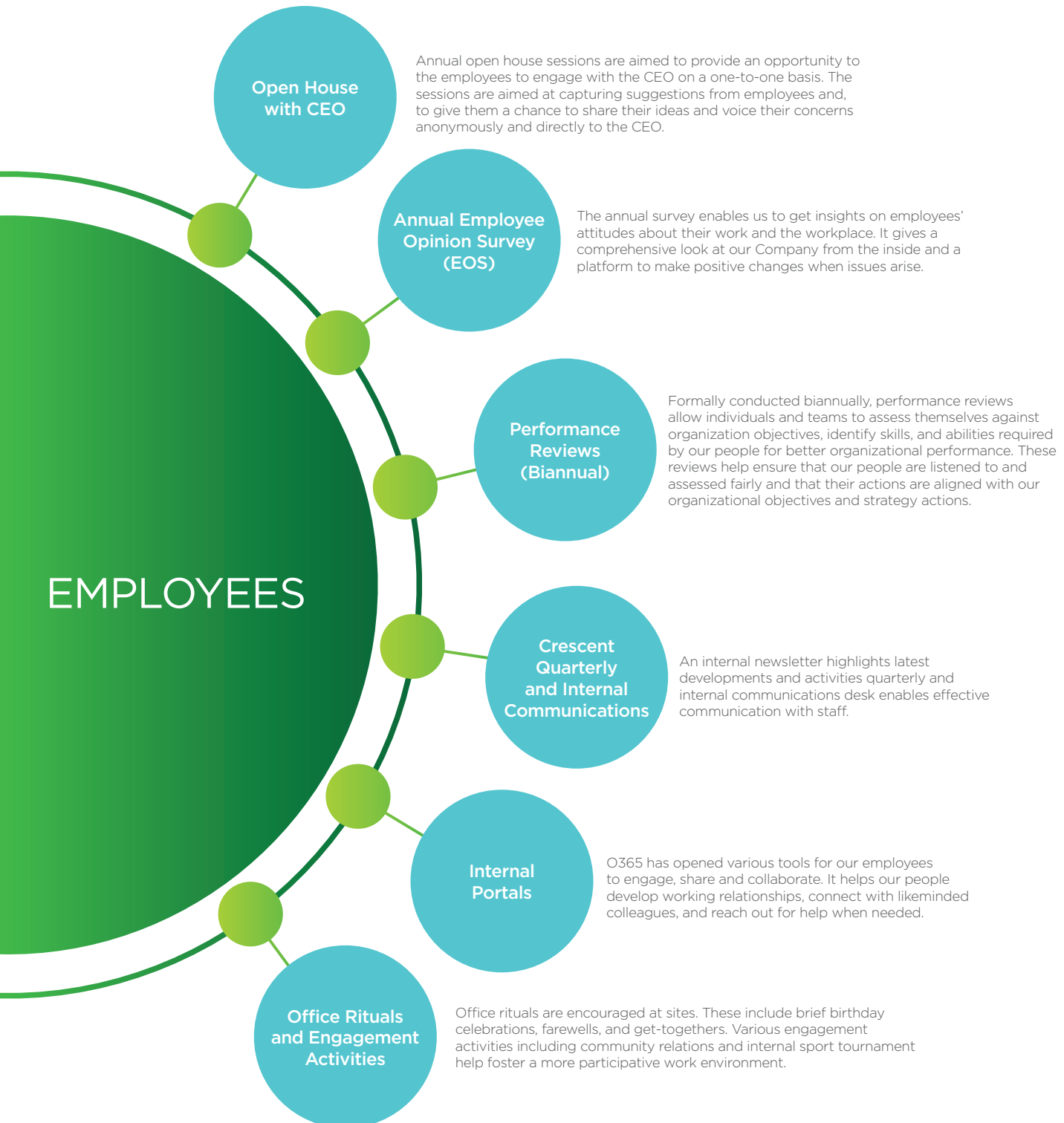
² Formal consultations only took place with three stakeholder groups; formal consultation from investors and the local community segment was not sought however, this assessment is based on discussions with investors, the brokerage community and partner NGOs that we work with. Local community and stakeholders and investors are self-assessed through informal consultations.

INTERNAL STAKEHOLDERS

EMPLOYEES AND CONTRACTORS

We work hard to establish a safe, diverse and inclusive working environment for all our employees and third-party contractors working on our site. Safety and equal opportunity are not just a priority; they form an integral part of our approach to sustainability. We continue to focus on and monitor our safety performance and reinforce safe behaviors and our Mission Zero goal at all our offices and manufacturing sites. Our goal is to maintain a strong and vibrant organizational culture that supports the expertise of our people, enabling and developing high-performance teams.

MANAGING OUR PEOPLE, THEIR ENGAGEMENT, AND THEIR EXPECTATIONS



EXTERNAL STAKEHOLDERS

CUSTOMERS

We are proud of how we are positioned as one of Pakistan's leading engineering companies, helping customers to better manage their oil, gas, and water transmission systems and in using sustainable structures for ports. In order to meet the increasing product needs of our customers, we have enhanced our manufacturing capacity by more than 100%. This has proven to be critical, alongside our API licensing, for us to secure a toll manufacturing order for the K-IV project for 70,000 MT of coated API PSL-2 line pipe in diameter sizes up to 84 inches.

We are consistently collaborating with relevant stakeholder groups to develop a market for flow efficient and protective internal line pipe coatings. The business case is strong because internal coatings help enhance the flow of gas and so, at a given flow capacity, the energy consumed will be lower and, the required pipe diameter will be smaller; consequently, less material is used. Customer satisfaction is a major priority and customer feedback, and expectations encourage us to improve our product offering and address quality and service concerns. We make use of several channels and make every effort to engage our customers and recognize their needs and expectations.



SUPPLIERS

Our supply chain plays a crucial role in sustainable procurement management. We expect our supply chain partners to act in accordance with our principles and values and seek to support their development by sharing information and expertise. We leverage our relationships with key suppliers and work with them for planning, logistics, and the introduction of new products and services. While our preference has always been to support local suppliers as far as possible, in order to fulfil customer needs we maintain strong relationships with foreign suppliers for key raw materials that are not available locally. As per our policy, we make sure that all our critical suppliers are ISO certified.

Our supply chain is divided into two categories; critical and non-critical and our supplier management system has defined supplier induction, evaluation, and re-evaluation protocols; these reinforce our commitment to sustainable and safe practices. To ensure sustainable practices across our supply chain, all new suppliers are regularly engaged through formal and informal mechanisms assessing their business viability, conduct and health, safety and environment practices. If our assessments fail to mitigate risks, a changed protocol for procurement practice is established for that particular supplier.



SHAREHOLDERS AND INVESTORS

We take seriously the immense responsibilities associated with making complex choices and responsibly evaluate the impacts of all our actions, as we try to meet the expectations of our stakeholders. We approach these challenges with confidence, knowing that our guiding principles and values enable sound decision making today, and every day.

FY22 was an extremely challenging year across all our business lines and as a result topline and profitability remained under pressure throughout the year - barring our portfolio investments where we saw windfall dividends from strategic holdings in Altern Energy, most of our business units posted pre-tax losses, however, as we closed FY22 we were in the advanced stages of negotiating a toll manufacturing order for coated line pipes - this is a promising development that will keep our flagship unit operational through FY23 and the first half of FY24 and positions us strongly with our customer base in the oil and gas sector as these pipes are being manufactured on API PSL - 2 specs even though they are water pipes in diameter sizes of up to 84 inches. Our financial performance and future prospects are discussed in further detail in our Annual Report 2022.

Some of the ways in which we engage our shareholders and investors include:

<p>Annual General Meeting</p> <p>This meeting provides a platform for stakeholder engagement</p>	<p>Quarterly, Half-Yearly and Annual Reports</p> <p>Reports are uploaded on the website and are available in print on request</p>	<p>Press Releases (As Required)</p> <p>Updates of potential interests are published for our stakeholders via press release</p>
	<p>Investor Interactions (As Required)</p> <p>We participate in various investor conferences and broker briefing sessions to interact with existing and potential investors</p>	<p>Material Information (As Required)</p> <p>Information is transmitted to Pakistan Stock Exchange Limited (PSX) on timely basis as per the requirement of PSX rule book</p>

COMMUNITY

We follow self-assessed guidelines for measuring the impacts of our community investments and these are regularly reviewed. We are proud of how our contribution to communities is evolving to include actions towards greater engagement with people and our employees.

We work hard to share the substantial economic benefits generated through our contributions to various gas infrastructure and energy development projects by providing employment opportunities and working with local suppliers.

We acknowledge the adverse impacts our operations can have on communities and, strive to minimize and offset them wherever possible. Details on our initiatives and contributions for the fiscal year 2022 are mentioned in the Social and Relationship Capital section of this report.

All our units have formal and informal programs through which we engage with local communities.

We also ensure that we hire people from localities near our units of operation, as far as reasonably possible and in line with business requirements. We understand that improvements are needed in how we gather feedback from the community itself so that we may better understand their needs.

None of our operations have significant actual and potential negative impacts on the local communities.

ENGAGEMENT ACTIVITIES

Various engagement activities were organized throughout the year. These include ongoing formal and informal office rituals, formal CSR activities with community partners and other internal events. Our people also volunteer to conduct impact assessment visits to select community partners. These activities also form a part of how we engage the people who work with us. These are covered in detail in this report on page 47.

REGULATORS AND GOVERNMENT BODIES

Regulators and government bodies are key drivers for future business sustainability, specifically in terms of the engineering sector businesses that we operate that needs special trade protection as we compete against international suppliers.

EMPLOYEE AND COMMUNITY ENGAGEMENT

Stakeholders – Community and Employees

Activity	Month
Breast Cancer Awareness Session – Indus Hospital	October 2021
Cricket Tournament	January 2022
Mangrove Plantation and Trip to Bhit Khori – World Wide Fund for Nature Pakistan	February 2022
Crescent Cares Week	February 2022
Session on Child Safety - Save our Children Foundation	February 2022
Visit to Clifton Urban Forest	February 2022
Session on Benefits of Blood Donation - Indus Hospital	February 2022
Blood Drive - Indus Hospital	February 2022
TCF Students visit to Head Office, Bhone and Jaranwala Factories	February 2022
Session on Volunteering and Giving - The Citizens Foundation	February 2022
Session on Down Syndrome - Karachi Down Syndrome Program	February 2022
Visit to Karachi Down Syndrome Program	February 2022
Visit to NOWPDP	February 2022
Earth Hour	March 2022
Iftar Distribution Drive – The Robin Hood Army	April 2022

ENGINEERING DEVELOPMENT BOARD, BOARD OF INVESTMENT AND FEDERAL BOARD OF REVENUE

Pakistan uses the Harmonized System (HS) to classify goods and determine their respective customs duties. The government has reduced the maximum general tariff rate and simplified the tariff structure by reducing the number of duty brackets. Tariff rates typically increase with the degree of processing of a product and are meant to incentivize import substitution and discourage commercial imports that are draining foreign exchange.

Industry and trade regulations remain a core challenge for countries in the region, as many of them are supported by government subsidies that allow them to export steel products at competitive prices. The prevailing structure of duties and taxes on raw materials, combined with higher production costs compared to other regional competitors, has made it difficult for countries to remain competitive in the global market. This has led to higher prices for their finished goods compared to other countries in the region. Additionally, the dumping margins of other regional players make it difficult for countries to compete, leading to an overall decline in their competitiveness.

Our line pipe unit competes for business against mostly foreign bidders, and excessive duties on critical raw materials and consumables impact our ability to remain competitive. In order to ensure a level playing field and to develop the local engineering sector, it is necessary to rationalize tariffs with cascading duties. While anomalies in the tariff structure of Hot Rolled Coils (HRC) and Steel Line Pipes have been rationalized, foreign suppliers with predatory pricing, export rebates and artificially depressed cost levels are still able to price local line pipe manufacturers out

of the market. Therefore, countervailing duties and regulatory duties must be reviewed and imposed only on products that are manufactured in sufficient quantity locally; policies on import substitution should have a clear objective to support local value addition.

Tariffs on steel scrap were reduced in previous years while duties on intermediary and finished products (i.e. steel billets and deformed bar) were maintained with a cascading duties structure. However, given that domestic production of steel scrap is negligible, tariffs on steel scrap should be removed altogether to reduce production costs. Furthermore, customs valuation of imported steel scrap should be reviewed, as the Import Trade Prices (ITP) imposed are significantly higher than the prevailing market prices. These factors increase production costs and ultimately results in expensive products for the end-user compared with regional markets.

The absence of an import substitution policy or effective cascading tariff structures hinders investment and innovation. The tariff concessions available to importers of value added steel products for projects under the Fifth Schedule of the Customs Act is concerning, as it favours imports of steel line pipes, steel billets and steel reinforced bars for various projects of national importance, at the expense of the domestic industry.

We remain connected with relevant stakeholders, such as the Engineering Development Board (EDB), the Ministry of Industries and Production, the Ministry of Petroleum, and the Tariff Anomaly Committee, to share our reservations and proposals regarding the need to introduce effective cascading duties and import substitution policies.

This could help to promote the growth of local industries, reduce the cost of production, and ensure the availability of quality goods and services at reasonable prices. Additionally, such policies could also help to protect local producers from unfair competition and safeguard the interests of consumers.

HUMAN CAPITAL

We aim to create a culture that is based on fairness and respect and are committed to creating a rewarding and inclusive workplace for our people by encouraging personal development, recognizing good performance and providing equal opportunities for all.

The value of intangible assets within organizations, including human and intellectual capital, has increased significantly in recent years as our economy has become more knowledge intensive. Our business increasingly relies on the specialized skills and expertise of our people. We seek to recruit, develop, and retain the best talent, to meet the needs and expectations of our business. To achieve this, we have a comprehensive HR strategy and extensive policies in place to support our strategic human and intellectual capital objectives and drive our actions effectively.

In all our operations, we recognize that our employees and contractors require:



A Safe and Healthy Workplace



Fair and Equitable Remuneration



Career Development and Training for Personal Development



A Diverse and Inclusive Work Environment with Equal Opportunities

To achieve our HR objectives, we have a comprehensive strategy that supplements our policies in a manner that strengthens the organization's human capital, develops corporate culture, improves working environment, and upholds our values.

At Crescent Steel, we strive to cultivate a culture that supports transparency and open communication, where every employee enjoys the freedom to give feedback and raise complaints and grievances with ease.

We actively monitor the results of our employee engagement initiatives and satisfaction surveys and take timely actions to address pain points as far as reasonable. Our human resource function is subject to regular monitoring by an independent internal audit function that identifies implementation and policy gaps.



STRATEGIC FOCUS ON HR

HR Process Excellence

Develop Strategic Employee Competencies

Close in on the Skill Gap

Identify and Develop Hi-Potential Employees

Drive Organizational Performance

Enhance Technology in HR

Positive Work Environment: Diversity, Inclusion and Wellbeing

Quality HR Services

High Performance Resource

GOALS AND OBJECTIVES FOR 2022 - 2024

Goal / Objective	Initiative
Enhance employee engagement levels	Narrow the employee satisfaction gap; improve ESI to 4 and target a 90% participation level.
	Conduct focus groups to address key issues identified by the Employee Opinion Survey.
Create a high performance culture	Conduct 360-degree surveys of key management staff and executives, targeting that 100% of departmental managers receive upward feedback.
	Implement and leverage a Human Resource Information System.
	Enhance the HR competency level of the organization so that every manager acts as an HR manager for their team.
	Develop and deploy online learning tools especially for standard roles and organizational systems and policies.
	Encourage self-directed learning within the organization.
	Hire the right person in the right position.
	Strengthen key operational areas by acquiring and retaining top talent in mid-management positions.
	Simplify training and encourage the concept of self-learning within the organization.
	Promote a culture where people are listened to, valued, and assessed with fairness.
Enhance workforce knowledge and skill level	Identify skill gaps across the organization and work to develop the right people to meet future growth objectives; review the inventory of skills to ensure it remains relevant to business goals.
	Build an analytics core across the organization to help drive better and informed decision-making.
	Study and deploy AI tools like chatbots etc. to provide access to organizational learning/policies and induction level training.
	Bring analytics focus to HR with recruitment, training and engagement analytics
Create and maintain a highly qualified, professional, diverse, and responsive workforce	Improve our employment of women by 25 percent (at corporate office locations) and measure the number of women applying to vacant positions.
	Continue to deliver equal average pay for men and women at comparative role and job grade.
	Improve average age of the organization by employing younger people.



HIGH PERFORMANCE HUMAN CAPITAL

COMPETITIVE REMUNERATION

SIMPLIFIED HR

HR AGILITY

COMMUNITY INVOLVEMENT

ENHANCED EMPLOYEE ENGAGEMENT

HAPPY WORKPLACE

COMPLIANCE AND PRODUCT RESPONSIBILITY



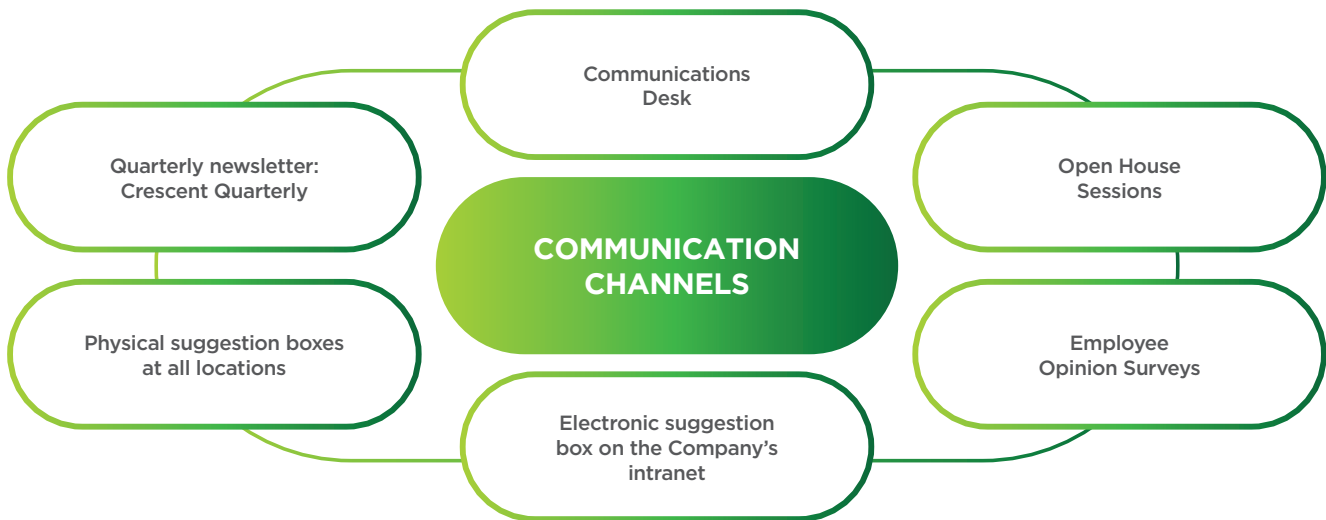
EMPLOYEE ENGAGEMENT

We believe in putting our people first and understand that it is essential that employees are fully aware and resonate with our purpose.

Our people are essential to the successful delivery of our strategy and to sustaining business performance over the long term. We accelerate the development of our people, grow, and strengthen our leadership capabilities and enhance employee performance through strong engagement.

Our people and culture initiatives are critical business priorities, and we strive to be an employer of choice that attracts and retains high performing talent with the passion, skills, and mindsets to drive us on our journey to build strategic national infrastructure and make a difference. We believe each one of us has the power to make a difference, and our Company has a long history of investing in programs and activities that improve lives.

Our employee engagement channels include:



SHARING INFORMATION AND GETTING FEEDBACK IS A KEY PART OF EMPLOYEE ENGAGEMENT

We strive to keep our employees well informed, and we do this through various channels and programs. Our Communications desk and SharePoint portal are leveraged for one-way communications that are pushed to employees and keeps them posted on the Company calendar, birthdays, daily menu, events, policies and more.

We have both physical and digital suggestion boxes across all our locations where employees are encouraged to drop suggestions and conduct regular surveys to obtain employee feedback on shared services, in particular workplace and facilities, IT and human resource functions.

The annual Open House provides employees with an opportunity to meet directly with the CEO one on one to discuss concerns and to provide feedback and suggestions.

The ideas shared by employees via these channels become key drivers of process improvements at Crescent Steel. Our scholarship program for children of employees was designed and developed after one such Open House session.

Crescent Steel Employee Opinion Survey is one of the principal tools used to measure employee engagement, motivation, affiliation, and commitment to Crescent Steel. It provides insights into employees' views and has had a consistently high response rate. In 2022, the response rate was 83%, which was the same as compared with 2021. The average employee engagement score saw an increase of 1.6% over 2021 at 3.8 points out of 5.

Strong scores were registered for our vision, mission, strategy and values, structure of the organization, work environment and culture with over 70% of employees. As with every survey

in the past, a major area of concern included compensation. We feel strongly that this would continue to remain on the opinion survey, however it may be noted that the average salary increase in the outgoing year stood at 13.95% and in 2023, as we write this report, the average increase across the organization stood at 21.72% excluding performance incentive payouts which stood at an average of 16.11% of annual gross salary - we therefore feel that our remuneration policies and payouts are competitive and this has been validated through a recent compensation survey carried out by HRSG.

We also have a robust grievance and complaint mechanism in place, including a Whistle Blowing Policy. The policy allows employees to anonymously report any improper conduct or wrongdoing without concern for reprisals or victimization directly to the Head of Internal Audit, Human Resources and/or the CEO. We ensure that the whistle blower's confidentiality is protected, and all grievances are dealt with promptly, fairly and in accordance with other related policies of the organization.

We aim to reach out to diverse talent and embrace the different skills, cultures, ways of thinking and experiences that talent brings. We continue to encourage and offer our employees regular opportunities to step out of their daily work routine to contribute their time by volunteering to make a difference. Additionally, the daily lunch and messing facilities at our office and manufacturing locations provide everyone an opportunity to sit together. This encourages interdepartmental engagement and reinforces our core values.

LABOR MANAGEMENT RELATIONS AND GRIEVANCE MECHANISM

As a labor-intensive company, with 75% of the total workforce comprising of worker grade employees at our factory locations, it is important to have strong engagement between the workforce and the management. Joint committees of workers, supervisors and managers helps us achieve targets, understand worker needs and provides us with opportunities to address concerns. The management goes beyond normal circumstances to facilitate its workers from discussions around

problems faced by workers and how these concerns can be addressed and how workers can be facilitated.

The company provides transportation, food, and housing facilities (wherever applicable) to workers. Moreover, workers are encouraged to report grievances and/or concerns to their respective supervisors/managers, in particular those relating to health and safety and, the workplace.

There are no collective bargaining agreements or labor unions associated with our Company.

DIVERSITY AND INCLUSION

We are committed to providing equality of opportunity and creating a rewarding workplace for all employees. Increasing female representation, especially in management level roles, is an ongoing priority. As on June 30, 2022, 19% of our employees across our corporate offices were females. 20% of the executive management team roles and 6% of the management roles were filled by women and 8% of our workforce consisted of minorities. Over the last year, 86% of new entrants represent rural communities and 84% of our total workforce is from rural Pakistan.

We believe a diverse workforce is an important asset as it promotes creativity and innovation. It is the secret to a successful, thriving workplace and a fair work culture. Other ways that we contribute to DEI goals is through our philanthropic interventions which are discussed in detail on page 50.

No incidents of discrimination were reported during FY22.

AS ON JUNE 30, 2022:



EQUAL OPPORTUNITY EMPLOYMENT

During FY22, the ratio of standard entry-level wage by gender compared to local minimum wage remained 1:1 across all significant locations of operations and inclusive of plants and regional offices at Karachi, Nooriabad, Jaranwala, Bhone, Dalowal, and Lahore. As an equal opportunity employer, the Company ensures that the rights of its employees are protected in all forms of work.

100% of our senior operational management employees, including functional heads are residents of local areas/regions

EMPLOYEE DEVELOPMENT

We strive to provide the right resources and an environment that supports the growth and development needs of employees to generate a positive impact on the organization. The Company maintains a robust and structured training program for engineers at the line pipe manufacturing units and for management hires in shared services/marketing and sales functions at the Head Office. These initiatives redouble our commitment towards providing opportunities for development to the fresh young graduates of our country.

During the fiscal year we invested Rs. 7.61 million, or 2.42% of profits before tax [FY21: Rs. 0.36 million, 0.10% of profit before tax] in training our employees, enabling them to develop their skills, fulfil their potential, and make the best possible contribution to the success of the Company. On average, each employee in management category received 17.95 hours [FY21: 6.53 hours] of formal training in FY22.

9

Average training hours planned for every employee in 2023

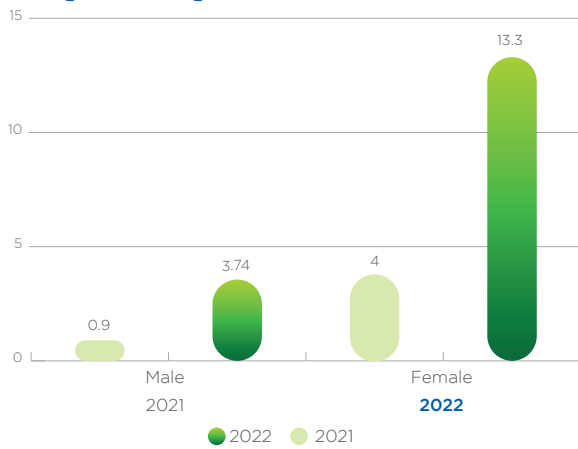
100%

Percentage of eligible employees for whom performance reviews and career development plans have been prepared in 2022

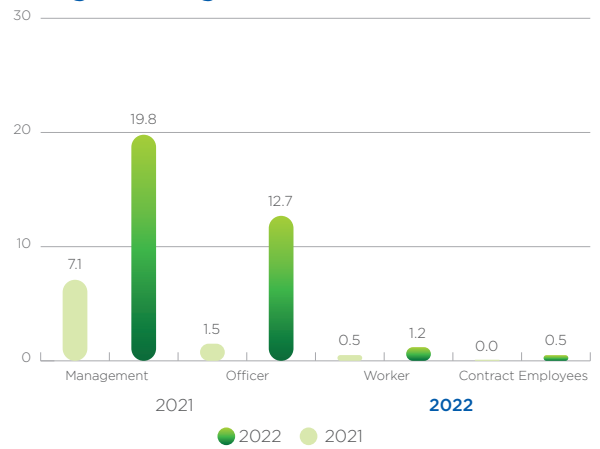
67%

Percentage of management grade employees for whom training need analysis has been conducted and training plans prepared in 2023

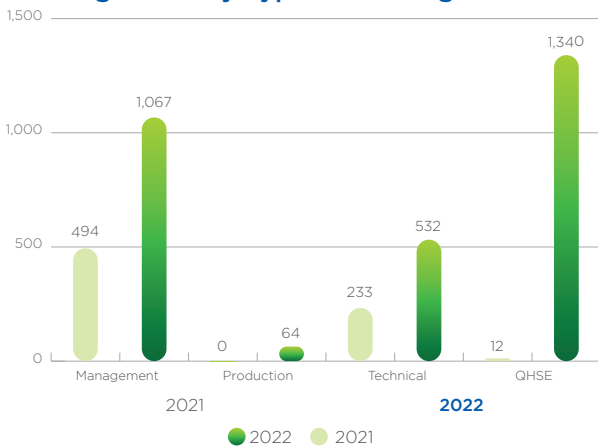
Average Training Hours / Employee by Gender



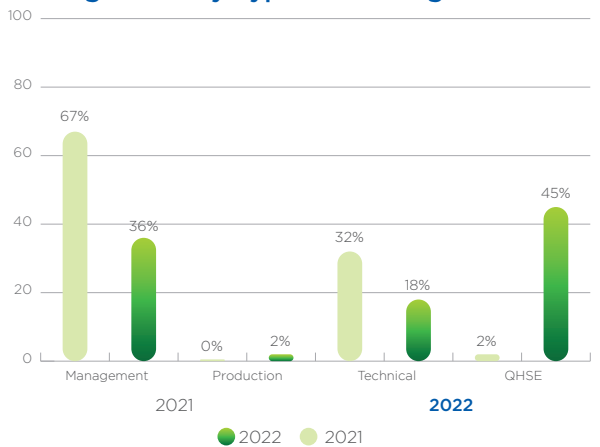
Average Training Hours / Employee by Category



Training Hours by Type of Training



Training Hours by Type of Training %



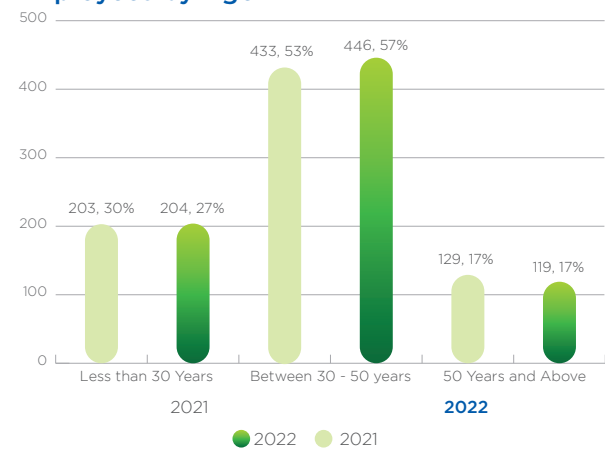
EMPLOYEE DEMOGRAPHICS

Crescent Steel continues to strengthen initiatives on diversity and inclusion. We strongly believe that diversity and inclusion are key to business success and strive to nurture a work culture that celebrates all forms of diversity, encourages inclusivity and equality. We provide equal opportunities to grow and encourage our employees to innovate, discuss and suggest new ideas.

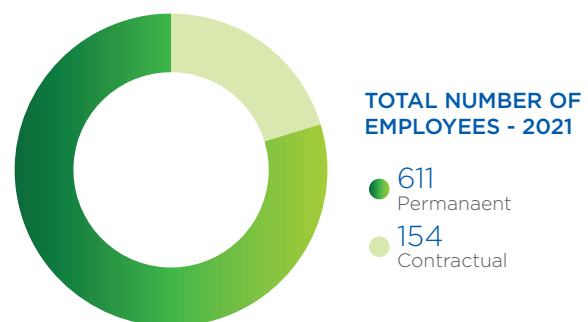
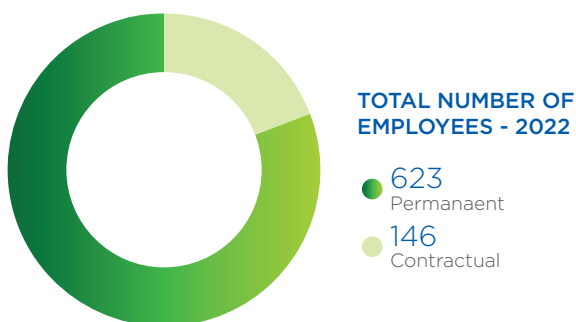
As an employer of over 750 people across Pakistan, Crescent Steel has a significant impact on livelihoods, opportunities and growth prospects for the people who work for the Company. Here is a look at our demographic break-up:

Total Workforce - Region Wise		
	2022	2021
Bhone	35	28
Jaranwala	483	474
Karachi	71	76
Lahore	5	4
Nooriabad	133	141
Dalawal	40	40
Islamabad	2	2
Total	769	765

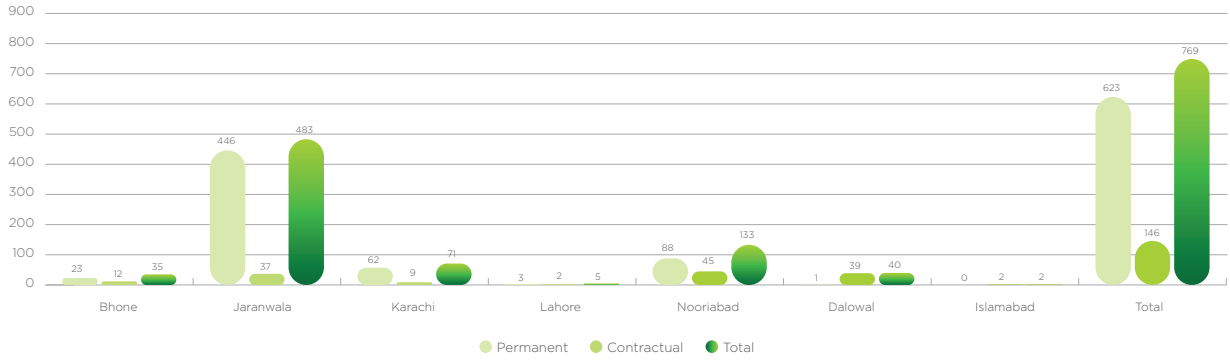
Employees by Age



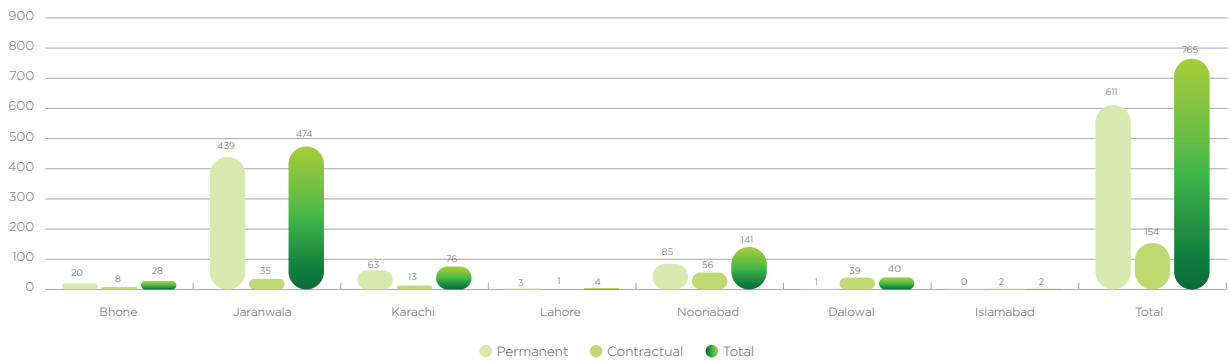
AVERAGE AGE OF EMPLOYEES - BY EMPLOYEE CATEGORY



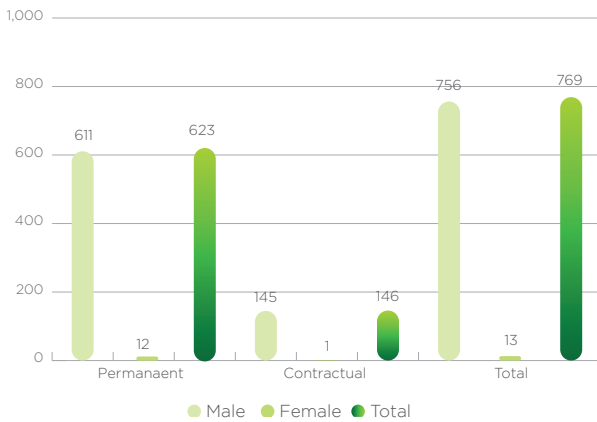
Total Number of Employees by Employment Contract and Region - 2022



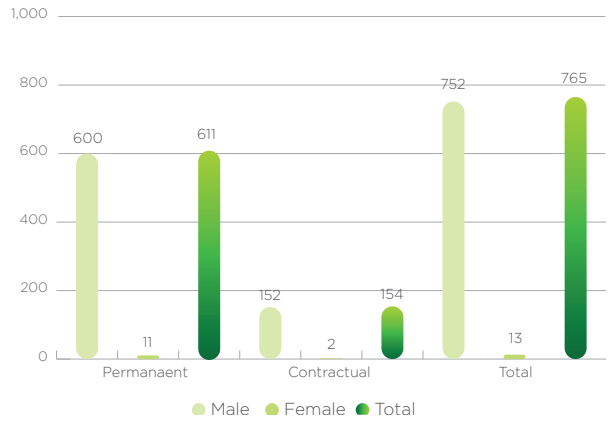
Total Number of Employees by Employment Contract and Region - 2021



Total Number of Employees by Employment Contract and Gender - 2022



Total Number of Employees by Employment Contract and Gender - 2021



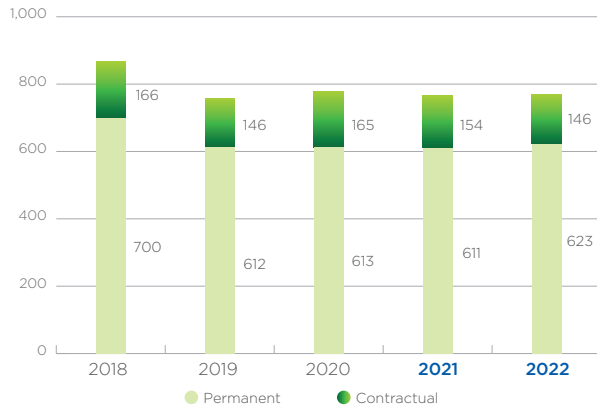
New Hires	Incoming Employees 2022		Incoming Employees 2021	
	Number	Rate %	Number	Rate %
Less than 30 years	426	54.79	346	44.96
Between 30 - 50 years	414	54.65	312	40.49
51 years and above	30	3.95	30	3.96
Total	870	113.50	688	89.88
Karachi (Head Office)	14	1.84	24	3.13
Nooriabad	65	8.55	45	5.94
Jaranwala	754	98.05	580	75.97
Islamabad	-	-	-	-
Dalawal	11	1.44	10	1.30
Bhone	26	3.39	28	3.63
Lahore	-	-	1	0.13
Total	870	113.50	688	89.88

Employee Turnover	Outgoing Employees 2022		Outgoing Employees 2021	
	Number	Rate %	Number	Rate %
Less than 30 years	399	51.32	339	44.05
Between 30 - 50 years	427	56.37	303	39.33
51 years and above	39	5.13	47	6.20
Total	865	112.85	689	90.01
Karachi (Head Office)	18	2.36	22	2.87
Nooriabad	73	9.61	61	8.05
Jaranwala	744	96.75	585	76.62
Islamabad	-	-	-	-
Dalawal	11	1.44	4	0.52
Bhone	19	2.48	17	2.20
Lahore	18	2.36	-	-
Total	865	112.85	689	90.01

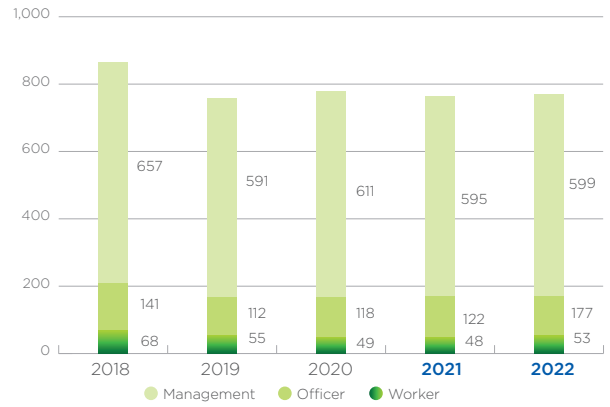
High turnover is due to spinning industry dynamics.
All employee data and information presented above is extracted from our Human Resource Management System and is, therefore, accurate.

WORKFORCE INFORMATION

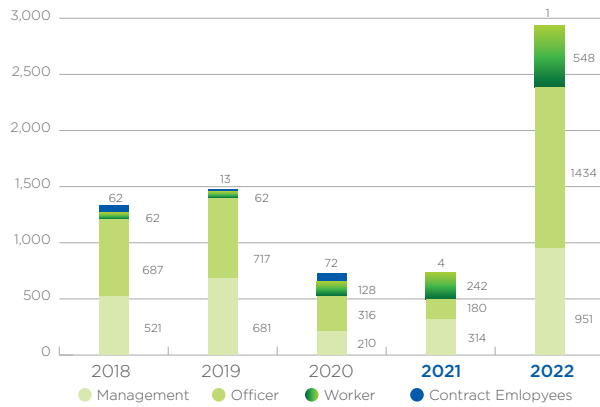
Number of Employees



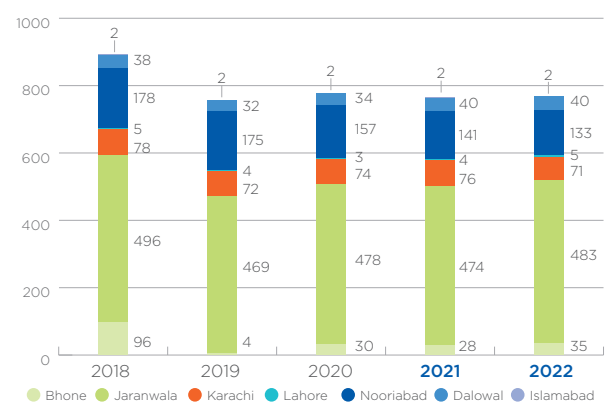
Number of Employees by Employment Type



Training Hours by Employment Type



Workforce by Region



Note: The significant increase and decrease in the workforce over the years is on account of the cyclic nature of the business.

EMPLOYEE SATISFACTION

69%

of employees are satisfied working for Crescent [FY21: 76%]

93%

of employees are committed to their jobs [FY21: 83%]

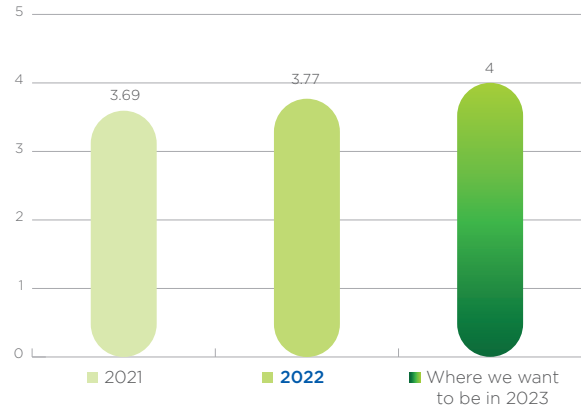
75%

of employees are satisfied about guidance and coaching provided to execute the job [FY21: 79%]

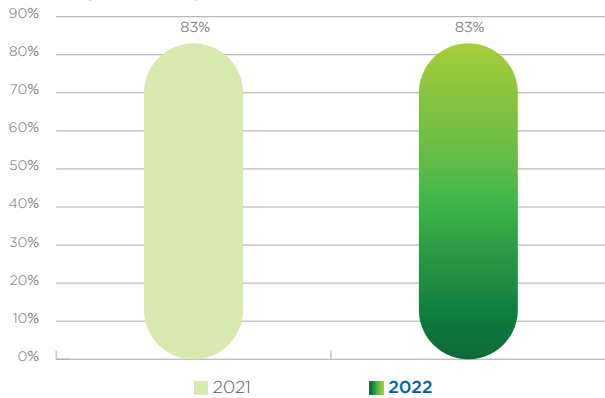
90%

of employees are satisfied that Crescent is sensitive to the safety need of employees and provides appropriate work tools [FY21: 82%]

Employee Satisfaction Index



Survey Participation Level



ENGAGEMENT AND DEVELOPMENT

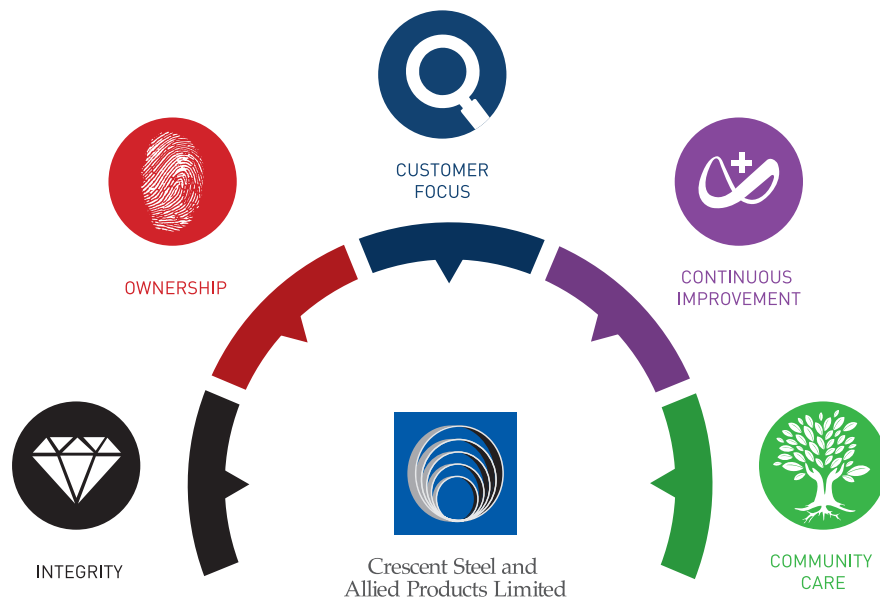
This section highlights our key employee engagement and development programs.

RECOGNIZING VALUE BEHAVIORS

Our values and guiding principles act as a compass and govern the way we carry on with work every day. They inspire us in our day-to-day affairs and gives us clarity to make decisions. Our values are embedded in our performance management systems and form a critical part of our decision making when hiring potential candidates.

We strive to ensure that our employees resonate with our values that they care passionately about helping others, value their customers, take ownership, work with integrity and honesty in all their dealings and deliverables and are always on a journey to be better.

To encourage and highlight value behaviors, we periodically hold value awareness sessions and recognize and reward employees who live the Crescent values in how they work, what they believe in and what they stand for. By recognizing and rewarding value behaviors in employees we keep them engaged with our corporate identity.



STRUCTURED TRAINING PROGRAMS

We take pride in learning and growing with our employees. Every year, the HR department proposes a training plan which includes a number of training programs and certifications to enable employees to perform effectively and efficiently.

Each year, training needs for each employee are defined and are consolidated into a training plan and a budget is prepared and approved for the following year.

We categorize trainings into four segments; production, management (includes soft skills/behavioral training interventions), quality and HSE and technical. These are further classified as internal, external, in-house and on-the-job trainings. Other than for targeted technical, statutory, and behavioral trainings we strongly believe in robust “on-the-job” trainings for our people and require those participating in external programs to impart and propagate learning across teams and the organization as relevant. All formal training is evaluated through a feedback form to gauge its effectiveness.

The formal Summer Internship program at the Head Office and Nooriabad campus was introduced to provide young students with an opportunity to develop and hone their skills, build their resumes and assess their interests and abilities.

This year we inducted 20 interns [FY21: 6 interns] across various departments at our Head Office and Nooriabad campus for a minimum period of six weeks. Our interns act as our ambassadors, enhancing our visibility as an employer. This is particularly important because as an engineering sector company with a relatively low annual intake, other avenues such as participation in career fairs and formal engagement with prospective hires is usually not feasible.

TESTIMONIALS FROM OUR INTERNS

"My experience at Crescent Steel and Allied Products Limited has been very rewarding and enriching. During my six weeks' internship, I was able to apply my academic knowledge to a real corporate setting which really helped in improving my knowledge and capabilities with respect to the Human Resources field."

Amna Khan (Intern - Corporate Affairs)

"My six weeks' journey as an intern in the IT department at Crescent Steel and Allied Products Limited has been nothing less than exceptional. From the very first day their health safety protocols and the level of professionalism in making daily business decisions amazed me. I was welcomed by the employees there with open hearts and soon I no more felt like an outsider inside that building. All my needs and problems were dealt with immediately and it was ensured that I was given the ideal opportunity to gain maximum field experience and to learn the most. The tough part was to say goodbye to everyone there but I am happy that it happened and very sure that this will reflect amazingly on my resume."

Izaan Sohail (Intern - Information Technology)

EMPLOYEE DEVELOPMENT AND LATERAL ROTATIONS

As an organization with constricted human capital depth and keeping in view, the nature of our operations, our focus remains on internally promoting talent and preparing our employees to take up additional responsibility when needed. To achieve this, as far as reasonably possible, employees are provided with opportunities to improve, enhance and refine their skills and also develop new skills.

Organization Talent Reviews are conducted annually in order to identify top talent across the organization where the management committee reviews management and

mid management talent and ranks them across 5 tiers from Black Belt (Hi-Potential/Future Leader) to Black Sheep (Poor Performer). These sessions are chaired by the CEO and for Hi-Potential employees pegged for future leadership roles, a career development plan is triggered that spans the next three years. Similarly, for those who are ranked as Black Sheep, a performance improvement plan is triggered which seeks to help employees improve performance through a structured target-based plan within a stipulated time period, generally not more than six months.

We have structured training programs in place for fresh engineers and business graduates that offer lateral rotations within and across functions. Given the depth of the organization, we do not induct a large pool of trainees every year. We also offer three-year apprenticeships at our manufacturing facilities. The apprenticeship is offered in electrical, welding, production and mechanical areas and offers substantial benefits to both the trainees and the business.

We also offer employees exhibiting strong performance and value-based behaviors opportunities for lateral rotations across functions. This enables them to see the business from the outside in, enhances skill set and helps with future leadership roles.

PERFORMANCE MANAGEMENT

At Crescent Steel, performance management is an ongoing, continuous process of communicating and clarifying job responsibilities, performance expectations, and development planning. The system is designed to optimize employee performance by aligning individual and team goals to the strategic goals of the organization.

The system provides employees with a better understanding of their aims and role within the organization and plan performance to achieve these goals.

Performance is assessed twice a year against these set targets and objectives however, performance management is an ongoing day to day process and timely, constructive and regular feedback is important for continuous improvement at all levels.

We keep our people informed on how performance is measured, reviewed and managed across the organization. Office hours for discussions, refreshers on how to self-assess and set goals are also available for staff. The staff is also engaged and informed on how performance is measured, reviewed and managed across the organization.

Performance reviews usually follow the annual talent review exercise and are used to support decisions related to employee training and career development, compensation, transfers and promotions with the ethos that everyone is assessed fairly and with a culture of open communication.

COMPENSATION AND BENEFIT SCHEMES

We reward the passion and hard work of our people with compensation, benefits and incentive programs that are inclusive and competitive. Our competitive compensation and benefits package enables us to attract and retain talent. We are committed to merit based equitable compensation, determined by qualification, experience levels, niche skills and individual performance.

The Company offers comprehensive compensation and benefit plans. In addition to traditional compensation plans of guaranteed and variable pay schemes and benefits such as company-maintained vehicles, the company offers a suite of employee benefit plans that include:

- Pension and gratuity benefits in addition to the traditional Provident Fund
- Scholarships for children of employees
- Vehicle loan scheme
- Hardship support



At Crescent Steel, we share value created with our employees, providing them with competitive wages and a range of benefits. The Company maintains a provident fund on a contribution basis; and matches the employee's contributions to the fund (at 8.33% of basic salary up to 5 years of service and 10% of basic salary after 5 years of service). Benefit funds, including both gratuity and pension, are contributed by the company at the rates of 8.33% and 20% of the employee's basic salary, respectively. Collectively, the company provides 5% of its pre-tax profits in the Worker Profit Participation Fund (WPPF). We have categorized entitlement of benefits to employees by job levels:

EMPLOYEE BENEFITS	
Life Insurance	√
Defined Contribution Plan (Provident Fund)	√
Defined Benefit Plan (Gratuity and Pension)	√
Disability Coverage	√
Maternity Leave	√
Subsidized Lunch	√
Health Care	√
Health Insurance	√
Company Maintained Cars / Mobiles	∅
Company Sponsored Vehicles (Car / Motorcycle)	Ω
Scholarship awards for children of employees	Ω
Hardship Assistance	Ω
Stock Ownership	■

√ = to all employees

∅ = to our executives and management as per business need

Ω = on application, to eligible employees

■ = generally, not available

This year 12 employees were allotted cars and 18 were allotted motorcycles through the Company Car and Motorcycle Scheme. The scheme, initially initiated with the objective of making commute easier for our employees, has helped build an equity base for our employees with many of them having availed the benefit multiple times over the course of their service with the Company.

COMMUNITY ENGAGEMENT

Our employees value our work with the communities where we operate. We continue to keep them informed and engaged in key community initiatives and programs being led by the Company and those that matter to them through the Crescent Matches Program, Crescent Cares Week and other activities around sports, arts and more.

AIIESEC GLOBAL INTERNSHIP PROGRAM

Through this program, we have provided internship opportunities to five international students. We have had a hiatus of 4 years with the last AIIESEC intern exchange in 2018 however, we plan to engage more foreign trainees in the coming years. Inviting foreign students' placement opportunities enhances diversity and provides our employees with a chance at global networking. The program promotes a culture of learning and innovation.


CRESCENT SCHOLARS

We introduced a scholarship program in 2013 to support tertiary education for children of our employees. The program is currently in its ninth year and now includes intermediate scholarship awards as well. We also offer scholarships to candidates with exceptional academic and community performance to top-tier degree programs abroad.

We have supported a total of fifteen scholars, out of which thirteen are children of our employees and the remaining two are external scholars.

Children of Employees	Program and Institute Name
Syed Muhammad Mufeez (2014)	BE - Chemical Engineering candidate at NED University; has graduated and is working as Market and Fleet Safety Specialist at Philip Morris International
Abdul Rehman (2015)	BS - Electrical Engineering candidate at Habib University; has graduated and is currently doing his Master's in Electronics Engineering (Embedded Systems) at the Politecnico di Torino University, Italy
Muhammad Taha Zaidi (2015)	BBA candidate at IBA; has graduated and is currently working as Product Manager - Digital Financing at Meezan Bank Limited
Ahmed Ali (2016)	BSc - Computer Sciences candidate at FAST; has graduated and is working as Software Engineer at Nisum
Muhammad Ans (2016)	BE - Mechanical Engineering candidate at International Islamic University; has graduated and is working as Executive Engineer at Hyundai Pakistan
Khizran Kulsoom Zaidi (2017)	MSc - Human Resources candidate at Karachi University; has graduated and is working as a System Support Analyst at National Institute of Cardiovascular Diseases
Syed Muhammad Bilal (2018)	BS - Computer Science candidate at DHA Suffa University; has graduated and is currently pursuing MS - Computer Science from FAST University
Sidra Sikandar Ali (2018)	MS - Hydro Science and Engineering candidate at Dresden University of Technology - Germany; currently in her fourth semester
Suleman Saad Thaniana (2019)	BS - Chemical Engineering candidate at Massachusetts Institute of Technology-USA; currently in his seventh semester (we have partially sponsored his education)
Munazza Zafar (2017 and 2021)	Intermediate - Pre-Medical candidate at Islamabad Model College, has completed her intermediate
	BS - International Relations candidate at Quaid-e-Azam University, currently in her fifth semester
Sidra Muhammad Ali (2018 and 2021)	Intermediate - Pre-Medical candidate at Trinity Methodist Girls' Higher Secondary School, has completed her intermediate
	PharmaD student at Hamdard University, currently in her fifth semester
Nimra Yamin (2021)	BS - Economics and Finance candidate at NED University, currently in her seventh semester
Muhammad Safiullah (2021)	Intermediate - Pre-Medical candidate at Government Islamic Science College; has completed his intermediate and currently pursuing Bachelors in Islamic Studies from Islamabad International University
Other Scholars	
Mariam Asaad (2016)	MS - Education candidate at Harvard Graduate School of Education-USA; has graduated and is working as an implementation consultant with the World Bank and is leading a curriculum design project with The Citizens Foundation
Muhammad Waqar Mustaqeem (2016)	BSc - Actuarial Sciences candidate at London School of Economics and Political Sciences-UK; has graduated and is working as an Associate Liability Management at Lloyds Banking Group

TESTIMONIALS FROM OUR SCHOLARS



“I want to thank Crescent Steel and Allied Products Limited for creating the Crescent Scholarship Program, which provides financial aid for students’ academic endeavors. Being chosen for this programme is an honor in itself for me, and it is undoubtedly a noteworthy achievement. In addition to providing financial support, this programme inspires me to work harder and more consistently in my academics. In addition, I can now start saving money for my Master’s Program, which I want to start next year. I am currently in the seventh semester of a four-year BS programme. Overall, I am convinced that with pure willpower and devotion, I will demonstrate my eligibility for this programme.”

NIMRA YAMIN
(2021 scholar)

OCCUPATIONAL HEALTH AND SAFETY

We have resolved to redouble our safety efforts and intensify our focus to avoid any accidents or incidents which could result in serious harm. Through our reporting system, we ensure a culture in which all employees are encouraged to discuss workplace safety openly. This is reflected in the growing number of preventive reports, which enables us to take prompt and more effective action to prevent unsafe situations.

Our employees are trained to emphasize and strictly adhere to the precautionary approach laid out by the United Nation's Rio Declaration on environment and development focusing primarily on principle 15.

Our Mission Zero (zero harm incidents and accidents) campaign continues, and we are shifting focus away from measuring lagging indicators to an increased focus on leading indicators with an emphasis on major risks. We also continue to strengthen engagement and encourage employees to participate more meaningfully on this critical agenda.

We have a designated quality, health, and safety department at each unit. For our line pipe operations, we have an independent quality management system, based on international standards, API Specification Q1 and ISO 9001. Being a responsible corporate citizen, Crescent Steel has also developed an integrated Health, Safety, and Environment (HSE) management system to ensure HSE compliance based on the requirements of international standards ISO 14001 and ISO 45001.

We take several safety measures within our Company such as hazards identification, risk assessments and environmental aspect impact analysis. Workers are provided with sufficient personal protective equipment and go through regular health check-ups.

These measures are all controlled by HSE related joint management-worker committees and are extended to all our workers. Each employee is required to ensure compliance with HSE policies, procedures, and instructions at their respective stations.

8 cross function teams contribute to different areas of our HSE Management system representing 100% of the pipe and coating unit workforce and directly engaging 33% of the unit's total workforce in HSE management and governance.

No incident of non-compliance with regulations and voluntary codes concerning the health and safety impacts of products and services during their life cycle occurred during the year.

HEALTH, SAFETY AND ENVIRONMENT POLICY

We strive proactively to prevent or minimize all possible causes of injury and ill health, prevent environmental pollution, minimize waste, conserve energy, enhance safety awareness, impart HSE trainings, prepare for emergencies by carrying out drills and manage environmental impact arising from the workplace, products and services that can affect the surrounding communities and the environment at large.

Crescent Steel aims to give back to the environment and invests heavily for a better standard of living. While aiming to work responsibly, Crescent Steel tries to bridge effective business management along with reduced environmental footprints.

We consult employees on matters affecting their health and safety, encourage communication and consider HSE compliance a responsibility of everybody in the organization.

We are also committed to complying with all legal, regulatory, and other HSE requirements to which we subscribe. At Crescent Steel, a comprehensive HSE management system is in place to review objectives and targets for continuous improvement while the policy is disseminated to all relevant stakeholders. Our initiatives related to occupational health and safety include:

- Yearly internal and external audits of HSE
- Analysis of all incidents, accidents, Corrective Action Requests, and unsafe conditions
- Hazard Identification and Risk Assessment (HIRA)
- HSE operational instructions have been formulated in the local language
- Safety talks are carried out monthly
- Training and practical demonstrations are conducted regularly to increase awareness and understanding of fire and safety procedures
- Emergency drills are conducted at least twice a year. Employees are urged to report unsafe work conditions and non-compliance with our HSE procedures
- Safe water: Water filtration systems have been installed at our sites and drinking water at our campuses are tested periodically
- Pathology tests are conducted annually, e.g. Blood tests, Vision test, and Sputum tests for Tuberculosis, Respiratory tests, Audiometry tests, Typhoid vaccination, Chest X-ray, HIV, and Hepatitis A and B tests
- Dosimeters and radiation alarms have been provided to the employees working in the radiography department to monitor the radiation levels
- Frequent testing of environmental parameters, noise level, and particulate emission is monitored annually
- Provision of Personal Protective Equipment (PPE)
- HSE awareness through Crescent Quarterly, regular HSE talks and other forms of communication
- Workers on welding, radiography and stripping operations are regularly examined. Welders, radiography, and stripping workers are also provided with milk to counter the effects of exposure to metal fumes

Occupational Health And Safety Targets – 2022

For Business Unit – Steel

Lost workday case	O2 (at maximum)	For our Corporate offices, Cotton Division, Crescent Hadeed, CS Energy and Shakarganj Engineering Unit, we strive to achieve zero cases of work-related injuries.
Restricted workday case	O1 (at maximum)	
Medical treatment case	O2 (at maximum)	
First aid	O2 (at maximum)	
Near miss	O2 (at maximum)	
Unsafe act/unsafe condition	O2 (at maximum)	

Occupational Health And Safety: Business Unit – Steel Division

	2022	2021	2020	2019	2018	2017
Number of injuries						
-Medical treatment cases	-	2	2	4	-	11
-Restricted work cases	-	-	-	-	-	-
-Lost workday cases	-	2	-	3	-	7
Number of occupation related disease cases	-	-	-	-	-	-
Number of work related fatalities	-	-	-	-	-	-
Injury rate (IR)	-	0.0009	0.00058	0.0019	0.0006	0.0015
Occupational disease rate	-	-	-	-	-	-

Occupational Health And Safety: Business Unit – Energy Division

	2022	2021	2020	2019	2018	2017
Number of injuries						
-Medical treatment cases	-	-	-	-	-	1
-Restricted work cases	-	-	-	-	-	-
-Lost workday cases	-	-	-	-	-	-
Number of occupation related disease cases	-	-	-	-	-	-
Number of work related fatalities	-	-	-	-	-	-
Injury rate (IR)	-	-	-	-	-	0.0010
Occupational disease rate	-	-	-	-	-	-

Occupational Health And Safety: Business Unit – Energy Division

	2022	2021	2020	2019	2018	2017
Number of injuries						
-Medical treatment cases	-	-	-	-	-	1
-Restricted work cases	-	-	-	-	-	-
-Lost workday cases	-	-	-	-	-	-
Number of occupation related disease cases	-	-	-	-	-	-
Number of work related fatalities	-	-	-	-	-	-
Injury rate (IR)	-	-	-	-	-	0.0010
Occupational disease rate	-	-	-	-	-	-

Note: - Injury Rate (IR) is calculated based on total working hours
 - Data is not captured for Cotton and Hadeed Units

SOCIAL PERFORMANCE

SOCIAL AND RELATIONSHIP CAPITAL

At Crescent Steel, Corporate Social Responsibility (CSR) is a strategic management driven approach that integrates our business, environmental and citizenship activities in a way that upholds our values. Our approach to CSR is integrated into our corporate strategy, enabling us to plan, execute and monitor CSR performance.

OUR APPROACH TO COMMUNITY DEVELOPMENT AND CSR

We look at CSR across four categories: our economic, legal, ethical, and philanthropic / discretionary responsibilities to our stakeholders. It enables us to enhance our competitive advantage and create win-win relationships with our stakeholders, in addition to realizing gains from cost and risk reduction, legitimacy and reputation benefits while recognizing the complex but interrelated nature of the relationship between CSR and financial performance.

Our philanthropic CSR policy allocates between 2% to 5% of our annual profits before tax towards donations for select social causes we support. The proportion of allocation generally follows the following pattern:

- Education - 60% at minimum
- Health and Environment - 20% at maximum
- Sponsorships - 10% at maximum
- Advocacy - 10% at maximum

OUR GOALS AND STRATEGY

MOVING FROM CORPORATE PHILANTHROPY TO A BUSINESS INCLUSIVE MODEL

The philanthropic / discretionary CSR is focused on the Pakistani community at large - it enables us to enter spaces our businesses otherwise wouldn't have an impact on. In the Pakistani context we feel strongly that we must remain committed to an educated Pakistan and that it will help uplift entire communities as the illiteracy gap begins to narrow paying both economic and human capital dividends in the future. We also seek to channel our community and social investments

towards value chain stakeholders in an organized and strategic manner and have launched structured programs that enable this on a rolling basis.

To bring greater focus and transparency to our philanthropic contributions and, to be able to monitor and evaluate our impact, we have in place a Social Investment Committee with the mandate to steer and review philanthropic CSR performance.

OUR GOALS

Our philanthropic CSR goals over the next three years focus on capturing the circumstances that we are already dealing with in our day to day work for the Company by recognizing initiatives that may already be in progress but may not be recognized as CSR:

- Understanding our value creation
- Mapping our contributions across the value chain: shareholders, employees, suppliers, customers and the community at large
- Structured programs to target key stakeholder groups: targeted scholarships, employee hardship endowments and various engagement activities
- Monitoring and evaluating the impact of our social investments: regular review and monitoring
- Employee and community volunteering: creating a strong culture of giving back

We are committed to conducting our business as a responsible corporate citizen and with an objective to improve the social infrastructure, by supporting select community welfare causes. We are proud of our role as a philanthropic leader in the communities we seek to serve and support; through structured programs we own and through non-profit entities that are closely aligned with Company's defined guidelines on discretionary CSR.

We benefit from the flexibility that social and relationship capital offers to us, particularly in times of need such as the covid pandemic crisis and the recent flood induced crisis.

Guided by our ethos, we strongly believe that it is of utmost criticality that all Pakistani children are able to go to school and seek further education and, that it is

one of the only ways to address the crises, both social and economic, that Pakistan continues to face. With 22 million out of school children, the upcoming youth bulge in Pakistan can easily turn from potential dividend to liability. Through our social investments in education, we have directly seen how good quality education can be an equaliser, uplift communities and address other challenges including health and safety practices. Our discretionary philanthropy mainstay therefore remains education with a particular focus on K-12 education, out of school children and targeted higher education support in the engineering, technology and liberal arts disciplines.

Through our contributions, we are able to contribute towards investments in human capital and talent, diversity, equality and inclusion, environmental advocacy and conservation, access to healthcare and more - many of these areas would be beyond our access through our business operations alone.

SOCIAL INVESTMENT COMMITTEE

The Social Investment Committee is a management committee appointed by the CEO to consider, review and steer the impact of our discretionary giving and interventions. The committee is guided by our corporate strategy, governed by the Business Strategy Committee, which considers the impact of our businesses and operations holistically, including from a social responsibility perspective keeping in mind, the interests of shareholders, clients, employees, communities and regulators.

The Social Investment Committee reviews the distribution of charitable contributions in line with the Company's policy for donations and charitable contributions which is set at the Board level. Terms of reference of the committee include:

- To review and recommend any changes to the Company's policy relating to Corporate Social Responsibility for the approval of the Board
- Review and recommend the distribution of charitable contributions in line with the Corporate Social Responsibility policy
- Review and monitor CSR activities, and
- Engage and measure social investments for impact

COMMUNITY DEVELOPMENT

We follow self- assessment based guidelines to measure community investments and impacts. Our operational approach is centered on:

- Community care: one of our five core values
- Management buy-in through the Social Investment Committee reporting directly to the CEO
- A defined CSR policy that allocates 2-5% of profits before tax donations
- Employee engagement
- Relationships with community partners
- Monitoring and evaluating our social investment programs

OUR CONTRIBUTIONS:

CONTRIBUTIONS (RS)	2022	2021	2020	2019	2018
IN CASH	58,963,920	13,214,236	1,627,500	2,500,500	45,937,502
IN KIND	74,091	70,781	58,608	111,111	153,213
IN TIME ³	298,690	134,642	101,584	210,657	537,012
TOTAL	59,336,701	13,419,659	1,787,692	2,822,268	46,627,727
DONATIONS AS A PERCENTAGE OF PBT (%)	CASH DONATIONS AS A PERCENTAGE OF PBT				
	18.71	3.10	(1.38)	10	3.70

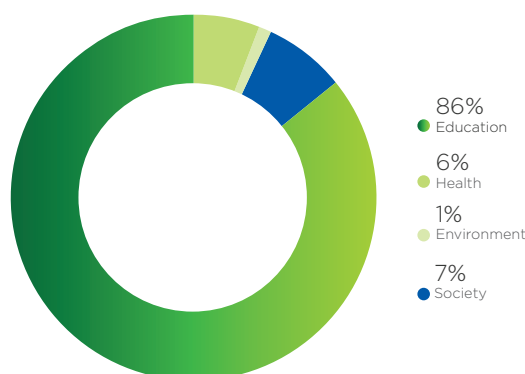
³ In time contributions have been assessed using the organization average salary per hour for the financial year.

OUR CASH DONATIONS INCLUDE CONTRIBUTIONS TO:

SECTOR	COMMUNITY PARTNER	CAUSE	CONTRIBUTION AND IMPACT
Education	The Citizens Foundation (TCF)	Operational Support (OPEX)	Contributed Rs. 29,000,000 as operational support for 10 school campuses built by us (15 of the 21 schooling units). The contribution helped educate 2,470 students
		Tertiary Scholarship Support	Contributed Rs. 595,325 as tertiary scholarship support for 5 TCF alumni enrolled in engineering and medical degrees at Karachi University, NED University, Jinnah University for Women, Institute of Space and Technology and Pakistan Institute of Engineering and Applied Sciences
		Top up - Expendable Endowment Fund	Topped up the Expendable Endowment fund being maintained with The Citizens Foundation (TCF) by Rs. 2,500,000 to support scholarships for 3 TCF alumni from Crescent Steel and Allied Products Limited campuses for higher education. The students are enrolled in programs at Institute of Business Management, Bahria University and DOW University
		Top up - Non-Expendable Endowment Fund	Topped up the Non-Expendable Endowment fund being maintained by The Citizens Foundation (TCF) by Rs. 12,023,690 taking the endowment size to Rs. 82,294,150. Investments in the fund have generated a profit of 5.32% during the year. The endowment helps us secure future OPEX for the schools built by us, particularly, in times of cash flow constraints
	National University of Sciences and Technology (NUST)	Finding Innovative and Creative Solutions for Society Program (FICS) - Prototype Development Fund	Contributed Rs. 1,000,000 to the Prototype Development Fund for National University of Sciences and Technology's (NUST) Finding Innovative and Creative Solutions for Society Program (FICS). A total of 84 teams presented their working prototypes and project ideas.
	Indus Valley School of Arts and Architecture (IVS)	Financial Assistance / Scholarship Support	Contributed Rs. 2,500,000 as financial assistance / scholarship support for students, increasing focus on education in arts
	Habib University	Named Scholarship Pledge	Contributed Rs. 2,500,000 for a named scholarship pledge for a TCF alumni for his entire degree program. The student is enrolled in Social Development and Policy Studies and we have pledged a total of Rs. 6,000,000 for his education, which will be disbursed over the course of his program

SECTOR	COMMUNITY PARTNER	CAUSE	CONTRIBUTION AND IMPACT
Health	The Indus Hospital and Health Network (IHHN)	Chemotherapy Sessions	Contributed Rs. 997,500 for 285 chemotherapy sessions, supporting excellence in free of cost healthcare service
	Patients' Aid Foundation	General Donation	Contributed Rs. 1,000,000 as general donation to support free healthcare access for people in need
	The Health Foundation (THF)	Hepatitis B and C Vaccinations	Contributed Rs. 1,000,000 for Hepatitis B and C vaccinations in the Tando Allahyar District as part of their Hepatitis Free Community Project
Environment	World Wide Fund for Nature-Pakistan (WWF Pakistan)	Mangrove Plantation and Community Visit	Contributed Rs. 850,000 for the mangrove plantation activity and excursion trip to Bhit Khori. We planted 1,000 mangroves which will reduce our carbon footprint by 5.91 tonnes annually
Society	Pakistan Centre for Philanthropy (PCP)	Research Study - State of Philanthropy in Pakistan	Sponsored a research study on the "State of Philanthropy in Pakistan" conducted jointly by Pakistan Centre for Philanthropy (PCP) and Dean of the Pardee School of Global Studies at Boston University by contributing Rs. 3,000,000
	Ayesha Chundrigar Foundation (ACF)	Mass Trap-Neuter-Vaccinate Release (TNVR) Program	Contributed Rs. 199,405 for Mass Trap-Neuter-Vaccinate Release (TNVR) Program against which 100 stray street dogs were neutered and vaccinated, promoting empathy towards animals
	Deaf Reach	Scholarship Support	Contributed Rs. 500,000 as scholarship support for 5 students for a year
	Citizens Police Liaison Committee (CPLC)	OPEX Support	Contributed Rs. 600,000 as OPEX Support, leading to a safer Karachi for all
	COMMECS Old Students' Association	Sponsorship for Advertisement	Contributed Rs. 200,000 as sponsorship for a TCF advertisement placed in their diary

Contributions in Cash and in Kind



OUR IN-TIME CONTRIBUTIONS INCLUDE:

Our CEO's time for serving on the Board of

- The Citizens Foundation
- Pakistan Centre for Philanthropy
- COMMECS

Our HoCA's time for serving on the Board of

- TCF

Our employees' time for

- Volunteering to counsel TCF students through the Rahbar program
- Volunteering to plant mangrove saplings in partnership with WWF
- Volunteering for community visits and blood drive
- Volunteering to distribute Ramadan food packs in partnership with The Robin Hood Army

EMPLOYEE VOLUNTEERING HOURS



OUR IN-KIND CONTRIBUTIONS INCLUDE:

- Items donated for Crescent Cares Week
- Commute for community visits organized during Crescent Cares Week
- Food packs distributed in collaboration with the Robin Hood Army

We took part in various initiatives during the year of which some are mentioned below. Our contributions and work with TCF are covered separately on page 79-82 of this section.

PROMOTE SOCIAL ENTREPRENEURSHIP TO BENEFIT COMMUNITIES

NATIONAL UNIVERSITY OF SCIENCES AND TECHNOLOGY (NUST)

National University of Sciences and Technology (NUST) flagship program titled Finding Innovative and Creative Solutions for Society (FICS) was initiated in 2013 with an aim to promote entrepreneurship amongst students and in return serve the communities around them.

The program motivates students to get actively involved in social problem identification and think innovatively to devise technology-based solutions.

This year, NUST received a total of 390+ ideas, out of which 128 projects were evaluated in stage 2 and 84 teams were shortlisted for the final and last stage in which they presented working prototypes of their projects to the industry.

We contributed Rs. 1,000,000 to support teams in commercializing their projects developed through FICS.



INVESTING IN CREATIVE LEADERS OF TOMORROW

INDUS VALLEY SCHOOL OF ARTS AND ARCHITECTURE (IVS)

Indus Valley School of Art and Architecture (IVS) was founded in 1990 and is widely recognized as a school of excellence encompassing the disciplines of Fine Art, Design and Architecture. The University currently offers eight undergraduate programs and one graduate program.

IVS aims to motivate and guide students to think, be curious and remain open to new experiences. To support IVS in their mission, we donated Rs. 2,500,000 to their financial assistance and scholarship fund.

SHAPE THE FUTURE

HABIB UNIVERSITY

Habib University aims to shape young minds to think in unconventional and remarkably creative ways. The University accomplishes this by providing a demanding, contextually relevant, and engaging world class liberal arts and sciences education.

The rigorous, hands-on education is set around an environment of teamwork, creativity and self-actualization and is provided to the most talented students, regardless of their financial capacity or any social considerations.



Crescent Steel supported Habib University by pledging Rs. 6,000,000 to support one TCF alumni for the entire degree program through the Habib University - Crescent Steel Scholarship. He is enrolled in the Social Development and Policy Studies Program at the School of Arts, Humanities and Social Sciences. 42% (Rs. 2,500,000) of the pledged amount was disbursed in FY22 and the remaining amount will be disbursed over the course of the program.

QUALITY HEALTHCARE ACCESS FOR ALL

INDUS HOSPITAL AND HEALTH NETWORK (IHNN)

Indus Hospital and Health Network (IHNN) is a holistic healthcare provider. It operates with the aim to provide excellent healthcare services free of cost to anyone who walks through the doors of IHNN. Through its remarkable services, IHNN impacts thousands of lives every day.

Crescent Steel collaborated with IHNN by:

- Contributing Rs. 997,500 to cover costs of chemotherapy sessions for 285 individuals.
- Organizing a blood drive at the Head Office and Nooriabad factory. Through the drives, employees donated 18,500 ml of blood to the Indus Hospital Blood Center.
- Organizing a breast cancer awareness session for our employees during October 2021. The session focused on educating employees on self-assessment for early diagnosis and better treatment of breast cancer.



HEPATITIS FREE PAKISTAN THE HEALTH FOUNDATION (THF)

The Health Foundation (THF) aims to educate the general public regarding the symptoms of hepatitis B and C and their mode of acquisition and transmission and provide financial support to those suffering from this infection, but unable to afford the expense.

Crescent Steel in collaboration with THF held a screening drive for the Nooriabad employees where 129 employees were screened for Hepatitis C. Additionally, Head Office employees were administered the third dose of Hepatitis B vaccine. The first two doses for the same were administered in FY21.

We also supported THF by donating Rs. 1,000,000 which was to be utilized for Hepatitis B and C vaccination in the Tando Allahyar District, Inayat Shah Rizvi area.

In the past we have also extended support to THF's Hepatitis Free Community Project in Rashidabad. Through this initiative, during the year a total of 5,471 people were screened for hepatitis B and C and 277 new cases of hepatitis C were registered.

REDUCE THE STRAIN ON PUBLIC HEALTHCARE

PATIENTS' AID FOUNDATION

The Patients' Aid Foundation is a public private partnership with the Jinnah Postgraduate Medical Centre (JPMC). The foundation started with managing

just a Blood Bank but today has its footprint in over 14 departments at JPMC including a state-of-the-art Cyber Knife facility offering targeted radiation treatment for cancer.

Over the last two decades, the Patients' Aid Foundation has transformed the JPMC by improving and developing systems, funding massive infrastructure projects and by providing modern equipment, machinery and human resource to different departments at the hospital. During the pandemic crisis PAF at JPMC led the city wide covid inoculations.

We donated an amount of Rs. 1,000,000 to support the Patients' Aid Foundation in providing free health care access.

ENHANCING EFFECTIVENESS OF PHILANTHROPY

PAKISTAN CENTRE FOR PHILANTHROPY (PCP)

Pakistan Centre for Philanthropy (PCP) was established with the objective to foster an enabling environment for philanthropy and support its certified organizations addressing critical issues such as healthcare, education, society, and the environment.

PCP has been documenting evidence-based information on corporate philanthropy including the volume and patterns of giving by the business sector in the country. **Rs. 3,000,000 was donated to PCP for their research study on the State of Philanthropy in Pakistan**, which is being conducted jointly with the Dean of the Pardee School of Global Studies at Boston University and is expected to be published in FY24.

MAKING EDUCATION A REALITY FOR DEAF CHILDREN

DEAF REACH

Deaf Reach, a program of Family Educational Services Foundation (FESF), was established in 1984 to challenge the notion that the deaf are 'disabled'. Deaf Reach is responsible for the development of the indigenous sign language which did not exist before. It

is one of the only branch networks of schools for the Deaf in Pakistan reaching out into rural areas, and is continually expanding its programs to further empower marginalized urban and rural deaf youth, the majority of whom are economically challenged, to provide them with a brighter future.

Crescent Steel contributed Rs. 500,000 towards Deaf Reach as scholarship support for five students for a year.

SAFETY AND SECURITY FOR KARACHI

CITIZENS-POLICE LIAISON COMMITTEE (CPLC)

Citizens-Police Liaison Committee (CPLC) is a unique private public partnership formed to rectify the deteriorating law and order situation in Sindh. It is managed by dedicated and concerned citizens and strives to monitor and prevent crimes, protect lives and property and uphold the rules of law.

Crescent Steel provided operational support to CPLC by donating Rs. 600,000.

EMPATHY THROUGH ACTIONS

AYESHA CHUNDRIGAR FOUNDATION (ACF)

Ayesha Chundrigar Foundation (ACF) was founded in 2013, to inspire people to be kind to those who cannot do anything in return and to protect the most vulnerable in society. The foundation not only works to rescue animals but to also change mindsets and encourage empathy and compassion towards them.

We donated Rs. 199,405 to ACF for their Mass Trap-Neuter-Vaccinate Release (TNVR) Program, against which 100 dogs were neutered and vaccinated.



ACCEPTANCE AND INCLUSION FOR PEOPLE WITH DOWN SYNDROME

KARACHI DOWN SYNDROME PROGRAM (KDSP)

With little resources available for individuals with Down syndrome, Karachi Down Syndrome Program (KDSP) was founded to serve as a platform that would advocate for the value and inclusion of individuals with Down syndrome and their loved ones.

During the Crescent Cares Week 2022 we organized an informative session in collaboration with KDSP about Down Syndrome and how we can play our part to make people with Down Syndrome feel empowered, included, and equal members of society.

8 employees from our Head Office volunteered a total of 16 hours to visit KDSP to learn about the organization and participate in activities with the children.

Our employees collectively raised Rs. 30,000 for the cause.

LEADING DISABILITY NETWORK OF ORGANIZATIONS WORKING FOR PEOPLE WITH DISABILITIES PAKISTAN (NOWPDP)

NOWPDP is a disability inclusion initiative working in the areas of education and economic empowerment.



They work across Pakistan to create an inclusive society through holistic and sustainable programs.

5 employees from the Head Office volunteered a total of 8 hours during the Crescent Cares Week 2022 to visit NOWPDP

BEAT HUNGER

ROBIN HOOD ARMY

Robin Hood Army is a volunteer based, zero-fund organization that works to get surplus food from restaurants and communities to serve the less fortunate.

We joined hands with The Robin Hood Army to organize iftar distribution drives at Aisha Academy Orphanage, Anmol Old Age Home, Aashiana Old Age Home and April Gills Old Age Home during Ramadan.

Our employees and Crescent Steel jointly donated approximately 200 food packs boxes and volunteered 32 hours for the distributions.

STOP CHILD BEGGARRY

SAVE OUR CHILDREN FOUNDATION (SOCF)

Save Our Children Foundation (SOCF) is a public private partnership formed by a group of committed citizens endeavoring to create a society that protects all children from child beggary, child abuse and child exploitation.

Crescent Steel in collaboration with SOCF organized an informative session on how we can help save lives



of less-privileged children. The session was attended virtually by employees from all our locations and focused on child beggary and how it can be eliminated.

TAKE CLIMATE ACTION

CLIFTON URBAN FOREST

Clifton Urban Forest is a revolutionary step towards turning Karachi into a green city of Pakistan in order to combat climate change and conserve the oceans, seas and marine resources.

6 employees volunteered 9 hours to participate in a plantation drive at the Clifton Urban Forest and to learn about how urban forests work.

CRESCENT CARES WEEK

Crescent Cares Week, an event that unites our employees every year, is designed to instill value and care for the community through various community care initiatives within our employees.

In 2022, activities planned throughout the week included community visits to Clifton Urban Forest, Karachi Down Syndrome Program (KDSP), Network of Organizations Working for People with Disabilities Pakistan (NOWPDP), informative sessions by Save Our Children Foundation (SOCF), Indus Hospital Blood Center, The Citizens Foundation (TCF), Indus Hospital's blood drive at the Head Office and Nooriabad factory and TCF students visits to our Head Office, Jaranwala and Bhone campuses.

All funds collected from these activities were donated to TCF (60%), IHHN (20%), ACF (10%) and WWF (10%). Impact of Crescent Cares is illustrated as follows:

FY22



Generated PKR 193,320 in cash donations

FY21



Generated PKR 151,341 in cash donations

FY22



Generated PKR 103,900 in Kind donations

FY21



Generated PKR 92,510 in Kind donations

FY22



Volunteered 780 hours for community service

FY21



Volunteered 855 hours for community service

FY22



Donated 18,500 ml of blood

FY21



Donated 10,500 ml of blood

FY22



Planted 26 Trees

FY21



Planted 188 Trees

FY22



Donated 18 Kg of used accessories and clothes

FY21



Donated 18 Kg of used accessories and medicines

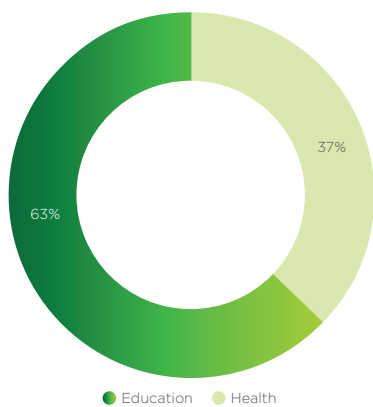
CRESCENT MATCHES

Distribution of funds raised through Crescent Matches:

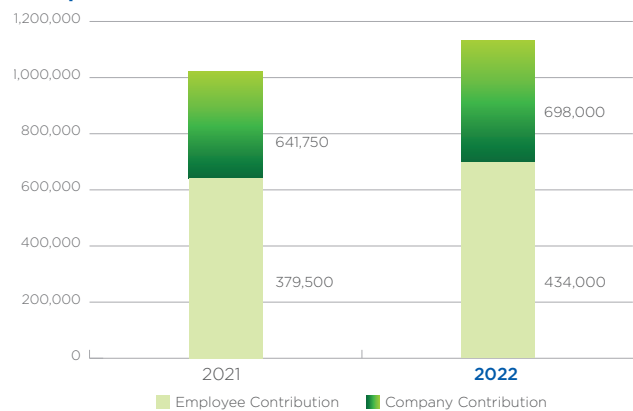
37% to TCF for EDUCATION and 63% to Indus Hospital, Shaukat Khanum, SIUT and LRBT for various HEALTH related interventions.

Crescent Matches aims to encourage giving by matching employee giving for a higher impact for direct tax credit through payroll. In 2022, the participation stood at 10 employees [FY21: 9 employees] and collections stood at Rs. 1,132,000 [FY21: Rs. 1,021,250]. Of this 38% constitutes employee contribution for the year.

Crescent Matches by Segment



Impact of Crescent Matches



ENVIRONMENTAL CONTRIBUTIONS

During the year, the Company contributed to local communities and the environment by planting trees and mangrove saplings, creating awareness and promoting conservation of Pakistan's marine environment. This is covered in more detail on page 87 of the Natural Capital section of this report.

SCHOLARSHIP SUPPORT

During the year we continued to provide scholarship grants to four students and awarded new scholarships to nine students.

- We pledged support towards tertiary education for three TCF graduates from Crescent Steel - TCF campuses. This is being disbursed to them through the Expendable Endowment Fund we maintain with TCF. The three students are enrolled in programs at Institute of Business Management, Bahria University and DOW University.
- We have also pledged scholarship support to five TCF graduates from other campuses; these students are enrolled in programs at Jinnah

University, Institute of Space and Technology, Pakistan Institute of Engineering and Applied Sciences, NED University of Engineering and Technology and Karachi University.

- We pledged scholarship support to Habib University for a TCF alumni for his entire degree program. He is currently enrolled in the BSc (Honors) Social Development and Policy program.
- Of the 13 active scholarships - 4 constitute children of employees and are funded through the CSAP Foundation through a structured program.



SUPPORTING THE CITIZENS FOUNDATION EDUCATE PAKISTAN

Crescent Steel's focus area of community investment is education. Over the years, our collaboration with TCF has proved to be an outstanding success in all aspects. Our twenty-seven year journey with TCF has been a tremendous experience. Starting with Crescent Steel Campus I in 1997, today the Company has helped build 21 schooling units (16 primary and 5 secondary) and supports operational expenses of 15 schooling units (12 primary and 3 secondary).

To date, an estimated 4,551 children have graduated from primary schools supported by us, 296 secondary school graduates from schools supported by us have been awarded intermediate and tertiary level scholarships arranged by TCF while 33 secondary school TCF graduates have received tertiary education scholarships from us. In the past year alone 155 students graduated from secondary schools supported by us. Combined enrolment in these schools today is 3,584 students, the majority of whom reside in some of the most impoverished communities of the country; 46% of these students are female.

TCF's vision to remove barriers of class and privilege and to make the citizens of Pakistan "Agents of Positive Change" is truly inspirational and we have had the pleasure of witnessing this impact first hand. Today students from TCF have joined the workforce and among them is Nadeem who has published two books and is pursuing a PhD in the US, Asad who is a fruit seller's son graduated from GIKI as a software engineer and a kulfi seller, Zulfiqar who secured an admission on scholarship at IBA. This is alongside scores of TCF graduates who have rejoined as teachers and many more who continue to play a positive role in their communities as agents of positive change. We are excited to see TCF students lead in every area and work hard to make Pakistan stronger for future generations.



Our Contribution To TCF's Footprint			
Campuses Built by Crescent Steel	Units	Location	Students
Crescent Steel Campus I	1 P (M), 1 P (A)	Ibrahim Goth	390
Crescent Steel Campus II	1 P (M), 1 P (A)	Korangi Town	353
Crescent Steel Campus III	2 S (M)	Umar Maingal Goth	376
Crescent Steel Campus IV	2 P (M), 1 P (A)	Jaranwala	489
Crescent Steel Campus V	2 P (M), 1 P (A)	Jaranwala	490
Crescent Steel Campus VI	1 P (M), 1 P (A)	Bin Qasim Town	432
Crescent Steel Campus VII	1 P (M)	Jaranwala	146
Crescent Steel Campus VIII	1 P (M)	Chiniot	149
Crescent Steel Campus IX	2 P (M)	Jaranwala	288
Crescent Steel Campus X	1 S (M)	Bhone, Jhang	154
Crescent Steel Campus XI	2 S (M)	Jaranwala	317
Total	21 units		3,584

Campuses We Helped Build					
Campus	District	Location	Campuses	Primary Units	Secondary Units
Crescent Steel Campus IV, V, VII, IX and XI	Faisalabad	Jaranwala	5	9	2
Crescent Steel Campus VIII	Chiniot	Chiniot	1	1	-
Crescent Steel Campus X	Jhang	Bhone	1	-	1
Crescent Steel Campus I, II, III and VI	Karachi	New Karachi Town		2	-
		Korangi Town	4	2	-
		North Karachi Town	-	-	2
		Malir Town		2	-
Total			11	16	5

Campuses Supported by Us				
Campus	District	Location	Primary Units	Secondary Units
Crescent Steel Campus IV, V, VII, IX and XI	Faisalabad	Jaranwala	8	2
Crescent Steel Campus VIII	Chiniot	Chiniot	1	-
Crescent Steel Campus X	Jhang	Bhone	-	1
Crescent Steel Campus I, II and VI	Karachi	New Karachi Town	1	-
		Korangi Town	1	-
		Malir Town	1	-
Total			12	3

P = Primary, S = Secondary, M = Morning, A = Afternoon

We have contributed to build 11 campuses (21 schooling units) with a student strength of 3,584 children - 46% of whom are girls - these schools employ a staff of 251 of which 174 constitute an all-female faculty. Over the course of our partnership with TCF, we have donated Rs. 386.9 million since 1995 at an average rate of Rs. 14.32 million per year.



SUCCESS STORIES

- Three TCF students were enrolled in the BSc Applied Physics, BSc Software Engineering and BSc Biomedical programs at NED University. The Company pledged to support their education. Two of them have graduated.
- Two TCF students were enrolled in BE Electrical Engineering program at FAST University. The Company pledged to support their education. Both of them have graduated.
- Two TCF students were enrolled at Bahria University and COMSATS. The Company pledged to support their education. Both of them secured Ehsaas Scholarship.

STORY OF TCF – CSAPL CAMPUS ALUMNI DR. SIDRA SALEEM

“From a kindergartner at the TCF-Crescent Steel Campus, clutching her mother’s finger and peering into a classroom for the very first time, to topping in high school and making it into Karachi’s prestigious DOW Medical College against great odds. Last year, Sidra completed a rotation for pediatric neurology at the University of Illinois. Currently, she is interviewing for residency programs in the US. She believes that TCF-Crescent Steel Campus was not only a school, it was a school, home, tuition and a moral training platform where besides academic education, teachers were

trained to boost morale, give confidence, identify talents and guide career avenues. They encouraged us to be responsible human beings and citizens, and build personalities, while also making opportunities available and visible to students who were completely alien to these concepts. She said, “I can never forget those 11 academic years in TCF-Crescent Steel Campus which clearly reflect who I am. It removed class barriers, inculcating hope and courage to move forward and compete on the basis of a quality education, knowledge and intelligence.”

MODE OF ENGAGEMENT	INPUTS	OUTCOMES
Operational Support	Contributed Rs. 29 million towards school support.	The investment was utilized in managing the operational expenditures of the school and student's fee subsidies. This has supported 2,470 students in 15 school units.
Investing with TCF	The Expendable Endowment Fund maintained with TCF was topped up by Rs. 2.5 million. The fund is being maintained to reward post-matric scholarships to TCF students. The fund earned a profit of 10% in FY22 [FY21: 10.17%], totaling the endowment size to Rs. 4,754,620 [FY21: Rs. 2,819,390].	We have pledged to support three CSAP school graduates from TCF at Bahria University and Dadabhoy Institute of Higher Education through this fund for the entire duration of the program. The students are an alumni of Crescent Steel campus III.
	The Non-Expendable Endowment Fund maintained with TCF earned a profit of 5.31% in FY22 [FY21: 10.19%] totaling the endowment size to Rs. 82,294,150 [FY21: 66,119,414].	The Endowment Fund will enable TCF to invest funds for financial returns. We plan to build the endowment to fund operational support for school units built by us or to utilize it for a new school unit.
Scholarship Support	We contributed Rs. 595,325 as scholarship support for five students.	Pledged to support five undergraduate candidates in programs at Jinnah University, Institute of Space and Technology, Pakistan Institute of Engineering and Applied Sciences, NED and KU for the entire duration of their programs.
Governance Support	Our CEO, a founding director of TCF and our HoCA serve on the Board and provide key oversight on strategy and governance.	Time volunteered by our CEO and HoCA for Board and other meetings to set strategic direction, ensure transparency and good governance. The association also helps build trust among key stakeholder groups.
Volunteering Support	Two employees participated as mentors in the 7 week structured Rahbar Program.	Our employees volunteered 77 hours to mentor students through the Rahbar Program during the year.
	Forty-one employees registered as Baghbans to help raise funds for TCF.	To date, our employees have raised Rs. 2,608,854 in donations through their efforts.
Multiplying our Impact	Rs. 141,000 [FY21: Rs. 141,000] were donated by employees to TCF through the Crescent Matches program.	Employee donations were matched at a ratio of 1:2 totaling donations to Rs. 423,000 [FY21: Rs. 423,000].
Sponsorship	Sponsored Rs. 200,000 for a TCF advertisement in the COMMECS Old Students' Association magazine.	The advertisement reached multiple audiences and created awareness regarding TCF.
Other Engagements	During Crescent Cares Week, students from TCF schools visited our Head Office, Jaranwala and Bhone campuses and were provided a briefing on various operations of each department.	The visits proved to be a learning experience for TCF students and our employees alike.

We believe that TCF is the only high impact organization providing quality primary and secondary education in less privileged areas across Pakistan and we are proud of our association with them. We regularly review activities, progress and the impact of our investment in TCF. Our employees regularly visit TCF schools and interact with the staff, community, and students.

Currently, TCF runs a network of 1,833 school units with a student strength of 280,000 children of which almost 50% are girls and employs a teaching faculty of approximately 13,000 females.



OUR COMMUNITY PARTNERS IN 2022



THE CITIZENS FOUNDATION

The Citizens Foundation

Builds and manages schools providing quality education in less privileged areas across Pakistan



World Wide Fund

Leads the environmental conservation and awareness agenda in Pakistan and across the globe



Indus Hospital

Provides free of cost premium healthcare in Pakistan



THE HEALTH FOUNDATION

The Health Foundation

Works towards a hepatitis free Pakistan



The Robin Hood Army

Works towards making food consistently available to everyone who needs it



Citizens Police Liaison Committee

A non-political statutory institution, working towards ending social crimes in Sindh



Deaf Reach

Works towards empowering the deaf community of Pakistan through education, skills training and career development



Sindh Institute of Urology and Transplantation (SIUT)

Provides free of cost treatment of urological and nephrological ailments, oncological treatments, treatments of hepatic and gastrointestinal diseases and organ transplantation facilities to the general public



Layton Rahmatullah Benevolent Trust

Works with patients to provide comprehensive eye-care, ranging from simple refraction to the most advanced retinal surgery and corneal transplants



Shaukat Khanum Memorial Cancer Hospital and Research Centre

Shaukat Khanum Memorial Cancer Hospital and Research Centre

Provides quality healthcare and treatment to cancer patients



National University of Science and Technology (NUST)

Works to promote social entrepreneurship amongst students



Indus Valley School of Art and Architecture (IVS)

Dedicated to producing exceptional artists, designers and architects



Habib University

Preeminent institution of higher learning



Patients Aid Foundation

Alleviating the burden on Jinnah Postgraduate Medical Centre (JPMC)



Pakistan Centre for Philanthropy (PCP)

Works to create greater visibility of philanthropic giving with an aim to enhance the effectiveness of local giving for social development in Pakistan



Ayesha Chundrigar Foundation (ACF)

First and largest animal rescue organisation in Pakistan



COMMECS Institute of Business and Emerging Sciences

Imparts quality business education to students

CSAP FOUNDATION

CSAP Foundation has been established with the aim of bringing greater focus to our philanthropic CSR. The Foundation was granted tax exemption from FBR in 2018 (currently under renewal) and is operative as a non-profit organization.

The main objectives of the Foundation are:

- To consolidate our philanthropic agenda and social contributions under one umbrella
- To bring more focus to philanthropic CSR and community development objectives
- To bring greater focus, accountability, and transparency to our societal investments
- To enable access to funds and strategic partnerships

The Foundation focuses on improving the social infrastructure by supporting community welfare causes and in giving back to the society. Focus areas of the Foundation are:

- Providing shelter for the underprivileged
- Supporting educational institutions
- Establishment of libraries, research centers, museums, galleries, academies, and handicraft centers
- Awarding scholarships to outstanding students and scholars
- Establishing hospitals, clinics, dispensaries, centers and places of medical aid and relief
- Establishment of convalescent homes, maternity homes, and homes for the needy
- Promoting and creating awareness of health issues

- Providing medical assistance to deserving individuals
- Providing financial and other aid to the destitute to make them financially independent
- Taking measures to promote the development of science and technology which will contribute to the prevention of environmental pollution
- Promoting, financing, establishing, running and managing autonomous educational and medical institutions
- Promoting awareness of environmental issues
- Persuading and assisting in the control of pollution in all its forms and in the preservation of the living environment
- Encouraging and assisting in the promulgation of environmental laws, policies, rules, and regulations

Over the years CSAP Foundation has made contributions to various community partners in the education, health, environment and societal sectors. We are currently re-assessing the value of having a separate foundation for our discretionary CSR and while it does bring focus to CSR activities, weighing this against the operational asks and hurdles of having to repeatedly obtain a tax exemption certificate, which comes with its own set of bureaucratic challenges.

On account of a pending tax exemption status, activities through the Foundation have been kept at a minimal as it would otherwise attract a double tax incidence to the Company. We realize that the multidimensional focus of the foundation and its ability to access capital other than from Crescent Steel will enhance the effectiveness of our philanthropic CSR.

We are working on this and hope to have the exemption status renewed in 2023. Consequently, during fiscal year 2022, the foundation made a total contribution of Rs. 297,901 in the education sector [2021: Rs. 1,279,350] from existing endowed funds and against active scholarship awards.

ENVIRONMENT PERFORMANCE

NATURAL CAPITAL

RESOURCE CONSERVATION FOR SUSTAINABLE FUTURE



As a responsible corporate citizen, we seek to reduce our environmental footprint within our communities and value chain, working with our partners and peers to address the climate change challenge and contribute towards global targets for CO₂ emissions reduction. We believe that it's our responsibility to reduce the environmental impact of our activities and in doing so embrace necessary innovation and technological change.

Our investment decisions to monitor and mitigate the environmental impact of our operations are guided by our philosophy of minimizing environmental impacts and improving resource efficiency. The manufacturing and coating of pipes, melting scrap to produce and billets and the production of yarn, involve some energy intensive processes, use a lot of water and, within the value chain produces emissions and pollutants.

The social, financial, and physical risks of climate change and the global action to reduce greenhouse gas emissions are driving industry leaders, including Crescent Steel, to find new solutions for reducing their footprint by improving energy efficiency and using new technologies to meet the global objective of achieving a low carbon society. New technologies and practices bring benefits that are both economic and environmental, from materials recycling as part of the circular economy, to harnessing cleaner energy.

We are constantly working to reduce our environmental footprint and preserve the natural environment around us.

ENVIRONMENTAL PERFORMANCE



We do not operate in an industry with high direct greenhouse gases' intensity. The nature of our direct business operations also does not pose other significant environmental risks.

MANAGING THE IMPACT OF OPERATIONS ON THE ENVIRONMENT

We have policies and procedures across the value chain to reduce energy consumption and reduce our environmental footprint. Our efforts include:

- Our core products line pipes help transport hydrocarbons economically and safely across cities and communities. The pipes we produce are also used for safe, reliable and environmentally friendly transportation in water and wastewater systems.
- Supporting a sustainable supply chain, supplier Code of Conduct including environmental risk minimisation in the supply chain.
- Use of recycled steel scrap generated in our manufacturing process.
- Efficient use of energy including enhancing clean energy options where possible.
- Responsible use of water including recycling where possible.
- Efficient use of material and minimising waste.
- Conducting better lifecycle evaluations to understand the impact of our products on the environment.
- These efforts help us in in minimising our environmental footprint in operations and products and helps maintain our license to operate.

EMISSIONS

Pakistan has an insignificant carbon footprint globally, yet it ranks among the top 10 countries most vulnerable to climate change.

The nature of our business is such that direct operations pose no significant environmental risks, however as responsible corporate citizens we continuously strive to limit the negative impacts our operations can have on the environment. As part of this approach we have in place an emissions control policy and all our emissions and discharges are compliant with the prescribed limits set out by the National Environmental Quality Standards (NEQs). Our commitment and approach towards our stakeholders enables us to manage the environmental impact of our business.

Major direct emissions at our line pipe manufacturing and coating site are from plasma arc cutting and the stripping station at the coating unit. For monitoring, we employ an external agency, which analyses emissions from all sources on a quarterly basis when our manufacturing units are operational and functional. We follow ASTM (American Standard for Testing Materials) and other international standards as testing methodologies as a testing

methodology for emissions and further conform to the limits prescribed by SEQS (Sindh Environmental Quality Standards) to control emissions. Tables are presented in the glossary, which further explain this.

At the steel melt shop and power plant, the primary source of emissions is the induction furnace, which uses an induction process to melt steel scrap that is relatively more efficient on energy consumption and, the bagasse furnace for combustion which is environmentally friendly when compared to conventional fossil fuel-based power generation. The meltshop unit also has a state-of-the-art air pollution control system to capture dust and metal particulates released in the melting process to minimise the environmental impact of our process.

Other sources of direct CO₂ emissions are primarily fossil fuel based back up power generation units at our manufacturing sites and company owned vehicles. The main source of indirect CO₂ emissions is the energy we purchase and consume from the national grid across our campuses.

- Over the years Nitrogen gas was substituted with Oxygen gas to reduce NO_x level from 1357 mg/Nm³ to less than 400 mg/Nm³
- Water discharged from our coating unit was neutralised to bring PH levels between 7 - 10.

The HSE Committee at each manufacturing location and our corporate office sets out goals to manage their environmental impact either by deploying newer technologies that help reduce emissions or by augmenting capacity for greener and more efficient energy consumption. Our measures go beyond complying with the national standards enforced by the Pakistan Environmental Protection Act (PEPA) and National Environmental Quality Standards (NEQs). This includes emissions of Sulphides (SO_x Gases), Nitrides (NO_x Gases), Particulate Matter, Ozone Gas, Volatile Organic Compounds, Ozone Depleting Substances (including CFCs and Freon), Carbides, and any other such emissions.

We did not directly face any significant financial impacts associated with climate change related incidents; however, Pakistan faced a major climate catastrophe where monsoon induced flooding swept away billions in infrastructure and left millions displaced with little means of sustaining themselves.

BREAKDOWN OF CRESCENT STEEL'S EMISSIONS

SCOPE-I

Greenhouse gases have a significant effect on the environment and its surroundings regardless of the presence of human life. Therefore, we strive to reduce emissions in every aspect, whether it is our production line or our daily consumption of fossil fuels.

Considering that our country is most likely to be affected by climate change in the coming years, we acknowledge that it is not only our choice but our obligation to contribute to the global effort to reduce GHG emissions.

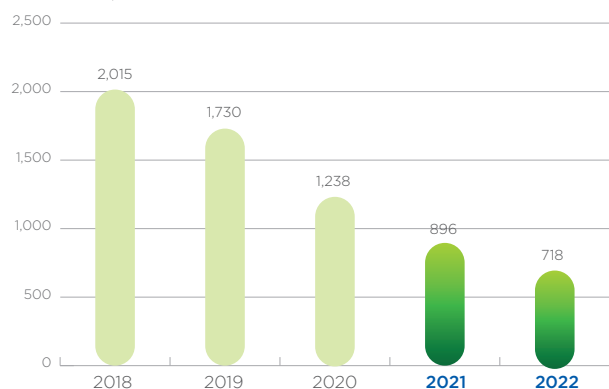
Crescent Steel's direct emissions are primarily the result of our production processes, which directly affect the environment and are unavoidable. Direct CO₂ emissions are measured and recorded monthly at every plant site and location and are then totalled for the presentation of collective direct GHG emissions.

The sources of CO₂ emissions include fuels used for the pipe and billet manufacturing, steam from our power plant and from the process of power generation. The GHG figures represent all direct emissions of our associate companies and subsidiaries. CO₂ serves as the major contributor to our total direct GHG emissions.

Crescent Steel's consolidation of GHG gases does not include biogenic emissions of CO₂ at any production site across its locations of operation. As the Global Warming Potential (GWP) values indicate, our direct GHG emissions are sourced from the Intergovernmental Panel on Climate Change (IPCC) established by United Nations Environment Programme (UNEP) and World Meteorological Organization (WMO). The Company has used the previous year as a base year as per its general practice.

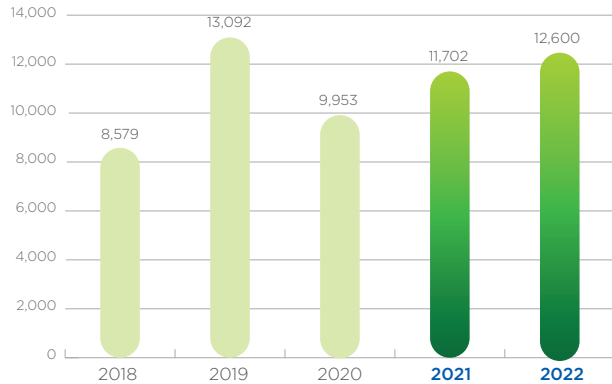
Direct GHG Emissions

(tCO₂e) (Scope 1)



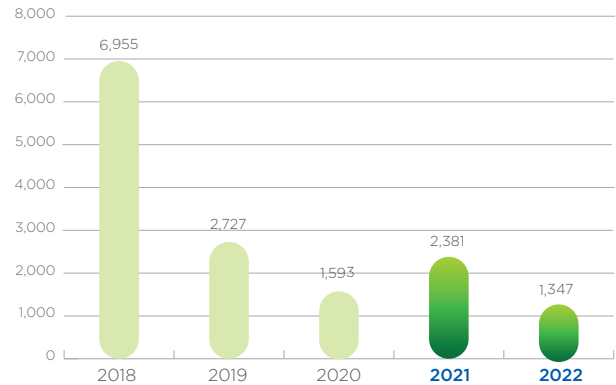
Indirect GHG Emissions

(tCO2e) (Scope II)



Indirect Emissions

(tCO2e)



Prior to 2016, there was no mechanism for recording fleet fuel consumption.

SCOPE-II and SCOPE-III

Our indirect GHG emissions are not significant in the long run but our commitment towards the community obliges us to adhere every aspect of environmental care. As a result, we inform every employee regarding the importance of reducing emissions in everyday life and its role in climate protection. Crescent Steel produces indirect emissions (SCOPE-II) in the form of external energy purchased by WAPDA.

We continuously explore all opportunities to reduce energy consumption and invest in renewable sources of energy to reduce emissions as much as reasonably possible. The other indirect emissions (SCOPE- III) pertain to the emissions caused by the fuel consumed in vehicles owned and used by the Company. The Company uses its fleet fuel card's total consumption as a basis to record its consumptions and uses conversion factors as per IPCC guidelines to convert the respective units in terms of CO2 equivalent units.

Similar to direct emissions, the company uses the previous year as a base year as per general practice. Gases included in SCOPE-II are CO, SOx, and Oxides of Nitrogen while SCOPE-III, include Fluoride and Forklift emissions.

Noise and vibration form part of our focus area, however, impact of these is not measured. We have however, mandated the use of ear plugs and have regular noise monitoring in place during production. Furthermore, the Company used the Fifth Report Assessment (AR5 from IPCC) as a source for the GWP rates used which depicts Global Warming Potential (GWP) values for a 100-year time horizon. For SCOPE-II, we have presented total indirect emissions instead of a location-based representation of emissions.

REDUCTIONS IN EMISSIONS

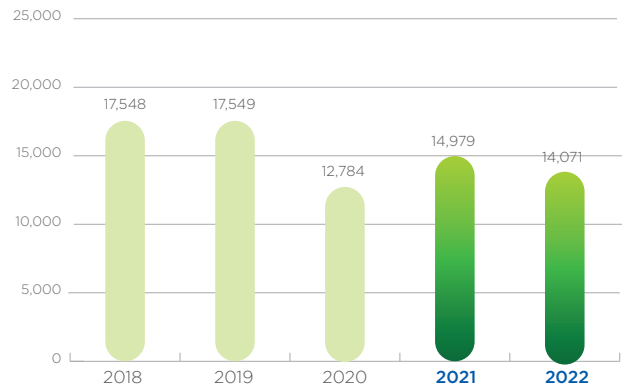
(SCOPE-I, SCOPE-II AND SCOPE-III)

We strive to reduce emissions in the atmosphere, whether direct or indirect. The following graphs illustrate total emissions on an annual basis. Combining all scopes, our total emissions have decreased when compared against the past year. We review our emission outcomes monthly.

Independently, Scope-I emissions have decreased by 179 metric tonnes [FY21: 341 metric tonnes] over the year while Scope-II emissions have increased by 304 metric tonnes [FY21: 1,749 metric tonnes] and Scope-III is decreased by 2,057 metric tonnes [FY21: 788 metric tonnes] respectively over the last year. This is aligned with a reduction in production and sales and, the installation of 582.4 MW in solar capacity at one of our production sites.

Total Emissions

(MT) per Year



GHG EMISSIONS INTENSITY



Emissions Intensity Ratio
(Total Emissions / Sales)
reduced by 2.5%

Emission intensities are used to compare the environmental impact of different activities. Crescent Steel uses sales as an organization-specific metric to calculate its emissions intensity ratio – this is because of varied production across Business Units. SCOPE-I, SCOPE-II, and SCOPE-III are the types of GHG emissions included in the calculation, containing all the gases mentioned in their respective scopes. Total GHG emission decreased by 1,932 CO₂/MT or 12.9% in absolute terms as compared to last year [FY21: 2,196 MT CO₂/MT] against a decrease of 2% in sales over the prior year. The emissions intensity ratio for FY22 was 0.00016 MT CO₂/MT last year [FY21: 0.00018 MT CO₂/MT], which is an 11% decrease from the previous year.

Our production processes do not emit any ozone depleting substances (ODS), however, we do carry some HVAC units that use R-22 gas which are being phased out and for which ODS emissions are not presently monitored. We plan to commence reporting on ODS emissions if any, starting FY22. The company's health, safety, and environmental policy discourage the use of Ozone-depleting substances as they cause significant harm to the environment. All emissions are recorded with the help of consumption patterns of fuel and output generation.

AIR POLLUTION CONTROL SYSTEM

We have taken appropriate measures to go beyond complying with the minimum national standards enforced by the Pakistan Environmental Protection Agency by adhering to globally recognized standards of air pollution control at our steel billet manufacturing facility. Gaseous emissions and metal dust is the most prominent form of waste in the steel melting process while primary wastes produced in casting steel are contact water, oil, grease, and metal scraps. The unit is equipped with air pollution control systems with air filtration capacity of 50 mg/Nm³ against national standards that require air pollution control system with filtration capacity below 100 mg/Nm³.



ENERGY

Our businesses are manufacturing intensive and financial performance is heavily dependent on reliable sources of energy.

Therefore, our energy efficiency strategy calls on us to explore avenues of self-generation and secure reliable power while maintaining cost, quality and environmental leadership.

We constantly explore new methods which can reduce our dependency on the national grid and mitigate the risks pertaining to power outages. For instance, at our office, we continue to take measures regarding the conservation of energy by switching off all air conditioners and all unnecessary lights for two hours daily. Through such practices we aim to develop a culture of energy conservation.

Goals of energy consumption and conservation are set yearly by the management. Our energy consumption is measured through our electricity provider and billing for energy use. Policies pertaining to energy are under the jurisdiction of the Health, Safety and the Environmental committee which are reviewed every year and presented to the CEO for approval.

ENERGY EFFICIENCY

To manage our energy consumption, reduce our dependency on the national grid and mitigate the risk of recurring power outages, we have:

- Back up gas power generators and solar power at our line pipe manufacturing site.
- 1.8KW Solar power at the fabrication facility in Dalawal and at our spinning unit in Jaranwala.
- Replaced old lights and air conditioning units with energy efficient ones across all our sites.

CS Energy Initially equipped with a 15 MW cogeneration, thermal generation power plant at Bhone, Punjab. The unit also employs a 16.5 MW condensing and extraction turbine to process steam during off-season periods to ensure uninterrupted supply to Crescent Hadeed Division-Billet Manufacturing Unit throughout the year and Shakarganj Limited. Our Energy Scorecard on page 91 of this report reflects the energy produced at this plant. The business unit also operates a subsidiary with a mandate to set up a 100 MW Solar Power plant.



2022

123,719 tons of bagasse and 21,213 ton of stream used to generate 24,724 MWh renewable power

ENERGY AND WATER CONSERVATION

The following energy conservation measures have been taken:

- Water recycling system at the ultrasonic testing machines of SP2003 were installed to save electricity at approximately 2 units per hours of production and to conserve water of approximately 10GPH.
- Tungsten bulbs, energy savers and fluorescent lights were replaced with LED bulbs at various locations saving approximately 4.2 units per hour and approximately 33.6 units per day.
- Twenty-five 400-watt lights (10 kW) replaced with twenty five 200-watts LED lights (5 kW) for yard lighting resulting in 50% saving.
- Motion sensors were installed in meeting rooms at the Head Office to automatically power off lights and equipment.
- Replaced five 1.5 tonnes of window air conditioning units by two 1.5 tonnes and three 1 ton split inverter type air conditioning units.

MAJOR ADVANTAGES

REDUCED CONSUMPTION

- Recycling water at the ultrasonic testing machines will save water consumption of approximately 10GPH.
- Installed solar power system of 561.6 kWh rating will reduce electricity consumption of approximately 850,000 KWH per year from WAPDA and/or fossil fuel based generators and will also reduce an estimated 420 tonnes of CO₂ emissions per year.
- LED lights will help in reducing electricity consumption by up to 40%.
- Inverter air-conditioning will help conserve an estimated 20% of energy consumed as compared to conventional air-conditioning.
- Installed skylights for natural light at our pipe plant sheds, through which we are saving an estimated 60 units per day.

ENERGY REDUCTIONS

Energy consumption in 2022 decreased by 7% due to limited number of orders in business volumes which is reflected in lower sales turnover. The change in consumption is calculated annually, taking the previous year as a base year.

Solar Panels

The Company is committed to increasing its use of renewable energy sources. One of the key projects being pursued in this area is installing a solar power system to generate clean and economical energy to reduce greenhouse gas emissions and reliance on fossil fuels or grid-based power. This year, the Company increased solar energy utilization from 20.8 KW to 582.4 KW at the Steel plant. This initiative will help save 3,060 GJ of energy and reduce CO₂ emissions by 420 tonnes every year. The plant is also now approved for net metering from the DISCO.

ENERGY SCORECARD

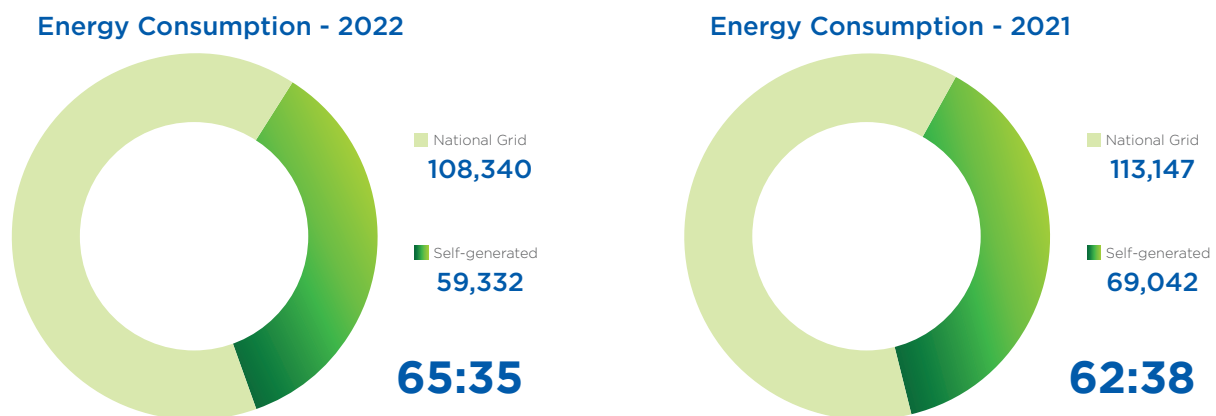
ENERGY CONSUMPTION (GJ)	2022	2021	2020	2019	2018
Energy Consumption within the Business (GJ)	167,662	182,226	128,499	247,169	339,126
Energy Consumption outside the Business (GJ)	43,158	44,051	31,788	29,553	34,417
Total Energy Consumption (GJ)	210,820	226,277	160,287	276,722	373,543

	2022	2021	2020	2019	2018	CHANGE (2022 VS. 2021)
Total energy consumption (GJ)	210,820	226,227	159,970	276,722	373,543	(6.8%)
Sales (Rs. in million)	8,300	8,495	4,473	7,285	11,463	(2.3%)
Sales per unit of consumption (Rs./GJ)	39,372	37,542	27,961	26,327	30,687	5%
Energy intensity ratio MT CO2 %	2.5	2.7	3.6	3.8	3.3	(7.4%)

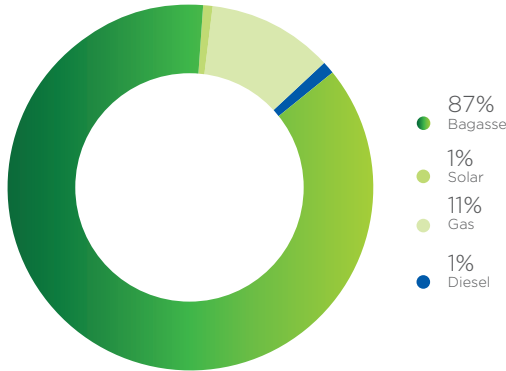
Fuel Type	Self-Generated Energy (GJ) 2022	Self-Generated Energy (GJ) 2021	Self-Generated Energy (GJ) 2020	Self-Generated Energy (GJ) 2019	Self-Generated Energy (GJ) 2018	Consumption Pattern
Diesel	1,146	1,006	1,474	2,172	4,178	Consumed within the business
Gas	11,381	14,657	20,117	27,972	30,427	Consumed within the business
Bagasse	89,008	97,312	58,282	103,600	163,548	Supplied to the industry
Solar	945	128	125	122	93	Consumed within the business

Fuel Type	Purchased Energy (GJ) 2022	Purchased Energy (GJ) 2021	Purchased Energy (GJ) 2020	Purchased Energy (GJ) 2019	Purchased Energy (GJ) 2018	Consumption Pattern
WAPDA/ K-Electric	108,751	113,174	79,972	143,450	175,297	Consumed within the business

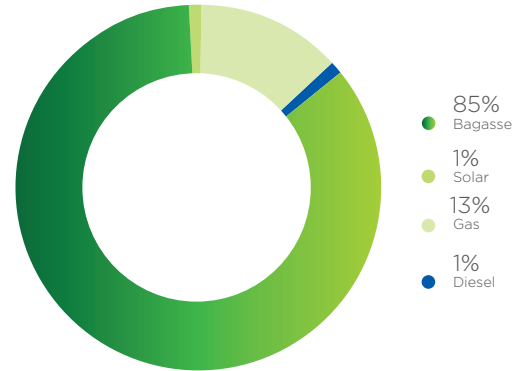
PROPORTION OF ENERGY SELF-GENERATED AND FROM THE NATIONAL GRID



Break-up Of Self-generated Energy - 2022



Break-up Of Self-generated Energy - 2021



ENERGY CONSUMPTION OUTSIDE THE ORGANIZATION

Recording energy consumption outside the organization presents many challenges. We do not have any scale to measure this consumption. However, we do record our energy consumption in terms of inbound and outbound logistics which relates to fuel consumption by the company's own vehicles and select logistics partners for contracted vehicles. The total consumption in terms of fuel is 19,238 GJ which decreased by 43% from the corresponding period last year [FY21: 34,010 GJ] and includes consignment and scrap metal shipment from Karachi Port to our plants at Nooriabad and Bhone, and vehicles maintained by the company. We measure this consumption with the help of fuel cards given to drivers before the initiation of any shipment. The consumption is recorded in litres consumed and then converted into Giga-Joules. The conversion rate is mentioned in the glossary.

WASTE MANAGEMENT



We work to minimize the wastes resulting from our operations by reducing material consumption and reusing or recycling waste material as far as reasonably possible. We continue to advocate environmental responsibility in our actions through advocacy and communications. Where reuse is not possible, we ensure proper disposal of waste matter in accordance with local regulations and international best practices. Disposal methods include landfilling, recycling, and incineration.

Our approach towards waste minimization is essential for a cleaner and healthier environment. Policies are steered by the HSE committee, which contributes to the company's precautionary approach regarding environmental hazards as much as possible.

In 2022, no monetary fines or sanctions for non-compliance with environmental laws and regulations have been imposed.

WASTE TREATMENT

Business Unit	Type	Specification And Units	2022	2021	2020	2019	2018	Treatment
Steel	Hazardous	Plastic bags, drums etc. (in numbers)	10,730	3,000	10,000	43,008	39,008	Sold for recycling/reuse
		Tube lights and Sodium Discharge bulbs (in numbers)	-	-	30	-	90	Incinerated
	Non-hazardous	Steel scrap (in tonnes)	280	733	609	2,246	5,800	Sold for recycling/reuse
		Miscellaneous Scrap Empty Carton (No)	1,000	150	500	4,700	6,660	Saleable
		Polyethylene/ Polypropylene (in tonnes)	7	7	21	52	79	Sold for recycling/reuse
		Debris, kitchen waste and others (in tonnes)	13	12	10	15	16	Landfilled
	Cotton	Hazardous	Cotton dust (in Kg)	72	39	67	61	48
Non-hazardous		Cotton waste (in tonnes)	307	379	327	264	301	Sold for reuse
Engineering	Hazardous	Bulbs and lights (in numbers)	223	250	89	129	166	Landfilled
Crescent Hadeed	Non-hazardous	Acid Lining SiO ₂ (in Mtn)	582	685	320	336	679	Landfilled
		Slag(in Mtn)	884	769	342	881	2,059	Landfilled
		APC Dust (in Mtn)	112	46	25	96	142	Sold to Client
Total			14,210	6,069	12,364	51,788	55,049	

Includes cotton dust, cotton waste and APC dust from Hadeed sold to external parties.

RESOURCE CONSERVATION

Our business depends on the availability of quality materials which primarily include hot rolled coil, raw cotton, bagasse, and scrap. Our cost of doing business and profitability depends on responsible consumption and effective waste management.

The Company has various initiatives in place and barring items necessary for consumption in business operations and production, everyone is encouraged to reduce the use of all materials as far as possible.

PAPER

We aim to reduce, recycle and reuse paper in our daily work.

WATER MANAGEMENT



A methodology is important to distributing optimal policies of water management.

Water issues and how they are overseen at locations change essentially due to locality conditions such as water accessibility, water quality and legislation.

Water Withdrawal from Various Sources (in liters)						
BUSINESS UNIT	SOURCE (LITERS)	2022	2021	2020	2019	2018
Energy	Condensate from sugar process	193,789	178,262	130,357	128,385	168,331
	Condensate water used by the turbine generator	19,367	31,315	4,051	61,304	126,879
	Groundwater	4,116	4,012	1,775	30,803	55,155
Steel	Groundwater	10,240,604	13,288,419	10,879,043	14,094,797	15,024,354
	Lake water	15,360,906	19,932,629	16,318,565	21,142,196	22,536,532
Engineering	Groundwater	408,271	431,511	356,680	965,371	1,192,478
Head Office	Municipal Water	795,822	769,739	604,112	777,436	973,477
Total water consumption		27,022,857	34,635,887	27,690,921	36,422,856	39,103,729

Note: We do not have a mechanism to measure water withdrawal at the Cotton Division.

The Company uses the-state-of-the-art machinery at its locations where technically possible, to circulate water uninterruptedly after use in order to re-cool it for reuse. This cooling method is environmentally friendly and has reduced the withdrawal of fresh water.

Total Water Discharge (Liters)-by Quality and Destination						
Business Unit	2022	2021	2020	2019	2018	Quality And Destination
Steel	1,017,615	325,372	390,658	1,149,900	1,220,900	Treated, drained to municipal sewer
Engineering	189,471	191,011	165,080	210,018	189,642	Untreated, drained to the municipal sewer
Energy	193,789	178,262	130,357	128,385	168,331	Treated, drained to SML drainage system
Total	1,400,875	694,645	686,095	1,488,303	1,578,873	

No water source was significantly affected by the withdrawal of water.

WATER REUSE AND RECYCLING



We understand that water is a scarce resource and wherever we find opportunities to conserve, reuse or recycle water; we do so.

- Water is redirected and reused for pressure testing of pipes and to cool pipes in the coating process.
- At our bagasse-based energy plant in Bhone, we reuse water for production of steam to generate electricity.

Percentage and Total Volume of Water Recycled and Reused

Water recycled /reused	Business Unit	2022	2021	2020	2019	2018
Total water recycled/reused m3/year	Steel and Energy	10,527,938	2,950,723	9,498,881	39,318,885	42,118,538
% of water recycled/reused		41.97%	9.40%	34.93%	131.94%	109.22%

PLANTATION



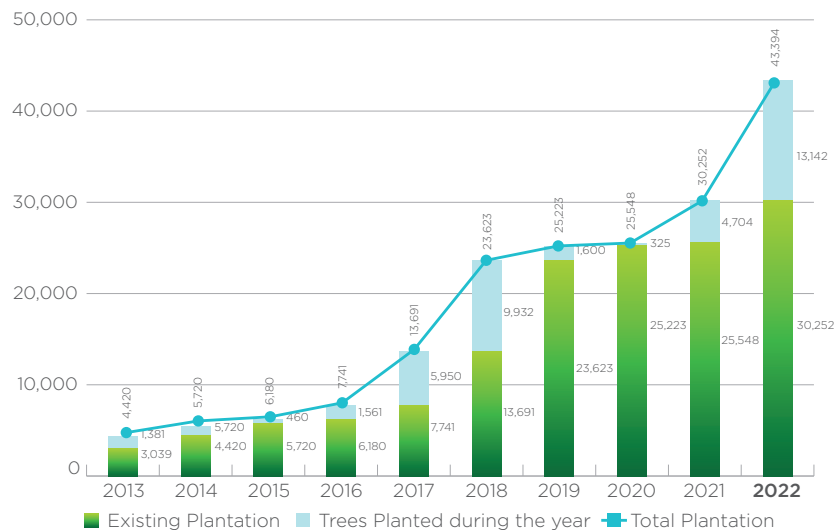
Crescent Steel is aware of the significance of our ecological system and knows that for a better future we need to reduce our ecological footprint.

As a sign of our strong commitment to environmental conservation, during the year, we planted 13,142 trees. Over the years our plantation size has increased to over 43,300+ trees. These trees will help reduce our carbon footprint by 256 tonnes annually.

Tree Plantations



43,300+



BEACH CLEANING AND MANGROVE PLANTATION ACTIVITY

As the risks facing our world increase, we are continuously looking for ways to reduce our corporate footprint.

One of our primary initiatives to help reduce our corporate footprint is the annual mangrove plantation activity which is conducted in collaboration with WWF.

Mangroves, not only are relatively easy to plant but they also play a part in protecting some of nature’s most vulnerable species. Mangrove forests are remarkably diverse and important ecosystems that keep coastal zones healthy. Even though mangroves are of immense economic and environmental importance to Pakistan, industrial and economic infrastructure development, inhabitation along the coast and the construction of huts at beaches have adversely impacted the marine ecosystems and mangroves of the adjoining creeks. These forests are the lifeline of the Indus Delta and play a critical role in climate change adaptation and protecting the local population against sea-storms as well as cyclones.

Crescent Steel has been an active supporter of WWF in their effort to conserve marine life by planting mangroves. This year we planted 1,000 mangroves, bringing our total plantation size to 3,700 mangroves, which we continue to maintain through monetary contributions that ensure that for every mangrove that doesn’t survive, WWF will plant another sapling. These 3,700 mangroves reduce our carbon footprint by 21.86 tonnes annually.

Year	Number Of Trees Planted	Yearly Carbon Reduction (In Tonnes)
2012 (FY13)	50	2.66
2013 (FY14)	75	3.55
2015 (FY15)	100	3.55
2015 (FY16)	150	5.32
2016 (FY17)	150	4.43
2017 (FY18)	175	4.14
2018 (FY19)	1,000	17.73
2021 (FY22)	1,000	5.91
2022 (FY22)	1,000	5.91
Total	3,700	53.2

This is equivalent to emissions from burning approximately 6,233 gallons of gasoline

CELEBRATING EARTH HOUR

Earth Hour is more than just an hour for Earth - it's a movement for our own futures, for the benefit of people and planet. It's not only a symbol of solidarity - it's a catalyst for change, harnessing the power of communities.

Over the years, the lights-off moment saw entire streets, buildings, landmarks, and city skylines go dark – an unmissable sight that drew public attention to nature loss and the climate crisis.

On Saturday, March 26th, 2022, 192 countries around the globe once again came together to increase awareness and spark global conversations on protecting nature. We showed that despite the physical distance, we were still able to unite digitally to speak up for nature louder than ever. We supported Earth Hour 2022 by switching off all unnecessary lights across all our locations and encouraged all our people to do the same in their homes and neighborhoods.

PRODUCT STEWARDSHIP

PRODUCT QUALITY AND SAFETY

Maintaining product and service quality is a sustainability imperative.

We strive to apply cutting-edge technology and remain client-centric to drive profitability and efficiency, ensuring the highest standards of quality in product delivery. The effectiveness of our Quality Management System is ensured through an independent quality function at each business unit level.

Crescent Steel strictly adheres to its quality policy to ensure that quality is embedded from the beginning to the end of the value chain. The management ensures that measurable and verifiable quality objectives are set throughout the organization, from the initial inspection of raw materials to the transportation of the finished product to the customer.

The company retains its authorization to the use the API monogram of the American Petroleum Institute since its inception in 1987. In 1997, Crescent Steel was awarded ISO 9001 Quality Management Standard Certificate which it continues to maintain as ISO 9001:2015.

STEEL DIVISION – PIPE MANUFACTURING AND COATINGS

Raw material sourcing for line pipe manufacturing is critical for oil and gas/API monogram pipes given the applicability of stringent raw material quality specifications and API standard compliance. Our raw material is purchased from pre-qualified suppliers, against established parameters that form part of our vendor evaluation system.

The pipes we produce, and coat are inspected and tested by sophisticated testing equipment. We have various testing facilities available at our pipe manufacturing and coating plant:

- On-line Automatic Ultrasonic Testing: To ensure that the entire plate, as well as the seam, is flawless for both Spiral Pipe Mills
- Radiographic Inspection: To analyze, the defects identified by ultrasonic testing
- Visual Inspection: To determine surface defects

- Hydrostatic Pressure Testing of Pipes: To check the pipe strength, durability, and leakages
- Residual Magnetism Measurement: To ensure that residual magnetism is within the limits of the applicable standard or client's requirements
- Final Inspection: To rigorously inspect the different dimensional parameters
- Tensile Testing and Guided Bend Tests: To ensure that the coil received and the pipes manufactured have the required mechanical properties
- CVN Test: To ensure the fracture toughness of the pipe body, weld, and HAZ is in compliance with API standards and client requirements
- Chemical Tests: To ensure the product has met a client specified chemical requirements
- Hardness Testing: To check the hardness of the pipe body, weld and HAZ for the sour service pipe
- Burst Test: To ensure that the pipe exceeds the minimum design pressure requirement
- Impact Test at -40 C: To ensure that coated pipe has required impact resistance at low temperature

Coating applications undergo various tests including:

- Online Holiday Inspection
- Coating Adhesion Strength Testing
- Thermal Analysis
- Melt Flow Index
- Cathodic Disbondment Test
- Hot Water Soak Resistance Test
- Flexibility Bend Test
- Indentation Hardness Test

MEASURING CUSTOMER SATISFACTION

The unit continues to maintain a high customer satisfaction score of over 95.71% for both, pipes and coatings

- The survey identifies many strong areas for improvement like timely product delivery etc.
- The survey provides customer feedback on our product capability for:
 - A) Submerged Arc Welded Helical Seam Steel Pipes in diameters ranging from 8-120 inch in steel grades up to and including API 5L X-100, under API monogram authorization

- B) Anti-corrosion coating application of steel line pipes in diameters ranging from 4 – 60 inches, as per international standards like DIN 30670
- Our main customer base constitutes the two-state gas utilities operating in Pakistan, SSGC, and SNGPL
 - headquartered in Karachi and Lahore, respectively
 - with a footprint across various towns and cities in Pakistan. Our Karachi and Lahore Offices and our Plant Site in Nooriabad are within easy access to our main customer base.

Customer Satisfaction Level over the years	2022	2021	2020	2019	2018	2017
	95.71%	94%	93%	94%	91%	88%

No incident of non-compliance with regulations and voluntary codes concerning products and services information and labelling occurred during the year.

No incident of non-compliance with regulations and voluntary codes concerning marketing communications, including advertising, promotion and sponsorship have been identified during the year.

COTTON DIVISION – COTTON SPINNING

We continue to maintain high standards of quality management, performance, and innovation. Our quality control laboratory and trained workforce ensure that all processing methods and products meet the required industry and international standards. Raw material like polyester/viscose is procured from world-renowned synthetic fiber producers locally and from abroad. Raw cotton is checked against established standards prior to procurement, while sophisticated testing infrastructure strengthens quality management and assurance.

Cotton Division continues to maintain quality management systems. The quality assurance and testing laboratory at the spinning unit is equipped with necessary testing equipment.

This includes:

FOR FIBER TESTING	FOR YARN TESTING
HVI-Spectrum	Uster Tensojet-4
Fibrograph 530	Uster Tester-5
Micronaire	Count Analyzer
Moisture Meter	Lea Strength Tester
	Twist Tester

MEASURING CUSTOMER SATISFACTION

- A survey of our product and service quality was carried out via electronic means to invite customer feedback on our Cotton Division product performance
- The survey highlighted areas of strength and weaknesses. We strive to work on weak areas to enhance our product offering and will continue to engage customers for feedback and to better understand their needs.

In 2022, all products were in compliance with labeling requirements specified by the laws and regulations.



MATERIAL CONSUMPTION

Our materials are divided into two basic categories i.e. critical and non-critical. Critical materials being those which have a direct impact on the company’s production and non-critical being those which are indirectly associated with the company’s products. It is imperative to understand that we use our critical raw materials efficiently.

As scarcity of resources is increasing globally, we, as an organization, understand the effective utilization of resources. We continue to strive to strengthen our processes across all our production sites.

Steel pipe scrap is used as a raw material for our billet making process in Crescent Hadeed. Similarly, we use a by-product of sugarcane bagasse as a source of electricity and supply to Crescent Hadeed, SML and FESCO. We continuously explore new strategies and methodologies through which we can ensure effective utilisation of resources. We make sure that consumption of material does not adversely affect the communities in our surroundings. Our purchased materials go through quality control checks and some of our critical raw material suppliers are ISO certified.

As indicated in the table, most of our raw materials are non-renewable items which cannot be reused, except for energy generated from bagasse and materials such as polyester, viscose and raw cotton from CCP which are reused or sold to external sources.

All the data presented in the table represents accurate measurements of material consumed through gauges and instruments installed at the production lines. The HSE committee also conducts various checks to validate and authenticate the data.

Crescent Steel does not use any recycled input materials or any reclaimed products and their packaging materials.

Material Consumed	Unit Of Quantity	Quantity (Weight / Volume)				
		2022	2021	2020	2019	2018
Non-Renewable Materials						
Steel - Pipe Manufacturing						
HR Coils (comprises 99% of input materials)	MT	5,222	4,822	8,315	12,387	52,005
Steel - Coating						
High Density Polyethylene	Kg	334,640	43,220	214,625	698,175	1,538,165
Co Polymer Adhesive	Kg	30,180	5,949	24,600	62,375	165,395
Fusion Bonded Epoxy	Kg	47,660	7,446	31,840	79,770	190,334
Welding Wire	Kg	21,940	22,429	32,330	47,590	152,380
Welding Flux	Kg	27,445	23,945	44,755	61,010	123,615
Steel Grit	Kg	12,565	3,345	13,625	18,125	51,700
Cotton						
Yarn Wrapping Cone	Nos	3,042,804	3,046,608	2,344,166	2,987,592	1,720,524
Polypropylene Bags	Nos	125,386	112,067	99,821	116,741	71,262
Polythene Bags	Kg	10,553	9,446	7,569	10,391	6,610
Diesel	Ltr	2,438	3,020	1,275	3,115	1,465

Material Consumed	Unit Of Quantity	Quantity (Weight / Volume)				
		2022	2021	2020	2019	2018
Engineering						
Gas LPG	Kg	1,641	519	862	921	1,688
Gas Oxygen	Cubic M	7,473	2,098	3,020	2,208	6,150
Diesel Oil	Ltr	5,070	804	2,627	2,280	3,974
Disc (Grinding and Cutting)	Nos	4,176	1,161	2,144	932	1,997
Welding Electrode	Tonnes	13.72	4.58	6.06	1.90	6.7
Round Bar, Pipes, Nut Bolt etc.	Tonnes	36.58	12.72	21.33	58.91	133.6
Sheets Mild Steel	Tonnes	655.28	234.08	287.13	187.51	545
Sheets Stainless Steel	Tonnes	15.25	10.78	10.0	7.69	6.3
Crescent Hadeed						
Melting Scrap(HMS, Shredded, Bundled Scrap)	Mt	18,259	21,384	11,449	27,305	53,481
Silico Manganese	Kgs	174,245	160,942	141,075	290,656	482,797
Ferro Manganese	Kgs	21,345	21,477	42,610	209,963	361,246
T.C Tips	Nos	5,651	5,836	3,200	9,850	18,180
Mill Scale	Kgs	744,960	866,750	257,960	1,297,950	1,695,630
Oxygen Gas	M3	19,229	21,147	13,434	27,358	56,975
Diesel Oil	Ltr	5,760	11,515	5,820	18,660	25,910
MS Lancing Pipe	Mtr	59,000	63,300	31,700	-	128,500
Quartz Powder	Kgs	645,420	686,810	352,650	1,060,490	2,313,020
Boric Acid	Kgs	198	161	80	280	11,853
Sodium Silicate	Kgs	14,920	15,430	7,715	28,205	54,549
Nozzle - Ex	Kgs	2,178	2,444	1,330	3,780	9,730
Silica Sand	Kgs	12,550	118,200	92,589	172,151	278,420
Renewable Materials						
Energy						
Bagasse	Tonnes	123,719	106,485	70,156	108,163	189,364
Cotton						
Raw Cotton	Tonnes	2,855	2,842	2,366	2,860	2,475
Polyester	Tonnes	3,282	3,266	2,584	3,244	1,531

APPENDICES

GRI CONTENT INDEX

The subsequent table lists all disclosures in accordance with GRI Standards. Page reference is given against each disclosure or reference to other publicly available sources

Key

SR = Sustainability Report 2022

AR = Annual Report 2022

Fully disclosed



Partially disclosed



General Standard Disclosures			
Gri Standard	Disclosure	Page Number	Omission And Reason
GRI 101: FOUNDATION 2016	GRI 101 contains no disclosures		
General Standard Disclosures			
Gri 102: General Disclosures 2016	Organizational Profile		
GRI 102-1	Name of the organization	Cover Page	●●●●●●●●●●
GRI 102-2	Activities, brands, products, and services	SR 7	●●●●●●●●●●
GRI 102-3	Location of headquarters	SR 20, AR Company Information	●●●●●●●●●●
GRI 102-4	Location of operations	SR 20 - 25	●●●●●●●●●●
GRI 102-5	Ownership and legal form	SR 20 - 25, AR Pattern of share holding	●●●●●●●●●●
GRI 102-6	Markets served	SR 20 - 25, SR 38	●●●●●●●●●●
GRI 102-7	Scale of the organization	SR 26, SR 36- 37, AR 207	●●●●●●●●●●
GRI 102-8	Information on employees and other workers	SR 55-58	●●●●●
GRI 102-9	Supply chain	SR 40-41	●●●●●●●●●●
GRI 102-10	Significant changes to the organization and its supply chain	There has been no significant changes in the size or capital structure of our operations during 2022	●●●●●●●●●●
GRI 102-11	Precautionary Principle or approach	SR 66	●●●●●●●●●●
GRI 102-12	External initiatives	SR 31	●●●●●●●●●●
GRI 102-13	Membership of associations	SR 31	●●●●●●●●●●
Strategy And Analysis			
GRI 102-14	Statement from senior decision-maker	SR 2-3	●●●●●●●●●●
Ethics And Integrity			
GRI 102-16	Values, principles, standards, and norms of behavior	SR 6	●●●●●●●●●●
Governance			
GRI 102-18	Governance structure	SR 18, AR 30-33	●●●●●●●●●●

General Standard Disclosures

STAKEHOLDER ENGAGEMENT

Gri Standard	Disclosure	Page Number	Omission and Reason
GRI 102-40	List of stakeholder groups	SR 42	●●●●●●●●●●
GRI 102-41	Collective bargaining agreements	SR 53	●●●●●●●●●●
GRI 102-42	Identifying and selecting stakeholders	SR 42-43	●●●●●●●●●●
GRI 102-43	Approach to stakeholder engagement	SR 42	●●●●●●●●●●
GRI 102-44	Key topics and concerns raised	SR 42	●●●●●●●●●●
REPORT PROFILE			
GRI 102-45	Entities included in the consolidated financial statements	SR 7, SR 20 - 25	●●●●●●●●●●
GRI 102-46	Defining report content and topic Boundaries	SR 4 and SR -10	●●●●●●●●●●
GRI 102-47	List of material topics	SR 12	●●●●●●●●●●
GRI 102-48	Restatements of information	SR 4	●●●●●●●●●●
GRI 102-49	Changes in reporting	SR 4	●●●●●●●●●●
GRI 102-50	Reporting period	SR 4	●●●●●●●●●●
GRI 102-51	Date of most recent report	SR 4	●●●●●●●●●●
GRI 102-52	Reporting cycle	SR 4	●●●●●●●●●●
GRI 102-53	Contact point for questions regarding the report	SR 4	●●●●●●●●●●
GRI 102-54	Claims of reporting in accordance with the GRI Standards	SR 4	●●●●●●●●●●
GRI 102-55	GRI content index	SR 102- 107	●●●●●●●●●●
GRI 102-56	External assurance	Not seeking assurance this year	●●●●●●●●●●

MATERIAL TOPICS

ECONOMIC

GRI 103 : MANAGEMENT APPROACH 2016

GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 38	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 12,SR 39, AR 50-53	●●●●●●●●●●

GRI 201: ECONOMIC PERFORMANCE 2016

GRI 201-1	Direct economic value generated and distributed	SR 39	●●●●●●●●●●
GRI 201-3	Defined benefit plan obligations and other retirement plans obligations and other retirement plans	SR 63	●●●●●●●●●●
GRI 201-4	Financial assistance received from government	SR 39	●●●●●●●●●●

MARKET PRESENCE

GRI 103 : MANAGEMENT APPROACH 2016

GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 48	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 38	●●●●●

General Standard Disclosures			
Gri Standard	Disclosure	Page Number	Omission and Reason
GRI 202: MARKET PRESENCE 2016			
GRI 202-1	Ratios of standard entry level wage by gender compared to local minimum wage	SR 54	
GRI 202-2	Proportion of senior management hired from the local community	SR 56	
INDIRECT ECONOMIC IMPACTS			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	
GRI 103-2	The management approach and its components	SR 38, SR 46	
GRI 103-3	Evaluation of the management approach	SR 69	
GRI 203:INDIRECT ECONOMIC IMPACTS 2016			
GRI 203-1	Infrastructure investments and services supported	SR 39,SR 68 -SR 72	
GRI 203-2	Significant indirect economic impacts	SR 68-S69, SR 72-SR 76,SR 78	
PROCUREMENT PRACTICES			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12, SR 41	
GRI 103-2	The management approach and its components	SR 41, SR 45	
GRI 103-3	Evaluation of the management approach	SR 41	
GRI 204: PROCUREMENT PRACTICES 2016			
GRI 204-1	Proportion of spending on local suppliers	SR 40-41	
MATERIALS			
ENVIRONMENTAL			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12,SR 66-67	
GRI 103-2	The management approach and its components	SR 66-67	
GRI 103-3	Evaluation of the management approach	SR 66-67	
GRI 301 : MATERIALS 2016			
GRI 301-1	Materials used by weight or volume	SR 100-101	
GRI 301-2	Recycled input materials used	SR 100	
GRI 301-3	Reclaimed products and their packaging materials	SR 99	
ENERGY			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	
GRI 103-2	The management approach and its components	SR 66-67	
GRI 103-3	Evaluation of the management approach	SR 66-67	

General Standard Disclosures

Gri Standard	Disclosure	Page Number	Omission and Reason
GRI 302: ENERGY 2016			
GRI 302-1	Energy consumption within the organization	SR 91	●●●●●●●●●●
GRI 302-2	Energy consumption outside of the organization	SR 92-93	●●●●●
GRI 302-3	Energy intensity	SR 91-92	●●●●●●●●●●
GRI 302-4	Reduction of energy consumption	SR 91	●●●●●●●●●●
WATER			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 66-67,SR 94	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 66-67,SR 94	●●●●●●●●●●
GRI 303: WATER 2016			
GRI 303-1	Water withdrawal by source	SR 95-96	●●●●●●●●●●
GRI 303-2	Water sources significantly affected by withdrawal of water	SR 95	●●●●●●●●●●
GRI 303-3	Water recycled and reused	SR 95-96	●●●●●●●●●●
EMISSIONS			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 66-67	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 66-67	●●●●●●●●●●
GRI 305: EMISSIONS 2016			
GRI 305-1	Direct (Scope 1) GHG emissions	SR 87-88	●●●●●●●●●●
GRI 305-2	Energy indirect (Scope 2) GHG emissions	SR 89	●●●●●●●●●●
GRI 305-3	Other indirect (Scope 3) GHG emissions	SR 89	●●●●●
GRI 305-4	GHG emissions intensity	SR 90	●●●●●●●●●●
GRI 305-7	Nitrogen oxides (NOX), sulphur oxides (SOX), and other significant air emissions	SR 88	●●●●●●●●●●
EFFLUENT AND WASTE			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 93	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 93	●●●●●●●●●●
GRI 306: EFFLUENT WASTE 2016			
GRI 306-1	Water discharge by quality and destination	SR 95-96	●●●●●●●●●●
GRI 306-2	Waste by type and disposal method	SR 93-94	●●●●●●●●●●
GRI 307: ENVIRONMENTAL COMPLIANCE 2016			
GRI 307-1	Non-compliance with environmental laws and regulations	SR 93	●●●●●●●●●●
SUPPLIER ENVIRONMENTAL ASSESSMENT			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 43,SR 46	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 43,SR 46	●●●●●●●●●●









General Standard Disclosures			
Gri Standard	Disclosure	Page Number	Omission and Reason
GRI 308: SUPPLIER ENVIRONMENTAL ASSESSMENT 2016			
GRI 308-1	New suppliers that were screened using environmental criteria	SR 41	●●●●●●●●●●
GRI 308-2	Negative environmental impacts in the supply chain and actions taken	SR 41	●●●●●
LABOUR PRACTICES AND DECENT WORK			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR-10,SR-12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 52-54	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 52-54	●●●●●●●●●●
GRI 401 : EMPLOYMENT 2016			
GRI 401-1	New employee hires and employee turnover	SR 58	●●●●●●●●●●
GRI 401-2	Benefits provided to full-time employees that are not provided to temporary or part-time employees	SR 63	●●●●●●●●●●
LABOUR MANAGEMENT RELATIONS AND EQUAL OPPORTUNITY			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 46, SR 48	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 46, SR 48	●●●●●●●●●●
GRI 402: LABOUR MANAGEMENT RELATIONS 2016			
GRI 402-1	Minimum notice periods regarding operational changes	SR 53 (One month notice period)	●●●●●●●●●●
GRI 405: DIVERSITY AND EQUAL OPPORTUNITY 2016			
GRI 405-1	Diversity of governance bodies and employees	SR 56	●●●●●●●●●●
GRI 406: INCIDENTS OF DISCRIMINATION AND CORRECTIVE ACTIONS TAKEN 2016			
GRI 406-1:	Incidents of discrimination and corrective actions taken	SR 53	●●●●●●●●●●
HEALTH AND SAFETY			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 66	●●●●●
GRI 103-3	Evaluation of the management approach	SR 66	●●●●●
GRI 403: OCCUPATION HEALTH AND SAFETY 2016			
GRI 403-1	Workers representation in formal joint management - worker health and Safety committees	SR 66	●●●●●●●●●●
GRI 403-2	Types of injury and rates of injury, occupational diseases, lost days, and absenteeism, and number of work-related fatalities	SR 67	●●●●●●●●●●
GRI 403-3	Workers with high incidence or high risk of diseases related to their occupation	SR 67	●●●●●●●●●●
GRI 416: CUSTOMER HEALTH AND SAFETY 2016			
GRI 416-2	Incidents of non-compliance concerning the health and Safety impacts of products and services	SR 99	●●●●●●●●●●

General Standard Disclosures

Gri Standard	Disclosure	Page Number	Omission and Reason
TRAINING			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 48, SR 53-54	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 48	●●●●●
GRI 404: TRAINING AND EDUCATION 2016			
GRI 404-1	Average hours of training per year per employee	SR 55	●●●●●●●●●●
GRI 404-2	Programs for upgrading employee skills and transition assistance programs	SR 55, SR 61-62	●●●●●
GRI 404-3	Percentage of employees receiving regular performance and career development reviews	SR 53-54	●●●●●●●●●●
LOCAL COMMUNITIES			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR 10,SR 12	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 42,SR 46	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 42,SR 46	●●●●●●●●●●
GRI 413: LOCAL COMMUNITIES 2016			
GRI 413-1	Operations with local community engagement, impact assessments, and development programs	SR 46	●●●●●●●●●●
GRI 413-2	Operations with significant actual and potential negative impacts on local communities	SR 46	●●●●●●●●●●
MARKETING AND LABELING			
GRI 103 : MANAGEMENT APPROACH 2016			
GRI 103-1	Explanation of the material topic and its boundaries	SR-10,SR-12, SR 98-99	●●●●●●●●●●
GRI 103-2	The management approach and its components	SR 98-99	●●●●●●●●●●
GRI 103-3	Evaluation of the management approach	SR 98-99	●●●●●●●●●●
GRI 417: MARKETING AND LABELING 2016			
GRI 417-1	Requirements for product and service information and labelling	SR 99	●●●●●●●●●●
GRI 417-2	Incidents of non-compliance concerning product and service information and labelling	SR 99	●●●●●●●●●●
GRI 417-3	Incidents of non-compliance concerning marketing communications	SR 99	●●●●●●●●●●

OUR CONTRIBUTION TO THE UN SUSTAINABLE DEVELOPMENT GOALS (SDGS)

SDGS		PAGE NO	GRI STANDARDS DISCLOSURE
	End poverty in all its forms everywhere	SR 54,SR 68-69, SR 78	202-1, 203-2, 413-2
	End hunger, achieve food security and improved nutrition and promote sustainable agriculture	SR 39, SR 68-69, SR 72-SR 76, SR 78	201-1, 203-1 , 203-2, 413-2
	Ensure healthy lives and promote well-being for all at all ages	SR 39, SR 46, SR 67 -SR 72, SR 87-88, SR 89, SR 90, SR 93-96,	203-1, 203-2, 305-1, 305-2, 305-3, 305-4, 305-7, 306-1, 306-2, 307-1, 403-2, 403-3
	Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all.	SR 55	404-1
	Achieve gender equality and empower all women and girls.	SR 39, SR 53-55, SR 58, SR 61-63, SR 68 -SR 72	201-1, 202-1, 203-1, 401-1, 401-2, 404-2,404-3, 405-1, 406-1
	Ensure availability and sustainable management of water and sanitation for all.	SR 91, SR 93-94, SR 95-96	303-1, 303-2, 303-3, 306-1, 306-2
	Ensure access to affordable, reliable, sustainable and modern energy for all.	SR 39, SR 68 -SR 72, SR 91-93	201-1, 203-1 302-1, 302-2 , 302-3, 302-4
	Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all.	SR 39, SR 40-41, SR 53-54, SR 55-58, SR 61-63, SR 66-SR 67 SR 68 -SR 72, SR 91-93, SR 95-96, SR 99, SR 100-101	102-8, 102-41, 201-1, 202-2, 204-1, 203-1, 203-2, 301-1,301-2, 301-3 302-1, 302-2, 302-3, 302-4, 303-3, 401-1, 401-2, 403-1, 403-2, 403-3, 404-1, 404-2, 404-3,405-1
	Build resilient infrastructure, promote sustainable industrialization and foster innovation	SR 39,SR 68 -SR 72	201-1, 203-1

SDGS		PAGE NO	GRI STANDARDS DISCLOSURE
 10 REDUCED INEQUALITIES	Reduce inequality within and among countries	SR 53-54 SR 55-58	102-8 ,401-1, 404-3
 11 SUSTAINABLE CITIES AND COMMUNITIES	Make cities inclusive, safe, resilient and sustainable	SR 39,SR 68 -SR 72	203-1
 12 RESPONSIBLE CONSUMPTION AND PRODUCTION	Ensure sustainable consumption and production patterns	SR 87-88, SR 89, SR 91-92, SR 93-94, SR 95-96, SR 98-99, SR 100-101	301-1, 301-2, 301-3, 302-1, 302-2, 302-3, 303-3, 305-1, 305-2,305-3, 305-7, 306-1, 306-2, 417-1
 13 CLIMATE ACTION	Take urgent action to combat climate change and its impacts	SR 87-88, SR 89-SR 90,SR 91-93	302-1,302-2,302-3,302-4, 305-1,305-2,305-3,305-4
 14 LIFE BELOW WATER	Conserve and sustainably use the oceans, seas and marine resources	SR 87-90, SR 95-96	305-1, 305-2, 305-3, 305-4, 305-5, 305-7, 306-1
 15 LIFE ON LAND	Sustainably manage forests, combat desertification, halt and reverse land degradation, halt biodiversity loss	SR 87-90	305-1, 305-2, 305-3, 305-4, 305-7
 16 PEACE, JUSTICE AND STRONG INSTITUTIONS	Promote just, peaceful and inclusive societies	SR 6, SR 88, SR 93, SR 95-96 SR 99	102-16,307-1, 416-2, 417-2,417-3
 17 PARTNERSHIPS FOR THE GOALS	Strengthen the means of implementation and revitalize the global partnership for sustainable development	SR 13-17, SR 29	Not applicable

DEFINITIONS AND FORMULAS

Term	Explanation
Absentee	An employee absent from work because of incapacity of any kind, not just as the result of work related injury or disease. Permitted leave absences such as holidays, study, maternity etc. are excluded.
Base year	Used for comparison in the measure of a business activity. The base year for the report is 2021.
Benefit	The direct benefit provided in the form of financial contributions paid by the organization or reimbursement of expenses to employee
Carbon dioxide (CO₂)	The measure used to compare the emissions from various types of greenhouse gas (GHG). The CO ₂ equivalent for a gas is determined by multiplying the metric tonnes of the gas
Community development	A plan that details actions to minimize, mitigate, or compensate for adverse financial, social, and environmental impacts and find opportunities or actions to enhance the positive impacts of a project on the community
Defined benefit plan	Post-employment benefit plan other than a defined contribution plan
Defined contribution plan	Post-employment benefit plan under which an entity pays fixed contributions into a separate entity (a fund) and will have no legal or constructive obligation to pay further contributions if the fund does not hold sufficient assets to pay all employee benefits relating to employee service in the current and prior periods
Direct (Scope 1) GHG emissions	Direct GHG emissions occur from sources that are owned or controlled by an organization
Employee	Individual who is in an employment relationship with the organization, according to national law or its application
Employee turnover	Employees who leave the organization voluntarily or due to dismissal, retirement, or death in service
Foreign Suppliers	We consider foreign suppliers as those who are situated outside Pakistan.
Grievance mechanism	System consisting of procedures, roles and rules for receiving complaints and providing remedial actions
Governance body	Committee or board responsible for the strategic guidance of the organization, the effective monitoring of management, and the accountability of management to the broader organization and its stakeholders
Indirect Energy (Scope 2) GHG emissions	GHG emissions from the generation of purchased or acquired electricity, heating, cooling, and steam consumed by an organization
Injury	Non-fatal or fatal injury arising out of, or in the course of, work
Injury rate	The frequency of injuries, relative to the total time worked by all workers during the reporting period
Local Suppliers	We consider local suppliers as those who operate within the region of our significant locations of operations or are conducting business within Pakistan.
Local minimum wage	Minimum compensation for employment per hour, or other unit of time, allowed under law
Local communities	The local community can range from persons living adjacent to an organization's operations, to those living at a distance who are still likely to be impacted by these operations.
Management approach disclosure	Narrative description of how an organization manages its material topics and their related impacts
Material topic	A topic that reflects a reporting organization's significant economic, environmental and social impacts; or that substantively influences the assessments and decisions of stakeholders
Other indirect (Scope 3) GHG emissions	Indirect GHG emissions not included in energy indirect (Scope 2) GHG emissions that occur outside of the organization, including both upstream and downstream emissions
Significant locations of operations	We consider significant locations of operations, which are near to our corporate offices in Karachi and Lahore and near our plant sites at Nooriabad, Bhone, Jaranwala and Dalawal.
Senior management	Top ranking members of the management of an organization that include the Chief Executive Officer (CEO) and other individuals reporting directly to the CEO

FORMULAS USED

A) Standards, methodologies, assumptions, and/or calculation tools used.

B) Source of the conversion factors used.

TYPE OF FUEL	CONVERSION FACTOR FOR CONVERTING IN GIGA JOULES (GJ)
Coal (metric tonne)	27
Crude oil (metric tonne)	44.8
Diesel (metric tonne)	43.33
Natural Gas (MMBtu)	1.054615
Electricity (kilowatt-hour)	0.0036

C) The organisation specific metric used for the calculation of Emissions Intensity is sales turnover. Emissions intensity constitutes direct GHG emissions from self-generated energy from diesel oil and natural gas at 74.1 and 56.1 MT of CO₂ per GJ as per base year (2019).

D) Indirect GHG emission factor for electricity purchased from WAPDA is 0.67 kg of CO₂ eqv. /kWh and from that of KESC is 0.58 kg of CO₂ eqv. /kWh. It has been assumed that the electricity at Nooriabad, Jaranwala and Bhone is supplied from WAPDA, while the electricity at the Head Office in Karachi is supplied by KESC as per IPCC standards and indirect

GHG emissions on management best estimates.

TYPE OF FUEL (IN GJ)	IPCC (INTERNATIONAL PANEL ON CLIMATE CHANGE) DEFAULT KG CO ₂ /GJ
Coal	96
Diesel Oil	74.1
Natural Gas	56.1

METRIC	CONVERSION IN LITRE
1 Cubic meter	1,000 liter
1 tonne of water	1,000 liter

METRIC	CONVERSION IN KG
1 metric ton	1,000 kilograms

Energy Intensity =

Absolute energy consumption* / organization-specific metric

GHG Emissions Intensity =

Absolute GHG Emissions* / Product or Sales quantity

Reused water (Gallons) =

Net production time x 90

Percentage of reclaimed products and their packaging materials=

Products and their packaging materials reclaimed within the reporting period x 100/ Products sold within the reporting period

Percentage of recycled input materials used (%) =

Total recycled input materials used/ Total input materials used

Opening No. of Employees =

Closing - Outgoing + Incoming

Average No. Of Employees =

= (Opening + Closing) / 2

Rate of Employee Turnover =

(Outgoing / Average no. of Employees) x 100%

Training hours per employee:

Training hours / number of employees

In time into in cash conversion: Average Salary = Total Gross Salary of all Employees/ Total Number of Employees

Injury rate (Injuries/day) = Number of injuries / total number of days worked by the total workforce

Occupational Disease rate

(Occupational disease cases / day) = Number of Occupational disease cases / total number of days worked by the total workforce

Lost day rate (Lost days / day) =

Total lost days by the affected workers (due to occupational accidents and diseases) / total number of days scheduled to be worked by the workforce in the reporting period

Absentee rate =

[Actual absentee days lost / total days scheduled to be worked by the workforce for the period] x 100%

Economic Performance:

LPS (Liquidity per share):

Total Number of Shares Traded over a Period/Average Number of Shares

ROE (return on equity): Net Income/Shareholder's Equity

Total Liabilities to total assets %:

(Total Liabilities / Total Assets) *100

Return on Assets: Net Income/Average Total Assets

Debt Ratio: Total Liabilities/Total Assets

Net Profit Margin: Sales Revenue/ Net Income

Debt to Equity: Total Liabilities/Shareholder Equity

Earnings per Share: (Net Income - Preferred Dividends)/ Average Number of Shares Outstanding.

EMISSIONS RESULTS

External Test Results (January 2022).

Measuring Parameters	Units	Testing Method	SEQS Limits	Test Results
A. Power House- Generators Emission				
a) Cummins 1400 Kva				
CO	Mg/ Nm ³	ASTM D-6522	800	679
SO ₂	Mg/ Nm ³	ASTM D-6522	1700	52
Oxides of Nitrogen	Mg/ Nm ³	ASTM D-6522	600	433
Particulate Matter	Mg/ Nm ³	ASTM D-3685	300	76
b) Komatsu 100 Kva				
CO	Mg/ Nm ³	ASTM D-6522	800	630
SO ₂	Mg/ Nm ³	ASTM D-6522	1700	46
Oxides of Nitrogen	Mg/ Nm ³	ASTM D-6522	600	390
Particulate Matter	Mg/ Nm ³	ASTM D-3685	300	62
B. Coating Plant Stripping Emission -Furnace/Heaters				
Main Gas Furnace				
CO	Mg/ Nm ³	ASTM D-6522	800	410
Oxides of Nitrogen	Mg/ Nm ³	ASTM D-6522	400	178
Pre-Heater 1				
CO	Mg/ Nm ³	ASTM D-6522	800	360
Oxides of Nitrogen	Mg/ Nm ³	ASTM D-6522	400	136
Pre-Heater 2				
CO	Mg/ Nm ³	ASTM D-6522	800	299
Oxides of Nitrogen	Mg/ Nm ³	ASTM D-6522	400	183

External Test Results (January 2022).

Measuring Parameters	Units	Testing Method	SEQS Limits	Test Results
C. Fork Lifters Emission				
CT-Power China				
Smoke	Ringelmann Scale	ASTM D-2156	2	2
CO	CO (%)	ASTM D-6522	6	1.9
Noise	Decibels	ASTM E-1124	85	76.3
TCM-100				
Smoke	Ringelmann Scale	ASTM D-2156	2	2
CO	CO (%)	ASTM D-6522	6	2.1
Noise	Decibels	ASTM E-1124	85	73.3
TCM-FD-120				
Smoke	Ringelmann Scale	ASTM D-2156	2	1
CO	CO (%)	ASTM D-6522	6	2.6
Noise	Decibels	ASTM E-1124	85	74.2
TCM-FD-30				
Smoke	Ringelmann Scale	ASTM D-2156	2	1
CO	CO (%)	ASTM D-6522	6	1.9
Noise	Decibels	ASTM E-1124	85	73.6

D. Backup Generators (non-routine; only operative when KESC/WAPDA supply is down) Following parameters are analyzed: CO, Oxides of Nitrogen, Smoke, SO₂, Noise and Particulate matter

Glossary And Acronyms	
API	American Petroleum Institute
ASTM	American Society for Testing and Materials
CAGR	Compound Annual Growth Rate
CSR	Corporate Social Responsibility
CO ₂	Carbon dioxide
CO	Carbon monoxide
EPS	Earnings per share
GHG	Greenhouse gas
GJ	Gigajoule
GRI	Global Reporting Initiative
GWP	Global Warming Potential
HRC	Hot Rolled Coil
HSE	Health Safety and Environment
ISO	International Organization for Standardization
ICAP	Institute of Chartered Accountants of Pakistan
ICMAP	Institute of Cost and Management Accountants of Pakistan
LOI	Letter of Interest
MGD	Million Gallons per Day
MT	Metric ton
Mg/ Nm ³	Milligrams per cubic meter
NEQS	National Environmental Quality Standards
NTDC	National Transmission and Despatch Company
OHSAS	Occupational Health and Safety Management System
PEPA	Pakistan Environmental Protection Act
PSX	Pakistan Stock Exchange
PPDB	Punjab Power Development Board
QMS	Quality Management System
RLNG	Regassified Liquefied Natural Gas
SEQS	Sindh Environmental Quality Standards
SO ₂	Sulphur Dioxide
SOP	Standard Operating Procedure
UNEP	United Nations Environment Programme
WWF	World Wide Fund

FEEDBACK FORM

CORPORATE RESPONSIBILITY REPORT

2022

Details of information provided on issues covered in the report.

Comprehensive Adequate Not adequate

Clarity of information provided in the report.

High Medium Low

Quality of design and layout of the report.

Excellent Good Average

Your comments for adding value to the report.

.....

.....

.....

Name

Designation

Organization

Contact Details

 Telephone

Please mail your feedback to us at sustainability@crestent.com.pk or mail this form at the following address:

 **Crescent Steel and Allied Products Limited**
9th Floor, SIDCO Avenue Centre, 264 R.A. Lines, Karachi

www.crescent.com.pk

