

## **OUR SUSTAINABILITY JOURNEY**

# Our Sustainability Journey

FY 2022-23 marked another crucial milestone in our journey of sustainable value creation. Over the years, we have achieved remarkable progress, and now we are harnessing our solid foundations to move closer to our vision.

## 2008-09

Recognized by CII for implementing 'Environmental Best Practices' at the Gagillapur plant.

## 2009-10

Set a target of Zero Liquid Discharge (ZLD), Zero accident zone, and zero occupational health hazard status.

## 2010-11

Conducted Hazard Analysis and Risk Assessment (HARA) for each manufactured product.

## 2014-15

Successful completion of the Social Accountability Audit for the Gagillapur plant.

Green initiatives through investments in the ZLD at Bonthapally and the Effluent Treatment Plan at Gagillapur.

## 2013-14

The Bonthapally facility received the ISO 14001 certification for environmental management and the OHSAS 18001 certification for occupational health safety systems.

## 2022-23

Announced our plan to invest ₹ 2000 crores to establish a flagship green pharma plant.

Implemented an enterprise-wide Sustainability Governance framework.

Conducted materiality assessment for the first time and identified 13 ESG material topics.

## 2021-22

Set a compelling vision to empower significant number of individuals through Pharma Pathashala.

## 2020-21

Creation of a sustainability team to execute a focused ESG plan.

## 2016-17

Launched a Self-Directed Team (SDT) program across manufacturing units to nurture skill development.

## 2017-18

Initiated sourcing of electricity from solar power plants.

Supported local suppliers by sourcing 50%-55% from Telangana.

## 2019-20

Achieved further reduction of solid waste generation and specific water consumption by 27% and 23% at Bonthapally API facility.

## 2050

Target to achieve Net Zero emissions





# Sustainability at Granules

Granules aspires to be one of the most sustainable companies. Which is why sustainability has always been integral to how we operate. This year, however, we took significant steps to shape our sustainability journey and be future-ready.

We embarked on a journey to set ambitious near- and long-term goals across three sustainability pillars of environment, social and governance (ESG) by actively listening to our stakeholders.

## UN SDGs Aligned

Our aspirations across the 13 ESG priority areas identified contribute to the Sustainable Development Goals of the United Nations.



We have published Granules inaugural Business Responsibility and Sustainability Report (BRSR) for FY 2022-23. It details the Company's ESG performance across the 9 principles defined by The Indian National Guidelines on Responsible Business Conduct and is aligned with the new guidelines released by the Securities and Exchange Board of India (SEBI). The British Standards Institution (BSI) – an independent third party has verified and assured the environmental data disclosed in the Report.



# From Vision to Action

Sustainability is at the heart of Granules' strategic vision and deeply embedded in the Company's decision-making process. It serves as a guiding principle that influences our choices and actions, ensuring that we prioritize long-term environmental and social considerations alongside our business objectives.

We are actively breathing life into sustainability through pioneering initiatives, exemplified by our ground-breaking partnership with Greenko for green pharmaceutical products. This transformative collaboration seeks to foster a symbiotic connection between the well-being of our planet and the health of humanity. By harnessing green energy, sustainable industrial feedstocks, and embracing circular economy principles, we are intertwining growth with sustainability.

Moreover, sustainability is intricately integrated into our product development process, as demonstrated by the implementation of our Green card and Eco scale initiatives. These endeavors showcase our unwavering commitment to environmentally responsible practices and serve as tangible steps toward creating a more sustainable future.

## Getting Recognized in the Universe of Sustainability

**CRISIL**  
An S&P Global Company

**54**

Rating by CRISIL (23<sup>rd</sup> rank among pharmaceutical companies)

**CDP**  
DISCLOSURE INSIGHT ACTION

**C Score**

Received for climate change in our first CDP disclosure

**ecovadis**

**Silver Rating**

Achieved by Unit-1 Bonthapally

**Bronze Rating**

Achieved by Jeedimetla unit



## We aim to

We set ambitious near and long-term goals across the areas of ESG by actively listening to our stakeholders.

### Be Net Zero by 2050

Scale Green Chemistry product development and set up a **flagship green pharma plant** with an outlay of ₹ 20,000 Mn

Establish an enterprise-wide **sustainability governance framework**

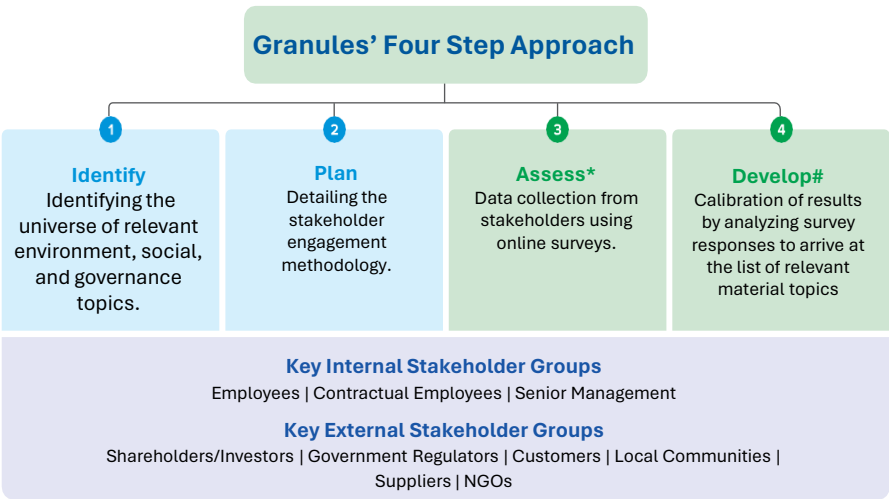


# Material Topics as a Strategic Imperative

Undertaking our first ever materiality assessment signifies a significant milestone in our sustainability journey. By identifying and prioritizing key topics, we establish a foundation for informed decision-making and impactful progress toward a more sustainable future.

Our materiality assessment enabled us to identify 13 material topics, grouped into the clusters of environment, social, and governance, which we prioritize and address in this report.

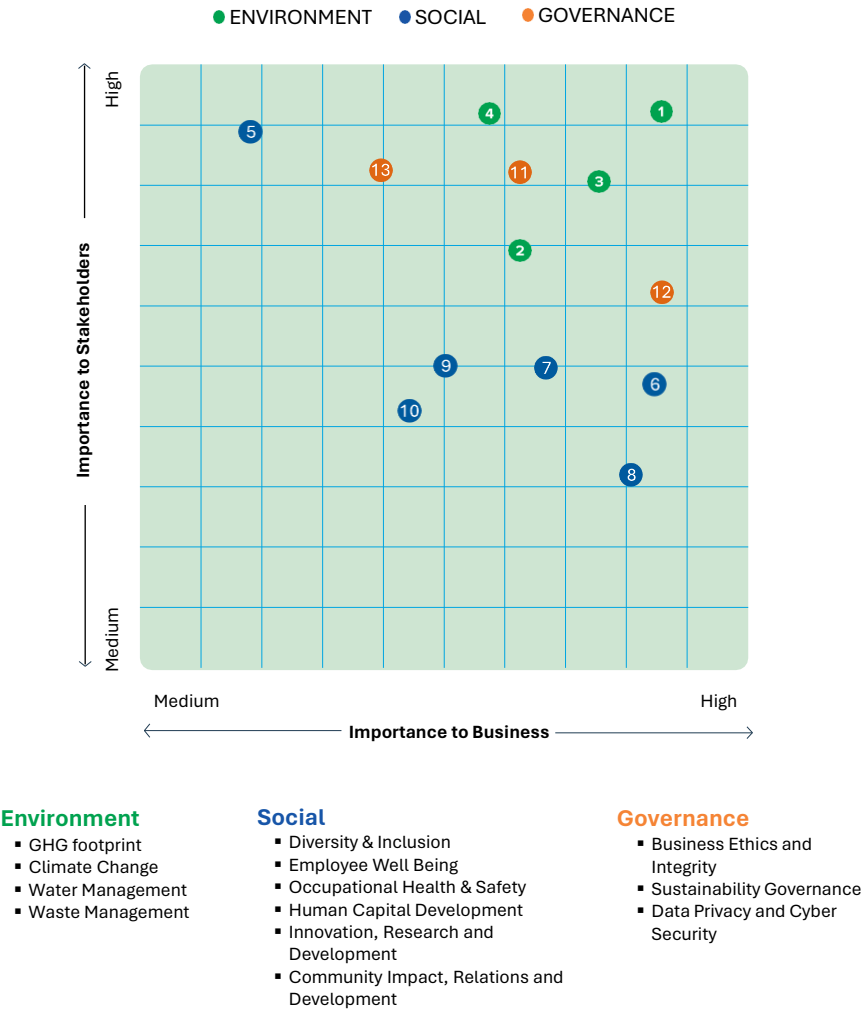
Through a comprehensive assessment of sustainability encompassing ESG aspects, we have identified, examined, and analyzed potential sustainability factors and their impact on our operations and stakeholders. Thorough baselining, benchmarking, and materiality assessments have laid the foundation for our sustainability journey.



\* Surveys were conducted among internal and external stakeholders to rate the importance of each topic on a five-point scale. Stakeholder categories were weighted based on their influence on and by Granules' operations.

#Identified topics were then assessed for their importance to key stakeholders. With senior leadership guidance, the topics were screened and prioritized, resulting in a final list of material topics crucial to both the business and stakeholders. This was done through insights drawn from various global frameworks, standards, and ESG rating agencies.

## Materiality Matrix



## Way Forward

Moving forward, we intend to establish specific goals within the identified material topics, including GHG emission, Climate Change, Water Management, Waste Management, Employee Engagement and Well-Being, Occupational Health & Safety, Talent Retention and Development, Business Ethics and Integrity, Responsible Procurement, Sustainability Governance, and Data Privacy and Cybersecurity. By setting clear targets in these domains, we aim to drive meaningful progress and ensure a comprehensive approach to sustainability across our operations.

## CLIMATE CRISIS: GRANULES PERSPECTIVE

# Climate Crisis: Navigating Risks, Seizing Opportunities

Climate change is the greatest risk we face today, with consequences that go beyond borders, destabilizing nations, and posing challenges to economies and ecosystems.

## Multi-Faceted Impacts of Climate Change

The impacts of climate change are extensive and far-reaching. From visible consequences such as rising temperatures to less apparent ones like heightened extreme weather events, these shifts in our natural environment coincide with significant social, economic, and political shifts. The economic implications of climate change are significant, affecting industries, supply chains, and financial systems.

## The Lens Through Which We View Climate Change

Addressing climate change is an immediate and pressing priority. We see its challenges as catalysts for innovation, inspiring the development of solutions that drive positive change.

Amidst the climate crisis, corporations bear a crucial responsibility to introduce innovative solutions and combat climate change. As customers, governments, and financial institutions increasingly demand sustainable offerings, businesses that can meet this demand will be well-positioned for success in the future.

By embracing renewable energy sources, implementing sustainable practices, and adopting eco-friendly technologies, we can protect our planet while also stimulating economic growth and creating a more resilient and prosperous future.

Viewing climate change through this lens allows us to see it as both a crisis and an opportunity for positive transformation.

## INDIA'S CLIMATE ACTION COMMITMENTS

India has set ambitious targets to reduce carbon intensity and achieve energy independence, including a net-zero target by 2070 and a 45% reduction in carbon intensity by 2030 compared to 2005 levels. These targets present exciting opportunities for businesses to embrace renewable energy, adopt sustainable manufacturing practices, and make advancements in green hydrogen technologies. By aligning with India's vision, companies can position themselves as key contributors to shaping a greener and more sustainable future.



GRANULES CZRO: COMMITMENT TOWARDS NET ZERO



# Net Zero

## Our Compass, Commitment, and Future

In the pharmaceutical value chain, Scope 3 emissions surpass the combined emissions of Scope 1 and 2, making it crucial for business to prioritize decarbonization throughout the supply chain for both sustainability and business reasons.

---

Granules CZRO marks a significant milestone in our journey, demonstrating our unwavering commitment to

Sustainability and initiative towards decarbonization across the supply chain.

This transformative collaboration aims to harmonize growth and sustainability by harnessing renewable energy, sustainable raw materials and embracing the principles of a circular economy.

---



/  
**Chemistry.**  
*Responsibly.*  
/





## Commitment towards Net Zero

In our pursuit to revolutionize manufacturing and transform supply chains, we have joined forces with Greenko to establish the integrated green pharmaceutical zone (GPZ) in Kakinada, Andhra Pradesh, as part of Granules CZRO.



### Our Partnership with Greenko

- Develop and promote state-of-the-art GPZ.
- Supply of carbon free green energy and green molecules solutions
- To build a greenfield facility for large-scale manufacturing of KSMs, Intermediates, APIs, and fermentation-based products.

### Value Proposition of Granules CZRO

- Decarbonize Granules' value streams, offering near "Net Zero" Carbon footprint from "Cradle to gate"
- Backward Integration, Value chain ownership and Supply security
- Create Innovation and Sustainability driven new growth opportunities

### Complete Supply Chain Decarbonization Action Plan



Carbon Free Renewable Energy



Energy Storage Solutions to ensure 24 X 7 availability



Electrolyzer for Green H<sub>2</sub> and its derivatives

Reimagine Manufacturing and Supply Chain reconfiguration through Synthesis of Green Molecules



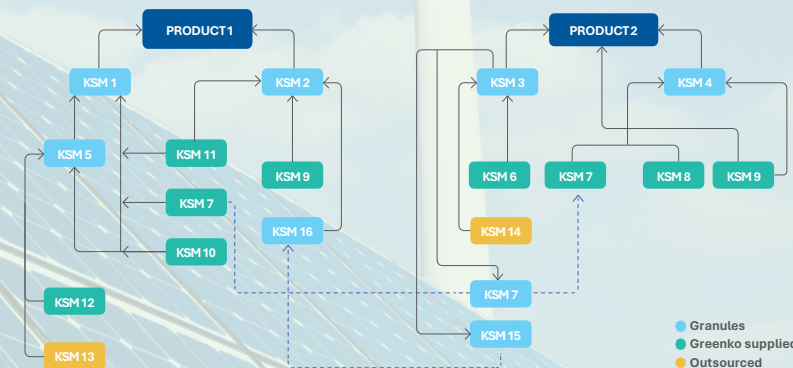
## Closing the Loop

The partnership between Greenko and Granules represents a significant step in the decarbonization of Granules' value streams, aiming for a near 'Net Zero' carbon footprint from 'Cradle to Gate'.

By leveraging Greenko's expertise in renewable energy solutions with Granules' industry knowledge, the partnership aims to achieve decarbonization across the complete value chain. With the circularity built into the operations, the by-products from one product value stream are utilized as input materials in the value stream of other products, creating a closed-loop system.

By maintaining control over the value chain, we ensure the delivery of high-quality products while promoting sustainability and resource efficiency.

## Ownership and Decarbonization of Entire Value Chain with Built-in Circularity



Only two inputs, namely KSM13 and KSM14, will be sourced externally. The carbon footprint associated with these inputs will be offset through carbon sequestering methods.

## OUR KEY ESG INITIATIVES



# Prioritising Environment Stewardship

As a responsible organization, we understand the significance of nurturing a safe and pristine environment and safeguarding the invaluable ecosystems that support us.

Following a proactive approach, we have embraced innovation, incorporated cutting-edge technologies, and implemented operational changes to mitigate long-term environmental risks and promote sustainability.

Through the establishment of a robust Environmental Management System (EMS), we demonstrate our commitment to being a leader in sustainability practices. The facilities at GGP, BPL, JDM, Unit-4, and Unit-5 are ISO certified.

Our continuous efforts focus on reducing emissions, efficiently managing water resources, and minimizing waste generation. Dedicated to advancing on the path of decarbonization, guided by well-defined targets, we strive to be a recognized advocate for sustainable practices in our industry.



## Energy Consumption

Achieved an almost threefold increase in renewable energy share to reach 9.03% for FY 2022-23. This is due to the implementation of solar power usage through open access.

Installed a Solar Power Plant at Gagillapur with a capacity of 320 KWp; with a maximum power generation of 1200 KWH, which in turn would reduce 0.972 MTCO<sub>2</sub>e daily.

Achieved energy savings of 19.06 TJ through the implementation of various initiatives.

## GHG Emissions

Managed to control our GHG footprint, which only increased by 0.4% compared to energy consumption, which rose by 2.3% in FY 2022-23. This was due to the renewable energy and energy efficiency projects we undertook during the year. At the end of the year, our total GHG footprint (Scope 1 and Scope 2) stood at 1,09,958 tCO<sub>2</sub>e.

The moderate growth in GHG emissions resulted in a reduction of GHG intensity by 13.2% compared to the previous year and against the target of 5% YoY reduction.



## Water Management

Successfully reduced freshwater consumption by 11.75% to reach 45,396.4 KL in FY 2022-23. This was a result of rainwater collection, improved water recycling, additional recovery of steam condensate, flash jet pump, and recycled water from effluent treatment plants. In FY 2022-23, the percentage of water recycled during the year was more than 50%. Notably, in BPL-1, more than 90.78% of treated water was recycled.

## Green Buildings

Implemented various initiatives to realize the vision of reaching the platinum rating from the Indian Green Building Council (IGBC) for our new FD manufacturing project.

We aspire to reach the Platinum rating, setting a trend among pharmaceutical companies by adopting sustainability principles in our facility development. To attain the desired rating, several critical areas have been identified and prioritized:

- ◀ Implementation of soil erosion control practices like preservation of top soil, barricading, soil stacking, sedimentation pit, water spraying, rainwater harvesting, and vegetation to ensure the preservation of fertile soil.
- ◀ Proposal for a rainwater harvesting or storage system to capture 50% of run-off volumes from roofs and non-roof surfaces, with storage designed to sustain 2-3 days of rainfall.
- ◀ Targeting 20% energy savings over ASHRAE90.1/ECBC standards with high-efficiency chillers that are CFC-free and equipped with Variable Frequency Drives (VFD) to avoid ozone layer depleting gases.
- ◀ Installation of 1 MW solar rooftop photovoltaics and building-integrated photovoltaics (BIPV), as well as covering 75% of the surface parking area with solar photovoltaics, to reduce the micro-climate impact of heat dissipation.



## Waste Management

Achieved ~100% recycling of non-hazardous waste generated at our manufacturing site in FY 2022-23. Additionally, we reduced hazardous waste by 13.23% to reach 460.3 Metric tons by optimizing the process. During FY 2022-23, we sent more than 85% of solid hazardous waste for utilization by cement industries, which helped reduce our GHG footprint. Additionally, we increased the recycling of hazardous waste by 12.81%.

- ◀ Utilization of 100% certified wood/bamboo-based materials for all wood applications, with a focus on procuring at least 50% of renewable wood-based products certified by FSC or the local Forest Department.
- ◀ Encouragement of the use of salvaged building materials and products to minimize the demand for virgin materials and reduce environmental impacts associated with extraction and processing.
- ◀ Proper management of construction waste through segregation and monitoring to divert at least 50% of waste generated during construction from landfills.
- ◀ Incorporation of building materials with recycled content such as steel, cement, Ground Granulated Blast-furnace Slag (GGBS) based concrete, glass, tiles, gypsum false ceiling, fly ash bricks, and aluminium.
- ◀ Selection of "GreenPro" certified civil and interior materials to ensure sustainable and environmentally friendly choices.
- ◀ Emphasis on factory design that eliminates the risk of major carcinogenic effects related to asbestos exposure.
- ◀ Aim to achieve a daylight factor of up to 50% of occupied spaces

# Building Bridges of Trust

Building harmonious relationships and partnerships on trust have been our guiding principle over the years. These principles have enabled us to create a positive impact on the communities which are influenced and impacted by our operations.



## Community Impact, Relations, and Development



### Pharma Pathshala

Pharma Pathshala, a collaborative initiative with Swarna Bharat Trust, offers skill development and technical training in pharmaceutical operations to high school students. Upon completion, participants gain the opportunity to join our workforce.

Guided by our vision, the program provides a comprehensive two-month training aligned with industry standards. Though Pharma Pathshala, we shape the future of aspiring pharmaceutical professionals, bridging the skill gap and paving the way for rewarding careers in the industry.



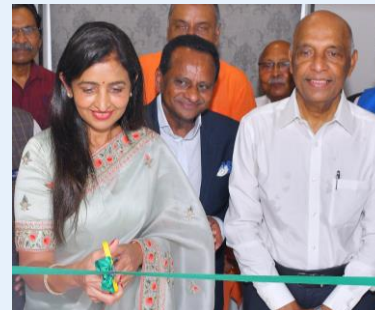
## 1,065

Trainees covered so far under this initiative

### Nurturing Health, Rejuvenating Lives: Dr. Chigurupati Nageswara Rao Dialysis Center



Our center, located in Guntur and Prakasam Districts of Andhra Pradesh, along with the border areas of Nalgonda and Miryalaguda in Telangana, aims to provide accessible and affordable dialysis services. St. Joseph Hospital, in collaboration with the Red Cross Society in Guntur, manages the center, ensuring quality care for patients in need.



Capacity of

## 750

Dialysis treatments per month at affordable cost





### Granules Blood Donation Camp

During the year, around 200 employees donated their Blood for a good cause including our Chairman.

### Inauguration of Overhead Water Tank in Bonthapally Village

We have launched a project to construct overhead water tanks near our Bonthapally plant, providing clean drinking water to nearby villages. The capacity of the overhead water tank is 150KL, and it aims to address the drinking water needs of the local community.



**150 KL**

Capacity of overhead tank



### Inauguration of Overhead Water Tank in Veerannagudem Village

In Veerannagudem, Gummadidala Mandal of Sangareddy, we have inaugurated a 100KL capacity overhead water tank. This initiative addresses the challenge faced by the villagers in accessing a consistent supply of clean drinking water to their households. We aim to provide the residents of Veerannagudem with a reliable and uninterrupted source of safe drinking water.

**2,000**

Expected beneficiaries from the project

### Pradhan Mantri TB Mukta Bharath Abhiyaan

During the year, we contributed ₹ 4.20 Lakhs to Smt. N. Kalyani, the District Leprosy AIDS TB Officer in Anakapalli, under the Pradhan Mantri TB Mukta Bharath Abhiyaan.

This contribution specifically aims to provide six months of nutrition food to 100 patients in need. We are honored to receive a certificate of appreciation from the Central TB Division, Ministry of Health and Family Welfare, recognizing our generous and timely support in the nation's fight against Tuberculosis.



### Eye Health research Initiative at LV Prasad Eye Institute

Granules India Limited contributed an amount of INR 50 million for Preventive Health Care to L V Prasad Eye Institute's Eye Health Research Initiative (Hyderabad Eye Research Foundation) for finding cure for vision threatening eye diseases. The institute continuously performs basic research on vision threatening eye disease mainly through genetic, molecular and cellular biology and microbiology aspects of eye disorders. Clinical research includes clinical trials and public health research, particularly epidemiology, on the prevalence of blinding conditions.





# Nurturing Our Employees

Strengthening our human capital is vital to our growth strategy. Our principles guide us in every action we take, prioritizing employee well-being at every stage of their journey with us.



## Human Capital Development

In a rapidly evolving landscape, it is a business imperative for our workforce to continually acquire new skills and seize learning opportunities. We recognize that it is the passion and dedication of our people that propel us forward, enabling us to redefine the boundaries of what is possible.

Thus, we foster a culture where continuous learning and personal growth flourish, equipping them with the tools and support needed. In doing so, we embark on a path paved with remarkable achievements and groundbreaking discoveries. For it is through the investment in their development, that we cultivate not only a thriving work culture but also lay the bedrock for sustainable success.



### Employee Training Programmes

	Effective Personal Productivity	SMG Learning	One Hour Learning	Code of Conduct Training
Coverage	Top leadership	General manager and above	Assistant manager and above	All employees
	First-Time Leader Program	Operational Excellence Training	Operations Training	SUPAC Training and OOS Investigation
Coverage	Aspiring leaders	Across the organization	Across the organization	Managers



### Women Group Mentorship Program – Granules WoW (World of Women)

The Granules Women Mentorship Program offers a six-month transformative group coaching experience for women, facilitated by experienced business coaches. Each month focuses on different aspects of developing a high-performance mindset, including goal setting, overcoming challenges, strategic planning, and envisioning future success.

Through engaging group sessions and personalized individual coaching, this program ensures that women at Granules receive the guidance and support they need to unleash their potential and grow as high-performance leaders in their careers.

### Engaging Leadership Teams in Sustainable Transformation

In collaboration with external leading global consultants, initiated kick-off meetings with the leadership team and internal stakeholders to promote sustainability and foster a long-term commitment within the organization.

The workshops shed light on the material actions undertaken by us in recent years, encompassing vital areas such as energy efficiency improvements, waste reduction, responsible sourcing, and community engagement.

The discussions highlighted the importance of ESG performance, emphasizing the need for organizations to continuously strive for higher standards.



### Awareness Session on CDP Reporting: Enhancing Environmental Transparency

We also organized an enlightening awareness session for key stakeholders on the CDP and its disclosures. The session emphasized the numerous benefits of CDP involvement, including valuable insights into environmental performance and enhanced accountability for stakeholders.



Employee well-being is paramount to our commitment to sustainable operations and our promise of 'care'. We actively engage in various initiatives aimed at promoting positivity, wellness, and good health among our employees and their families. We organize various events for different groups of employees on different aspects of well-being.



### Celebrating International Women's Day

We commemorated International Women's Day with a special event at our Gagillapur Facility. Esteemed Chief Guest, Dr. Manorama, shared her inspiring journey as Chief Scientist at CSIR-Indian Institute of Chemical Technology.

Mrs. Uma Chigurupati and Ms. Priyanka Chigurupati, Executive Directors, highlighted their remarkable journeys, breaking barriers and defying gender stereotypes.

This event symbolized our commitment to fostering an inclusive environment where women thrive, their achievements are celebrated, and their voices are heard. We remain dedicated to empowering women and advancing gender equality in our organization and beyond.



### Higher-Education Program in Partnership with Tata Institute of Social Sciences (TISS)

We have partnered with TISS to offer a specialized three-year Bachelor's program in vocational studies (B. Voc) tailored for pharmaceutical manufacturing.

The program combines classroom sessions with on-the-job training to provide a comprehensive learning experience. This practical approach allows them to apply their theoretical knowledge effectively. We fully cover the program's cost for enrolled students, underscoring our commitment to investing in their education and professional development.

Through our collaboration with TISS, our goal is to empower our shop floor employees, equip them with industry-relevant skills, and cultivate a culture of continuous learning within our organization.

### ESG Training: Navigating the ESG Landscape

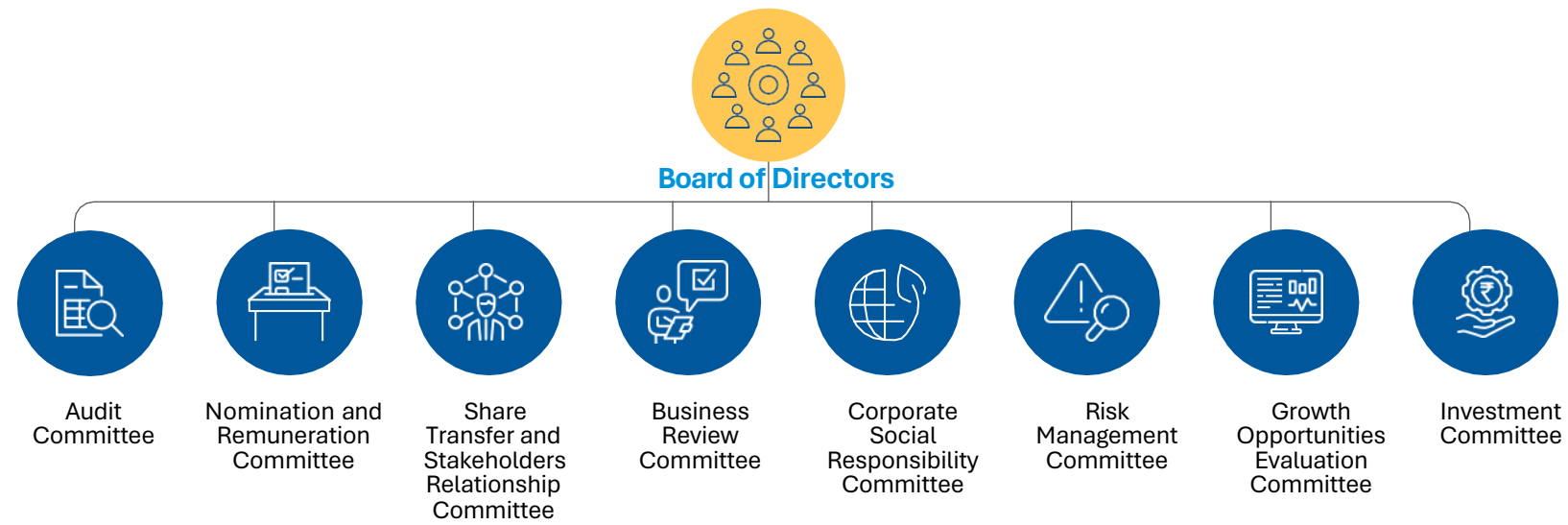
An external leading global consultancy conducted a comprehensive training session on ESG for 50 participants from various functions and locations across Granules.

The training session covered key aspects, including the significance and evolution of ESG in India, an introduction to the BRSR framework, and strategies to address ESG challenges. Armed with this knowledge, participants are now equipped to navigate the complex ESG landscape and embrace sustainable practices within their respective roles.

# Upholding Ethics and Integrity

We strive to create a strong system of governance that is built on integrity, transparency, and accountability. Working together, the Board and senior management uphold our core values and principles, serving as guardians of our governance system.

## Governance Framework



## Board Snapshot

