

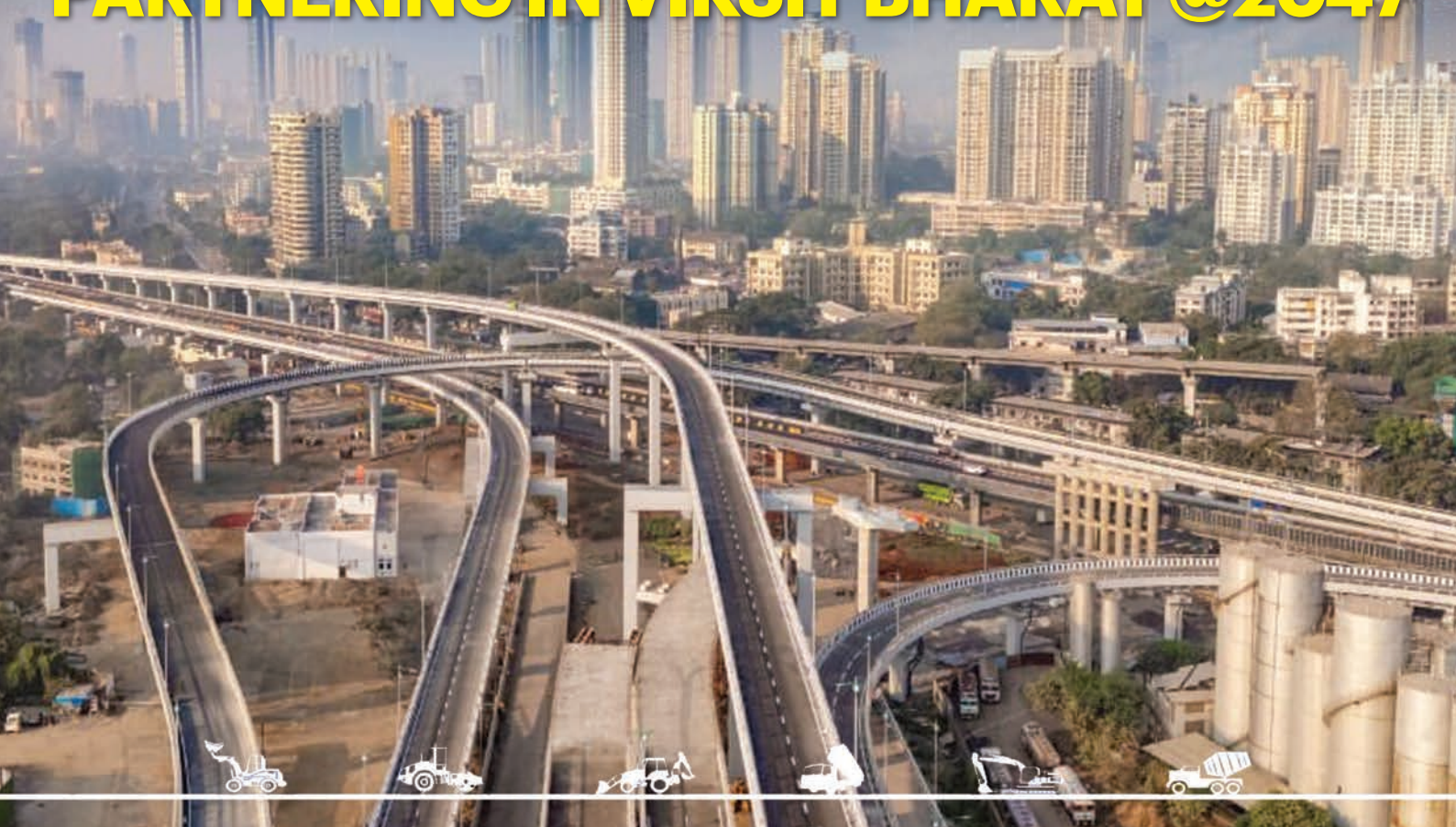
BEATS

ICEMA NEWSLETTER
VOL-09

IN FOCUS

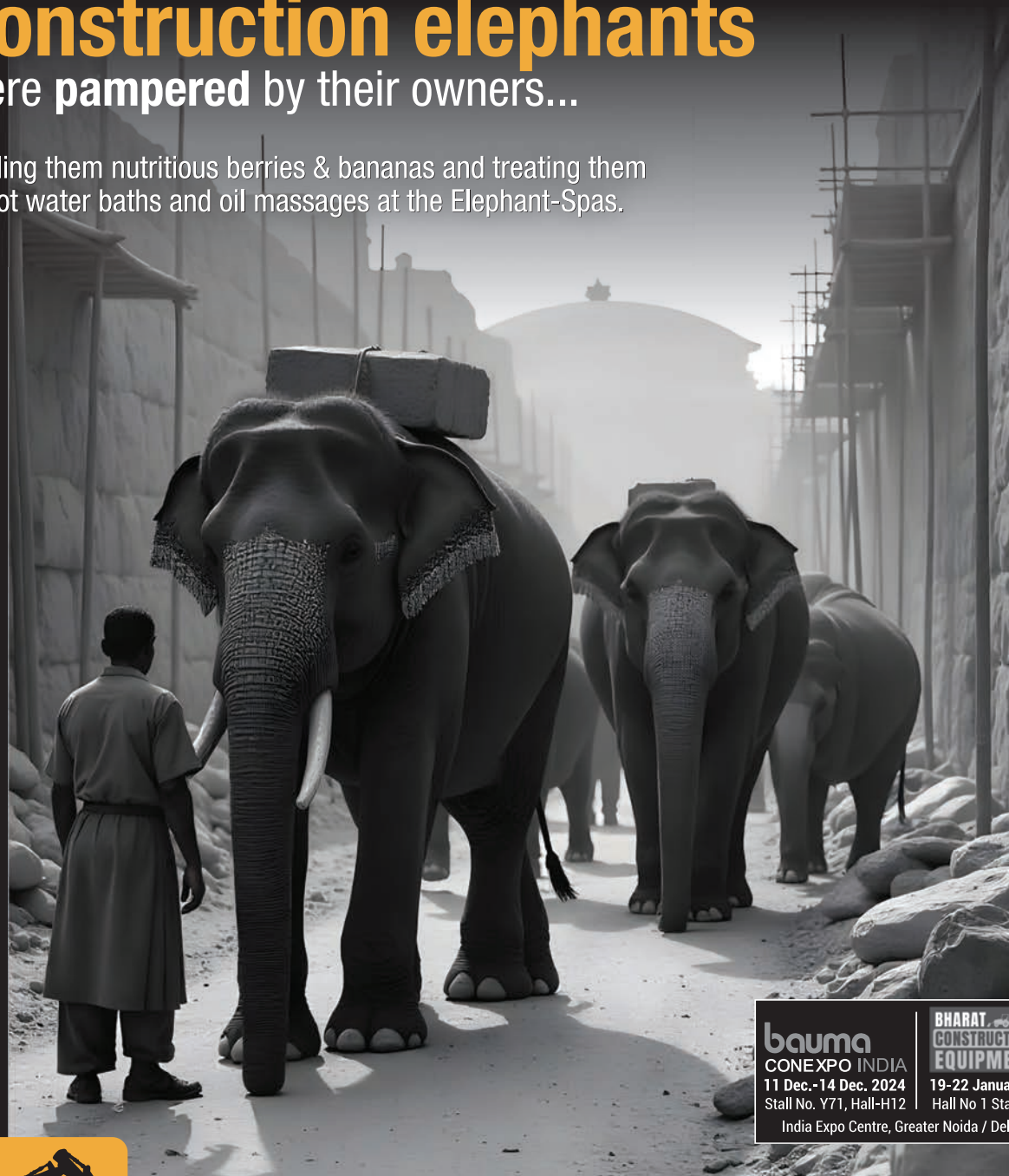
INDIAN CE INDUSTRY:

PARTNERING IN VIKSIT BHARAT @2047



Even in the 16th century,
construction elephants
were pampered by their owners...

feeding them nutritious berries & bananas and treating them to hot water baths and oil massages at the Elephant-Spas.



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BHARAT CONSTRUCTION EQUIPMENT Expo
19-22 January 2025
Hall No 1 Stall no. A6



At Vinni, we are reviving the legacy by showing love & care for the well being of construction equipment.

Performance Enhancing Fuel Additives

are specially developed for construction and mining industry and widely approved by the OEMs for:

- Engine Health • More Power • Lowered Emission • Sustainability

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INDIAN CE INDUSTRY:
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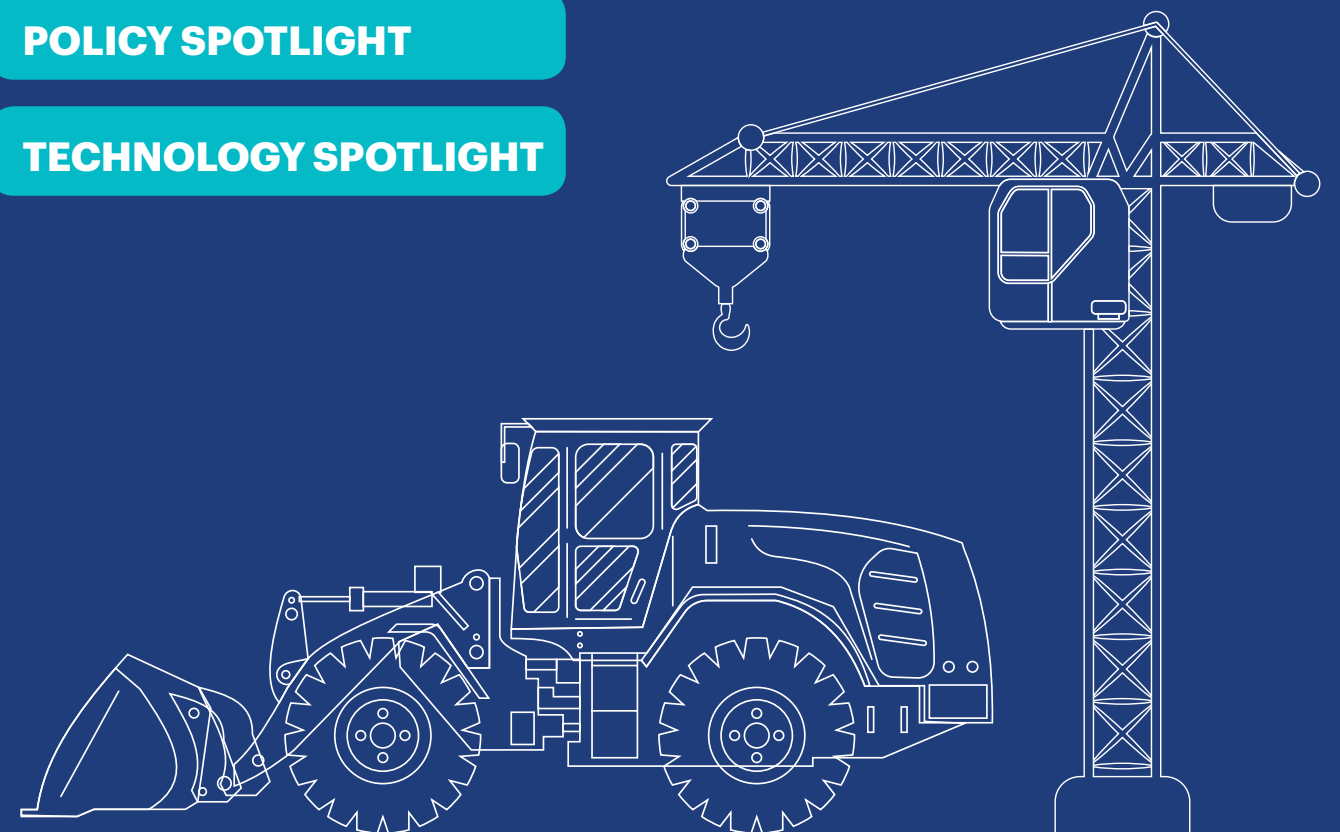
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FROM THE PRESIDENT'S DESK



Mr. V. Vivekanand
President, ICEMA
Managing Director, Caterpillar India Pvt. Ltd.

The Indian economy is one of the fastest growing economies in the world and is powered by creation of a world class infrastructure. As a critical enabler of infrastructure development in the country, the CE industry is experiencing strong demand across all segments of construction equipment including new types of equipment. The industry is riding high on the strong thrust on infrastructure by the government. Due to the CAGR of 26% over the past two years and continued positive momentum, we are confident of achieving our envisaged goals.

So, as the Indian Construction Equipment industry draws close to achieving the targets of Indian CE Industry Vision Plan 2030, we have set our sights on 2047, to align with the Government's vision of Viksit Bharat@2047. ICEMA is developing the Indian CE Industry Vision Plan 2047 to make us the world's second largest CE industry as well as the epicenter of global manufacturing for construction equipment.

In keeping with this goal, the deliberations of our flagship event, ICEMA Annual Session 2024, graced by two ministers, Shri H D Kumaraswamy, and Shri Nitin Gadkari, along with a lineup of distinguished speakers, provided valuable insights and information to propel the CE industry towards CE Industry Vision Plan 2047.





The ICEMA Industry Analysis and Insights Panel provides robust and credible market intelligence by collating, generating, and analysing industry data. The value-added quarterly CE Industry Report is among the several industry reports collated based on data shared by its member companies which represent about 95% of the OEMs operating in the Indian Construction Equipment industry.

According to industry sources, sales volumes of construction equipment have historically recorded overall de-growth in Election years, which is usually more pronounced in the first two quarters. However, in the current fiscal year 2024-24, this trend has been reversed. Despite the dampening effect of the General Elections in the country on demand for construction equipment, there has been a 3% growth in total sales volumes in the first eight months of FY 2024-25.

Due to the Election Code of Conduct in force till the declaration of the poll results on 4th June, new projects could not be awarded, which resulted in the slowdown in sales in the first two quarters. However, since the Indian CE industry has been on a record-breaking growth trajectory over the past two years, the slowdown in demand for construction equipment experienced during Q1 and Q2 of FY 2024-25 is less than what is usually experienced in any election year. In fact, total sales in the first eight months of the present year are 3% higher than those in the corresponding period of last year.

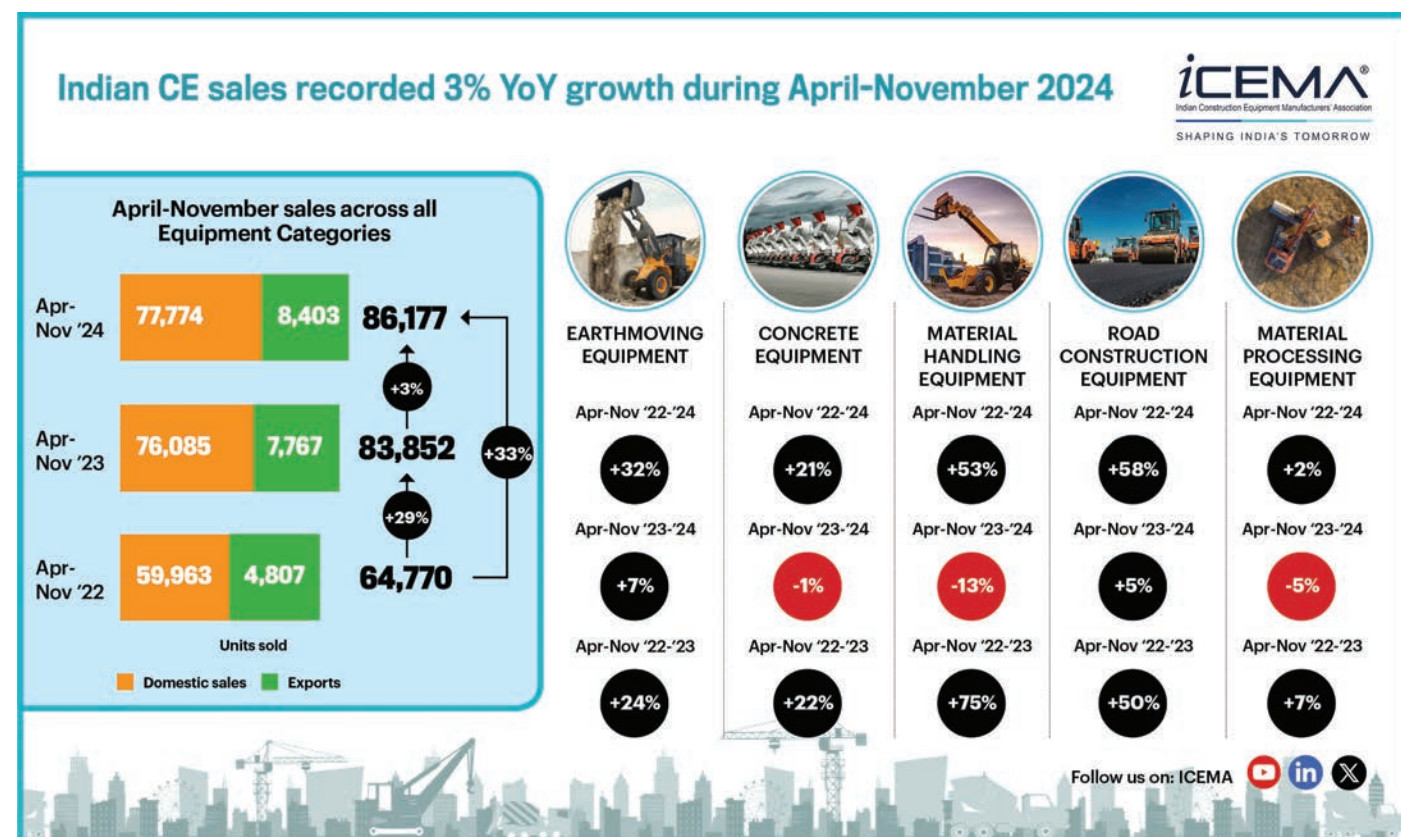
The CE industry sold 12,332 units of equipment in November 2024, of which 11,277 were sold domestically, while 1,055 units were exported. This constituted a 14% month-on-month and a 2% year-on-year decline, due to de-growth in all the five major equipment segments. The industry sold 14,257 units of equipment in October 2024, thus recording 13% month-on-month increase over 12,639 units sold in September 2024, 13,095 units were sold domestically and 1,162 units were exported.

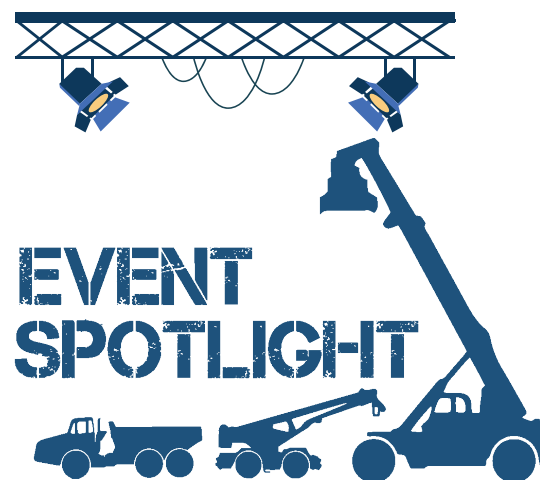
Total sales for Q2 FY25 stood at 30,686 units, of which 27,382 units were domestic sales and 3,304 units were exported. With this the CE industry sales for Q2 25 increased 1% over the 30,521 units sold in Q2 of FY24. On a QoQ basis, however, there was a 6% growth in overall sales, primarily due to 10% QoQ growth in sales of Earthmoving Equipment, which comprises

approximately 70% of total CE sales.

The first quarter sales of Construction Equipment in FY25 grew 5% on a year-on-year basis, from 27,577 units in Q1 FY24 to 28,902 units in Q1 FY25. Of these, 26,020 units were sold in the domestic market while 2,882 units were exported. The growth was a result of increasing sales in three of the five main equipment segments, namely, Earthmoving Equipment, Road Construction Equipment and Concrete Equipment. On a quarter-on-quarter basis, however, the total sales figures for Q1 FY25 were 29% lower than 40,965 units sold in Q4 FY24.

Overall, the increase in total sales in the first eight months of the current fiscal augurs well for the growth momentum of the Indian CE industry.





IN FOCUS
**INDIAN CE INDUSTRY:
PARTNERING IN VIKSIT
BHARAT@2047**



The Indian CE Industry is enthused with the Government's Viksit Bharat@2047 vision of transforming India into a completely developed nation by 2047. Infrastructure would be a key facilitator of this transformation, propelling the rapid growth of the economy and helping to achieve the targets set for 2047. Being a key enabler of the infrastructure development in the country, the CE industry is gearing up to participate in this ambitious journey and play an active role in this process.

Against this backdrop, ICEMA Annual Session 2024, held on 1st August 2024 in New Delhi, was structured around the theme 'CE Industry – Transforming India's Tomorrow: From Vision to Reality – Viksit Bharat @2047'. The theme, thus, announced the thrust of the Indian CE industry on aligning with the Viksit Bharat @2047 mission of the Government.

The event witnessed participation by CEOs, policymakers, senior officials from manufacturers, suppliers, financiers, traders, service providers and other stakeholders in the Indian CE industry. The distinguished speakers and panelists at the well-crafted sessions included representatives from Government and policy think tanks, along with senior leaders from the Indian CE industry.

In addition to four impeccably curated panels, the event featured two plenary sessions. The first plenary session

was graced by Shri H D Kumaraswamy, Minister for Heavy Industries and Steel. Shri Nitin Gadkari, Minister for Road Transport and Highways was the Chief Guest at the second plenary session.

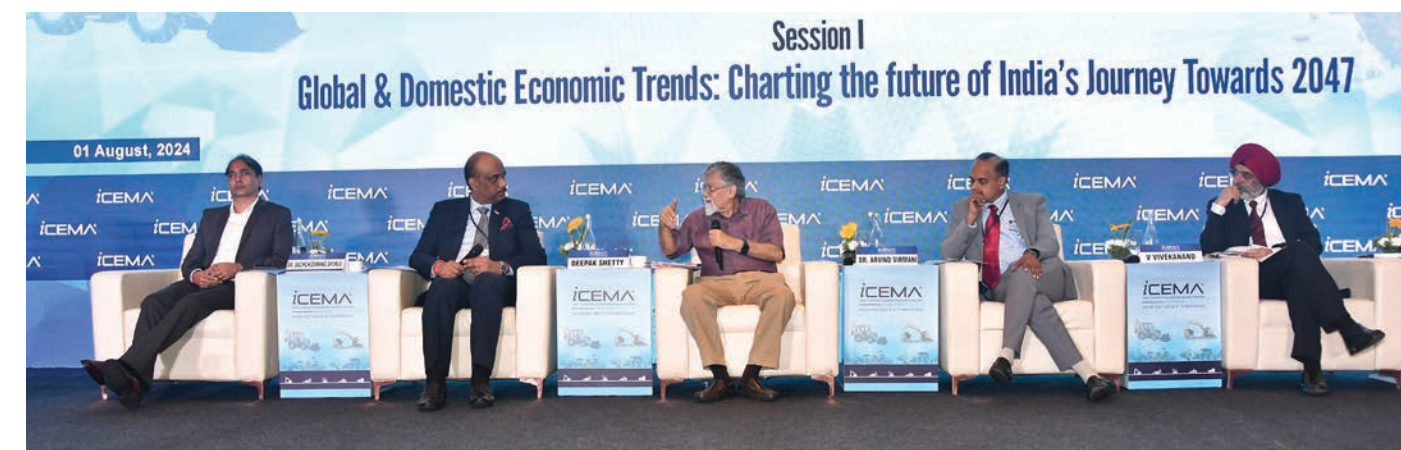
The ICEMA Annual Session 2024 commenced with the Annual General Meeting of the Association wherein the ICEMA Panel conveners presented the report of activities accomplished during FY 2023-24, followed by intensive, thought-provoking deliberations and presentations by industry leaders as well as policymakers.

The event concluded with the agreement to develop the CE industry Vision Plan document for 2047 in alignment with the Government of India's Viksit Bharat@2047 vision, incorporating the elements and learnings from the Annual Session 2024.

SESSION 1

**GLOBAL AND DOMESTIC ECONOMIC TRENDS:
CHARTING THE FUTURE OF INDIA'S JOURNEY TOWARDS 2047**

The deliberations on the growth outlook of the Indian economy and the strategies that India would need to pursue to realise vision of a Viksit Bharat by the year 2047 delved into the measures that different segments of the Indian economy, including the manufacturing sector, should adopt to support the Viksit Bharat@2047 vision of the Government.



- ◆ To become a developed nation by 2047, India needs to increase per capita income from US\$ 2400 to US\$ 18000 in the next 25 years. This is possible through increase in real wages, which in turn can be achieved through focused measures for education and skilling. India has vast reserves of unproductive labor that can be trained so that India becomes the global hub for labor-intensive high-tech manufacturing.
- ◆ FDI has traditionally driven the improvement and growth in manufacturing supply chains in labor-intensive countries. Multinational Corporations from developed countries, i.e., USA, UK, Japan, EU and ROK are the source of two-thirds of the world's FDIs. In order to derisk, India needs to sign foreign trade agreements

KEY
TAKEAWAYS

(FTAs) with these countries to access FDIs, technology and lucrative markets, while offering them cost-effective skilled labor, to accelerate mutually advantageous production at the global level.

- Pragmatic estimates based on historic data trends on purchasing power parity (PPP) show that India will become a middle income country by 2029-30, and a high income one by 2047. Social sector indicators such as per capita GDP, life expectancy, literacy, are expected to improve concomitantly.
- The infrastructure sector is growing at an impressive rate, but three-fourths of the infrastructure needed for the future – greener, more efficient infrastructure – is yet to be built. This spells tremendous scope for the CE industry to contribute to the Government’s vision of Viksit Bharat@2047.



DR. ARVIND VIRMANI
Member, NITI Aayog

“India needs to leverage the demographic advantage by educating and skilling our workforce, so that we can move to comparative advantage, from low skill, to medium-skill to high-skill labor force”.



DR. SACHCHIDANAND SHUKLA
Group Chief Economist, L&T India

“In the next few decades, the GDP will grow by a billion dollars every eighteen months. In the event of the Indian Rupee becoming stronger, the goal of a 30 trillion dollar economy could be achieved much faster”.



SESSION 2

**STRONG, RESILIENT & INNOVATIVE SUPPLY CHAIN ECOSYSTEM:
AN IMPERATIVE FOR ACHIEVING CE INDUSTRY VISION@2047**

Overseas manufacturing partners of the Indian Construction Equipment industry showcased their readiness and innovative product offerings to support the realisation of CE Industry Vision@2047.



KEY
TAKEAWAYS

- Engines from Kubota are used across a wide spectrum of applications in the CE industry, including excavators, forklifts, loaders, material handlers, road rollers, road pavers, belt loaders and concrete saws, amongst others.
- Kubota Corporation has plans to offer an engine lineup that contributes to carbon neutrality through hybrid solutions, pure engine solutions, and fuel solutions.
- Yanmar Holdings exports 70% of its output to the world’s major CE OEMs. Yanmar produces engines and parts in its Chennai factory using 100% Japanese technology and exports to countries across the globe, thus living up to the spirit of Make in India.
- The company has a global service network, with 100 touch-points in India. The company provides training for operators as well as trainers.
- Yanmar is also focusing on localisation of products and providing service by understanding the requirements of the local markets.

SESSION 3

SUSTAINED DEMAND CREATION FOR CONSTRUCTION EQUIPMENT INDUSTRY THROUGH ENHANCING DOMESTIC DEMAND AND EXPORTS

The infrastructure sector, including the Railways, is the most important end-user for the Construction Equipment (CE) industry, driving significant demand for high-tech equipment. The CE industry is committed to supporting the modernisation and expansion of India's infrastructure as it partners the Government in transforming India into Viksit Bharat. The role of reduced logistics cost is critical to enhancing global competitiveness of the Indian industry. This gives added significance to the role of Railways and Highways sectors in providing logistics support to the industry, as well as to bridging trade finance gaps and supporting small manufacturers.



KEY TAKEAWAYS

- Enhancing access of the CE industry's products to the export markets requires reduction in logistics costs and a suitable export environment in which cost and quality competitive products are supported by a favorable tax and duty regime.
- The Government's heavy investment in Railways has the two-fold objective of facilitating a future-ready infrastructure and reducing logistics cost of freight for greater cost competitiveness of Indian goods in export markets.
- Indian Railways plays a pivotal role in providing logistics support to industry, and is the most economical and an environment-friendly mode of transport.

KEY TAKEAWAYS

- To ease congestion of routes, three economic corridors – Energy, Minerals and Cement corridor; High Traffic Density Routes; and Rail Sagar or Port Connectivity Corridors – have been proposed over the next ten years as part of PM Gati Shakti Program. In addition, multi-tracking of routes, Gati Shakti terminals, High Speed Rail, several Metro Rail projects in another 17 cities, as well as a number of prestigious projects are underway. These projects will generate enormous requirement for sophisticated construction equipment.
- The Roads and highways sector has equally ambitious plans for expansion and consolidation of its network, which will involve additional demand for state-of-the-art as well as customised construction machinery. MOCI is enhancing old schemes and introducing new ones to open markets, signing FTAs, to meet national aspirations and expand into neighboring regions and other continents.
- India Exim Bank has introduced new mechanisms to enhance financing availability for end customers, particularly for sourcing equipment and machinery in markets like Africa. It is driving innovation and value addition in component manufacturing and supply, with initiatives like the Ubharte Sitare program to support vendors and ease the burden on OEMs. The Bank emphasises the importance of value addition, machine learning, and IoT in these efforts. Additionally, Exim Bank is addressing trade finance gaps by leveraging its experience in over 100 countries. Through its scheme, it supports around 500 supply transactions worth \$1.2 billion across 34 countries, partnering with 80 banks, benefiting 120 Indian companies across 14 states.



SHRI ANIL KUMAR KHANDELWAL
Member Infrastructure, Railway Board

"Indian Railways plans to enter Viksit Bharat with doubling the length of its track kilometers, providing better and deeper connectivity across the nation. With this the share of Railways in modal transport is set to rise from 27% to 35-40% by 2047. Concomitantly, the logistics cost in the country is expected to decline from the current level of 14% of GDP to 8% of GDP, on par with the developed economies".



MR. VIMAL ANAND

Joint Secretary, Department of Commerce, Ministry of Commerce & Industry

"As the Indian economy aspires to US\$ 5 trillion GDP by 2030, the export target for the engineering goods sector is US\$ 100 billion, and for all the sectors taken together, it is US\$ 1 trillion. A tremendous amount of work will have to be put in to achieve these targets."



DR. SURENDRA AHIRWAR

Joint Secretary, Logistics Division, DPIIT, Ministry of Commerce & Industry

"The data-driven approach of PM Gati Shakti is accelerating project planning and improving quality. There is need to integrate advanced technology and mechanization in construction equipment, as well as to balance quality with speed of growth of the industry. For this, a greater role needs to be played by civil engineering in CE manufacturing."



CEO SESSION

INSIGHTS OF INDIAN CE INDUSTRY VISION 2047

The Indian CE industry has embarked on a path of developing its own Vision 2047 roadmap to align its strategies and growth objectives with the Government's Viksit Bharat 2047 Vision Plan. Discussions between CEOs of member OEMs and with the audience centred on how the Indian CE industry should develop its strategies to empower itself to contribute effectively to India's journey towards Viksit Bharat@2047.

The topics discussed included the targets of Viksit Bharat @2047 vision in terms of investments, incomes, sectoral share in GDP and contribution of exports; along with focus areas for achievement of this vision. Based on this, elements of CE Vision@2047, currently being developed by ICEMA, were also discussed along with key imperatives for the Indian CE industry, going forward. The session also generated discussions on topics such as Dumping of equipment, FTAs, Sustainability and competitiveness of the Indian CE industry's products, skilling and quality in the MSME sector, significance of AI/ML in the industry and importance of cultural accclimatisation for successful overseas collaboration.

KEY TAKEAWAYS

- Key imperatives for Indian CE industry:
 - Significant investment is required by OEMs to achieve economies of scale and cost efficiency
 - The gap between customer preferences and current offerings needs to be addressed through innovation
 - Ecosystem investments will reduce import dependence for components and raw materials
 - Indian CE industry needs to move into manufacturing of more sophisticated and heavy-duty equipment
 - Leveraging synergy with upcoming sectors such as semiconductors and electronics to reduce costs
- The Indian CE industry is gearing up to put in place the required capacities to meet the growing demand for construction equipment. A policy framework to boost infrastructure initiatives at the level of the states would enable sustained demand for construction equipment well into the future.
- Definitive policy action and incentives are needed from the Government, whether in the form of targeted production linked incentives (PLI) or in other forms, to enhance the industry's ability to partner in the economic growth of the nation.
- The CE industry needs a policy framework to shift the formal-to-informal employment ratio in the industry in order to facilitate improvement in the quality of the industry's workforce.

INTERACTION WITH SHRI NITIN GADKARI, Minister of Road Transport & Highways

As the Road and Highways sector continues to be one of the highest end-users of the Indian Construction Equipment (CE) industry's products, support from the Ministry of Road Transport and Highways (MoRTH) is a critical driver in the growth of the industry. Shri Nitin Gadkari, Minister of Road Transport and Highways, expressed his conviction that the Indian CE industry has the potential to become the world's largest and reiterated his ministry's support to the industry. He laid special emphasis on sustainability and discussed the role of alternate fuels, alternate materials and circular economy in the CE industry of the future.



SHRI NITIN GADKARI

Hon'ble Minister for Road Transport & Highways (MoRTH)

"The Government is committed to supporting the growth of the Construction Equipment industry. I assure you that the slowdown in awarding of contracts due to the Election Code of Conduct in the initial part of FY25 will be recouped within the next three months."



KEY TAKEAWAYS

- Alternate fuels are especially relevant for the Construction Equipment industry, since construction equipment uses 4000 crore liters of fossil fuels annually.
- The fuel of the future for the Indian economy is Hydrogen. There is enormous thrust by the government for research on manufacture of green hydrogen domestically. As the scale of use increases across the country, the initial high costs of alternate fuel are bound to decline.

INTERACTION WITH SHRI H D KUMARASWAMY, Minister of Heavy Industries And Steel

A robust policy and regulatory ecosystem are critical for propelling the growth of the CE Industry, which in turn is essential to facilitate the infrastructure and economic growth of the country. The Ministry of Heavy Industries, being the nodal ministry for the CE industry, has been actively supporting the creation of a conducive policy environment for the industry to nurture its growth. Shri H D Kumaraswamy, Minister of Heavy Industries expressed his commitment to supporting the CE industry with growth-oriented policies in view of the contribution of the industry to the manufacturing sector as well as to infrastructure creation in the country.



SHRI H D KUMARASWAMY

Hon'ble Minister for Heavy Industries (MHI) & Steel

"As the nodal ministry for the Construction Equipment industry, I will ensure the support of MHI for the Construction Equipment industry through growth oriented policies. I invite the industry leaders and ICEMA to discuss their issues and requirements with the ministry to find effective solutions.

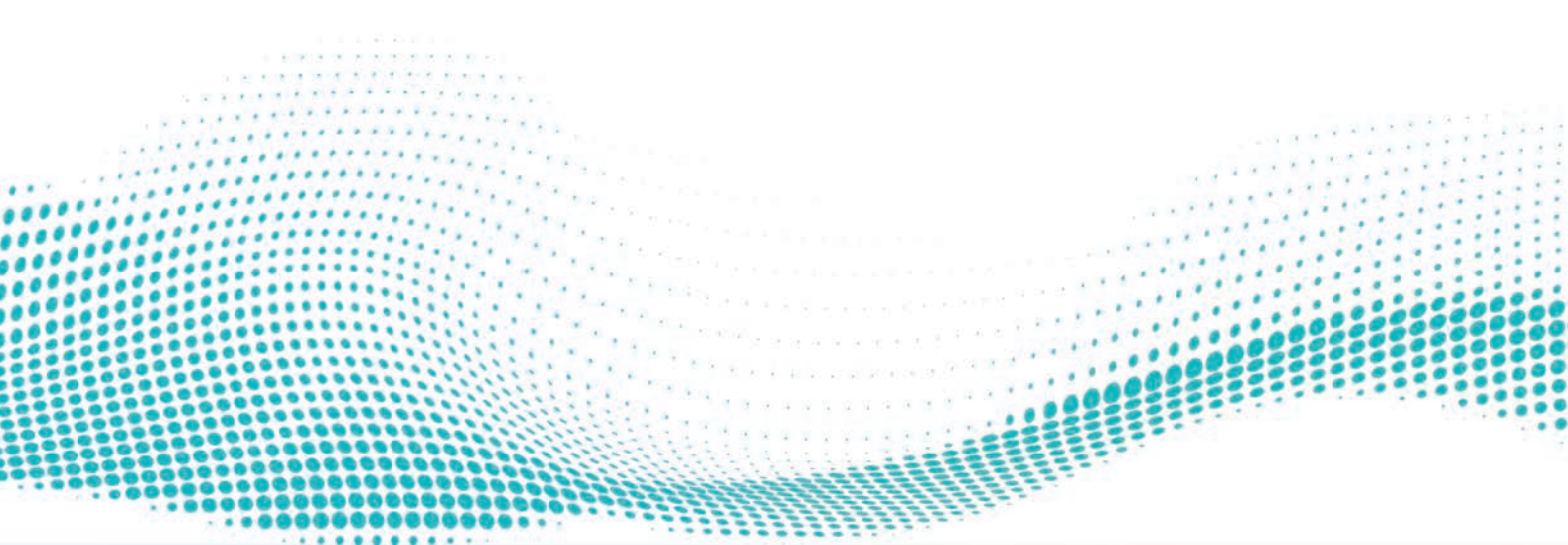


KEY TAKEAWAYS

- There is need for the Government to incentivise use of steel from within India by the industry, rather than from Europe and the US.
- The CE industry needs a testing center dedicated to the industry, since currently the industry is sharing ARAI facilities with the automotive sector. The CE industry has collaborated with ARAI to create a report on the matter, which has recently been submitted to the government.
- The CE industry also needs the Government to make skilling of machine operators and technicians mandatory.









With growing recognition of the transformative role of people priorities for organisations as well as individuals, the contribution of Human Resource(HR) professionals in shaping a skilled, motivated workforce that supports industry advancements is gaining prominence. In view of the facilitative role of the Indian Construction Equipment (CE) industry in infrastructure and other development projects, the inaugural edition of the CE Human Capital Summit organised by ICEMA was a highly topical event in the context of the nation's economic growth.

Held on 31st July 2024 in New Delhi, the Summit was an initiative of the recently constituted ICEMA Human Capital Panel, which works towards promoting collaboration on Human Capital trends within the Construction Equipment sector and facilitating meaningful discussions on matters pertaining to Human

MR. SHALABH CHATURVEDI
 Convener, ICEMA Human Capital Panel
 Managing Director, India & SAARC,
 CASE Construction Equipment India Pvt. Ltd.

"We all remember the Silkyara tunnel collapse, when the most sophisticated equipment imported for the rescue had to give way to a team of rat hole Miners who used shovels, and even human nails, to get the 41 trapped people out of the collapsed tunnel, unharmed. This is the power of Human Capital."



INAUGURAL SESSION

Mr. Sanjeet Singh, Program Director, NITI Aayog, graced the Inaugural Session as the Guest of Honor and delivered the keynote address. Mr. Shalabh Chaturvedi, in his welcome address, commended the Budget 2024-25 initiatives to promote workforce skilling. The panelists discussed the importance of skilling the informal workforce and the need for better, more focused policy support and sectoral understanding. The deliberations of the session also reiterated the need to identify and skill potential workforce from the hinterlands in addition to mainstream urban centers.



- The CE industry is aligning with the Government's Amritkaal vision by drawing up concrete plans for the journey upto 2047.
- India, which will soon be a source of 92 million workforce, can realise its demographic dividend, leveraging its diaspora spread across the globe, its rich heritage and its critical geographical positioning at the heart of South Asia.
- To induct youngsters into the CE industry, there is need to:
 - Reach out to students through academic institutions
 - Train them within the industry right after school, with clear career paths and

KEY TAKEAWAYS

- good prospects
- Induct surplus labor from the agricultural sector with well targeted and well designed programs
- Motivate state governments and village panchayats to provide well tailored training programs and effective infrastructure
- To develop an effective skilling infrastructure in the CE industry, there is need:
 - To break the disconnect between academia, job market and industry, which tend to function as separate silos
 - To forge a better connect between specific industries and their respective ministries for better targeted policies and training programs
 - To mandate much higher safety standards for the CE industry with its high levels of operational hazards
 - For policy measures to increase the proportion of formal employment to attract and retain talent
 - To leverage technology to skill and upgrade a diverse workforce, especially from the hinterlands



SESSION 1

PANEL DISCUSSION WITH CHROs & HR HEADS: BEST PRACTICES ON STRATEGIC HR SOLUTIONS AND TECH-DRIVEN TALENT DEVELOPMENT

Strategies for effectively aligning the workforce with the evolving goals and innovations within the CE industry were discussed, along with the critical role of human capital in driving industry success by addressing challenges, fostering a culture of continuous learning, and leveraging technology to enhance workforce capabilities.



KEY TAKEAWAYS

- Human Capital formation in the CE industry needs to evolve in response to:
 - Evolving business dynamics
 - Changing expectations and aspirations of employees
 - Push factors from the industry
 - Availability of data and AI
 - Cost effectiveness
 - Evolving product profiles
 - Rapidly changing requirements of end-users
- Workforce rationalisation and employee retention requires:
 - Showcasing the glamor and satisfaction associated with shopfloor and front-end jobs
 - Hiring shopfloor workers from ITIs with the opportunity to enrol in company-sponsored diploma programs, followed by promotion to de-skilled white-collar jobs

KEY TAKEAWAYS

- Training fresh engineering and management graduates across functions to find the best fit
- Inducting suitable post-graduate engineer trainees (PGETs) from tier2 and tier 3 cities to reduce attrition rate
- Recruiting new employees based on willingness to work, rather than simply on academic performance
- Employee engagement through realistic and informative orientation programs
- Assigning roles and responsibilities based on capabilities, rather than age or hierarchy



SESSION 2

DRIVING A CULTURE OF INNOVATION, LEADERSHIP AND SKILLING IN THE CE INDUSTRY

Initiatives implemented by the CE industry, emphasising the importance of organisational culture and empowering individuals to thrive were discussed across three segments in the context of unlocking human potential through robust training and skilling in their organisations.

SEGMENT 1

DRIVING A CULTURE OF INNOVATION AND LEADERSHIP IN THE CE INDUSTRY



KEY TAKEAWAYS

- **Measures of efficacy of Human Capital development in an organisation:**
 - Talent attraction
 - Attrition rate
 - Succession planning
 - Percolation of company culture and loyalty down to the lowest levels
- **Employee engagement for spot creation of cross-functional talent:**
 - The leaders need to have the conviction about being able to do this and its benefits
 - Need an open mind to pick talents from different domains and find their best fit
- **Performance levels in mission-based teams:**
 - Sponsor works across the organisation for debottlenecking
 - Leader to lead the mission
 - Team members to execute the missions
 - CTQ (Cost, Time, Quality) are the three parameters on which the performance of the mission-based teams is assessed



SEGMENT 2

FOSTERING DIVERSITY & EXCELLENCE THROUGH A HIGH-PERFORMING AND INCLUSIVE WORKFORCE



KEY TAKEAWAYS

- In order to attract women into the CE workforce at the entry level there is need to create awareness amongst girl as well as their families to bring about a societal shift in mindsets about girls studying STEM subjects. This needs to be supplemented by suitable training programs with in-built financial incentives.
- Male employees in organisations need to be sensitized towards the needs of diversity and inclusion and be motivated to participate in defining a healthier, more diverse and inclusive culture.



SEGMENT 3

UNLOCKING HUMAN POTENTIAL THROUGH ROBUST TRAINING AND SKILLING ECOSYSTEM



KEY TAKEAWAYS

- Top imperatives for CEOs:
 - Designing a workforce that is able to embrace a virtual/ hybrid/remote work scenario, especially since this has emerged as a critical demand post the pandemic.
 - Upskilling, reskilling or having a workforce with the relevant skills to keep up with the pace at which things are changing. This requirement constitutes 80-85% combination skills: hardcore engineering skills married with technology, which is very rare.
- In terms of employee evaluation, Performance Management Systems, which are backward-looking, need to be replaced by Potential Management Systems to evaluate employees on the basis of skills and competencies, thus measuring their ability to grow the organisation.
- As required by the Government's emphasis on skilling in the recent Budget, IESC is endeavoring to undertake a higher quantum of skilling activities by expanding its outreach to more skilling partners, to be funded through CSR projects.
- Efforts are underway to increase women's participation in the CE workforce.

The Summit was, therefore, an important step towards strengthening India's manufacturing industry and enhancing its global competitiveness as it initiated discussions on Best Practices on Strategic HR Solutions and Tech-driven Talent Development. The deliberations of the Summit also explored strategies for effectively aligning the workforce with the evolving goals and innovations within the CE industry, thus making human resource development a critical enabler of the industry's growth.

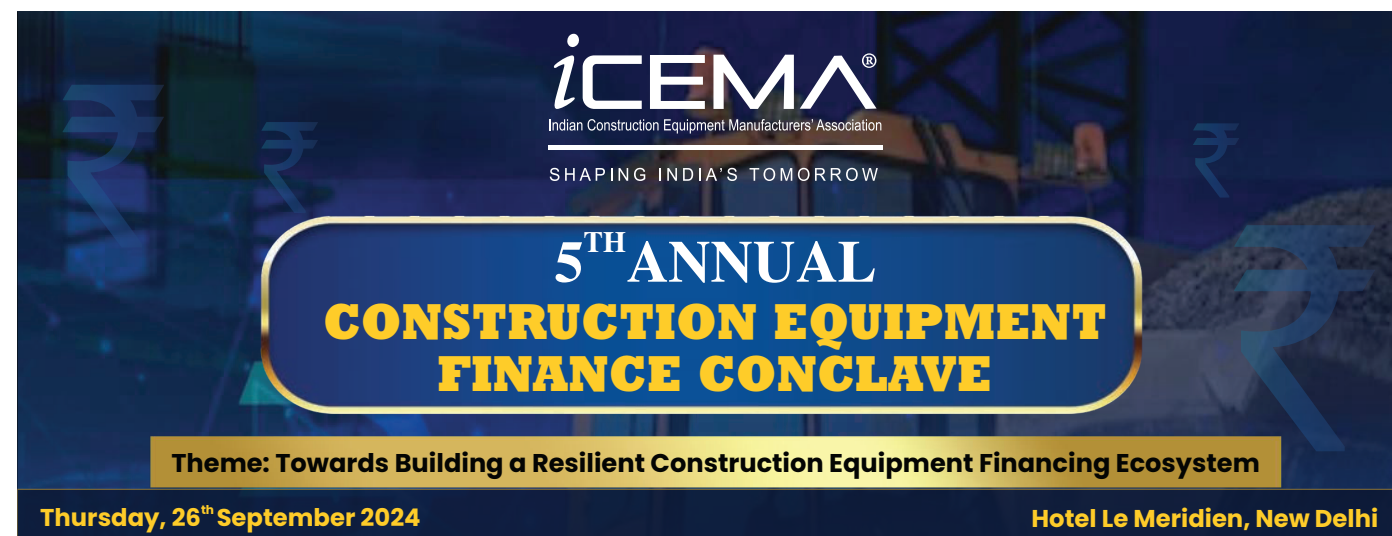
MR. SANJEET SINGH
Program Director, NITI Aayog

"India, with its current workforce of 55.6 crore, is fast emerging as the primary source of the world's future workforce. Further, India's workforce has the advantages of a demographic dividend of a young population, a rich and diverse cultural heritage and geographical positioning at the heart of South Asia. To leverage this advantage, the CE industry needs to attract quality workforce and to deepen industry-academia connect for better targeted and more employable curricula in academic and vocational training institutes".









India's vision of becoming a developed nation by 2047 is closely linked to the quality and scale of its infrastructure development, as robust and innovative infrastructure across key sectors will drive economic growth and attract investments. In the Union Budget 2024-25, the government has allocated 3.3% of GDP, or INR 11.11 trillion, towards infrastructure, with a sharp focus on transportation and logistics as part of the 'Viksit Bharat' vision. Therefore, developing a resilient CE financing ecosystem is essential to support the unhindered growth of the infrastructure sector.

The ICEMA 5th Annual Finance Conclave deliberated upon how a robust and resilient CE financing ecosystem can be created to support the growth of infrastructure and the CE industry. The Conclave, themed "Towards Building a Resilient Construction Equipment Financing Ecosystem," offered key insights into the growth and future of India's CE industry, focusing on innovative financing solutions and policy frameworks essential for driving the sector forward.

INAUGURAL SESSION

Towards Building a Resilient and Robust Financing Ecosystem for Infrastructure and Construction Equipment

The opening discussions by industry thought leaders focused on key strategies for creating a robust financing ecosystem for infrastructure and the construction equipment industry. The focus was on innovative financing solutions, the challenges faced by end users in infrastructure and construction, and ways to strengthen the financial framework needed to support India's ambitious infrastructure goals.



KEY TAKEAWAYS

- The CE industry is contributing to the formulation of the National Goods Policy 2025, to enable the Government in realising the goal of AatmaNirbhar Bharat.
- The role of a strong financial ecosystem for the CE industry is crucial since construction equipment comprises 20-25% of the total cost of infrastructure projects, and 90% of the equipment used in infrastructure projects is financed.
- The industry needs investment to the tune of US\$ 1 trillion to fulfil its potential in nation building. A robust and resilient financing ecosystem would expedite mission critical infrastructure projects for the nation's development.
- Robust growth financing is also key to increasing the industry's capacity and capabilities to realise its vast potential in export markets and become a global manufacturing hub for CE.
- The role of private sector financing needs to be bolstered through judicious policies and incentives. The financing initiatives for the industry also need to be technologically escalated through the use of fintech and data analytics.
- There needs to be focus on developing the secondary market for construction equipment for leasing to gain traction in India, for deeper market penetration and bringing in new customers, and to deal with rapidly evolving technologies and higher pace of obsolescence of equipment.
- Financing solutions for vehicles operated on alternate fuels, such as electric CEVs, would aid in increasing their market reach, especially in view of their high initial cost.
- Integrated financing solutions where the government, private financiers and sophisticated data analytics combine to create innovative tools are the most effective on the ground.



SHRI H.D. KUMARASWAMY

Minister of Heavy Industries & Steel, Government of India

"The Ministry of Heavy Industries looks forward to an era of collaboration between the industry and Government to realise Vision Amritkaal of the Government".



SESSION 1

EMERGING TRENDS IN CE FINANCING: INNOVATIVE FINANCING MODELS AND DISRUPTIONS

As the demand for CE continues to grow, the financing needs of the sector are also expanding, requiring financial institutions to evolve their offerings to meet industry needs. Discussions about transformation of CE financing explored sector-specific innovative products and solutions being offered by financial institutions, how global best practices are shaping CE financing in India, and examined emerging trends that are likely to impact the future of financing and how digital financing platforms are disrupting traditional financing methods to enhance efficiency and accessibility.



KEY TAKEAWAYS

as well as large companies, with the highest concentration of infrastructure companies through collaboration and partnership with 60 banks,.

- With the advent of fintech there is growing scope for unsecured loans to facilitate operations for small players and new entrants since the cash flow of the borrower can be adequately scrutinised through advanced data analysis and credit profiling, without their having to tie up resources in creating a physical presence.
- The financing sector needs to come up with instruments to provide interim or bridge financing during downturns in the business cycles to enable smooth functioning, especially for MSMEs.
- A potential area for creative financing solutions is the rural CE markets, which are constrained by shortage of adequate financing options.
- New entrants into the CE markets are a huge area for which innovative financing solutions need to be devised, as these, apart from developing infrastructure, will also be a source of increasing employment and economic growth.
- Financing institutions need to collaborate with OEMs to track machine usage and their lifecycle, to make informed decisions and provide low cost financing for used machines without needing to hedge potential risks.
- The perspective in the context of MSMEs and small borrowers, needs to be shifted from lender-centric to borrower-centric, with some in-built flexibility to accommodate their specific needs.

KEY TAKEAWAYS

- Growth of CE industry hinges critically upon the support of its funding partners. There has been a notable shift in demand for flexible financing options in view of the evolving nature of infrastructure projects and the economy.
- Working capital loans and leasing arrangements are becoming increasingly important tools to manage risks and adapt to changing market conditions. New financing models that are evolving include options such as subscription-based financing.
- The contribution of the CE industry through supply of productive, innovative and state-of-the-art equipment is invaluable to make the future development of Indian Railways possible at the required pace and efficiency. This in turn, would help in reducing logistics costs and make India's products globally competitive.
- M1xchange for TReDS (Trade Receivables Electronic Discounting System) activities, i.e., supply chain financing and working capital solutions for MSMEs, provides the working capital financing for MSMEs



SHRI ANIL KUMAR KHANDELWAL

Member Infrastructure Railway Board, Ministry of Railways,
Government of India

"Starting with a 34 kilometer route by steam engine, to 1.3 lakh track kilometers so far, Indian Railways plans to enter Viksit Bharat with double this length of track kilometers and complete electrification, providing better and deeper connectivity across the nation in an environmentally friendly manner".



SESSION 2

DRIVING ECONOMIC RESILIENCE: FINANCING TRENDS, MARKET INSIGHTS & SUPPORT FOR SMES FOR INDIA'S INFRASTRUCTURE GROWTH

As India strives to achieve its goal of becoming a developed nation by 2047, strategic financing in the infrastructure and construction equipment (CE) sectors will play a pivotal role in driving this growth. Deliberations upon how robust financial ecosystems, macroeconomic stability, and policy-driven approaches can enable the CE industry to contribute more effectively to India's infrastructure ambitions explored the importance of SME financing and how financial institutions are innovating to meet the evolving needs of the industry.



KEY TAKEAWAYS

- The growth of nominal GDP will largely determine the expansion of capital expenditure at the state governments' level. From the next year onwards, the Government intends to stabilise the debt to fiscal deficit ratio, rather than just reducing the fiscal deficit figure, to continue to support capital expenditure growth.
- Roughly half of the required long term infrastructure funding target of 8% of GDP is coming from the government. The rest needs to come from private, hybrid and overseas sources.
- The advent of Development Finance Institutions (DFIs), has catalysed a transformation of savings and investments by households by providing a productive instrument to mobilise domestic savings and investment for infrastructure funding.
- Financiers constantly need to look for solutions that balance the institution's need for viable funding and the mandate to support the customers – especially new entrants – with regard to their need for finance, their knowledge and awareness of the industry and their capacity to repay.
- Credit Guarantee Fund Trust for Micro and Small Enterprises (CGTMSE) has a limit of INR 5 crore for SIDBI to disburse financing to MSMEs and new entrants. With the support of World Bank and financial institutions, resharing facilities upto INR 30 crore can be provided for projects that involve green energy, environment-friendly technologies, conservation and other such sustainable activities.



SESSION 3

STRATEGIC DIALOGUE ON CE FINANCING – STRENGTHENING OEM-FINANCIER COLLABORATION

Both the borrowers as well as the financiers face several challenges in financing the sector. Restricted access to finance arising out of limited options and inadequate penetration of alternative financing solutions are needed to enable the CE industry to play a critical role in infrastructure development. Focused roundtable identified issues/challenges and explored possible solutions through a dialogue amongst various stakeholders including OEMs/Component manufacturers and Financiers.

ROUNDTABLE 1: OEMs

CREDIT & RISK MANAGEMENT/REGULATORY RELATED CHALLENGES IN CONSTRUCTION EQUIPMENT FINANCING

Key concerns raised:

- Various types of risks such as demand risk, deployment risk, credit risk
- The biggest concern for both OEMs and financiers is covering Asset risk – through telematics and control of over-invoicing
- Disbursement and recovery of margin money
- Benchmarking issues for used equipment
- Digitalisation
- Month-end problems
- Illegal exports



ROUNDTABLE 2: FINANCIERS

PARTNERSHIPS BASED INNOVATIVE MODELS FOR FINANCING



Key concerns raised:

- Need for end-to-end solutions from sourcing to disbursement
- Control at the point of over-invoicing by setting clear margins. To be validated through RTGS or NEFT; month end billings
- A number of NBFCs which can partner banks to expand reach, especially in rural areas, since they have better access and higher risk appetite for funding CE
- Integration of data machines on usage, condition and grid.
- Need to develop leasing products between financiers and OEMs. Due to simplification of taxation issues due to GST, leasing has become more viable. However, large customers are resistant because they need to show assets in their names and wish to own assets. There is also the issue of operational lease versus financing lease which needs to be resolved to increase leasing penetration, which is about 1% at present. To curb unauthorized exports, blacklisting of such customers by both OEMs and financiers can be considered
- Co-lending under CLM2 is assigned to banks, freeing up the companies' capital.

It was decided to categorize the issues into broad buckets and address them systematically by representing them to the relevant stakeholders within the CE financial ecosystem.





SKILLING SPOTLIGHT

Skilling is one of the key pillars of the Vision Plan 2030 developed by ICEMA for the Indian Construction Equipment industry. As the CE industry, a key enabler of the infrastructure sector, gears up for accelerated growth in the wake of the Government's enhanced thrust on infra-led economic growth in the nation, the targets of Vision Plan 2030 are in clear sight. Concomitantly, demand for skilled workers to operate this growing supply of construction machinery is also expected to increase rapidly in the near future, thus placing skilling of the CE industry's workforce at the centre of its agenda for growth. The SKILLING SPOTLIGHT section of CE Beats covers the activities and initiatives and issues pertaining to Skilling in the CE industry.

Infrastructure Equipment Skill Council (IESC) Leading Skilling Initiatives for the CE Industry

Skilling of operators and technicians improves the economics of operation, fuel consumption, lifecycle, productivity and safety of the equipment as well as the operators and the jobsites. Further, the infrastructure initiatives of the government require deployment of the latest machines and technologies, and to get the best out of these machines, a skilled workforce is required. However, there is no mandate for skilling of operators of these advanced machines from the government.

IESC was initiated under the National Skills Mission in 2014. IESC is an accredited body under the Ministry of Skill Development and Entrepreneurship and is the channel for government policies on skilling. Over the last ten years the achievements of the (IESC) have happened in partnership with the industry and OEMs. To date, IESC has developed 40 job roles and is affiliated with 100 training partners, mostly OEMs, corporate partners, private training partners, NGOs and trusts, and training academies who deploy their state-of-the-art centers to enable workforce skilling.

IESC has also certified more than 800 trainers and 70,000 operators and technicians, working in collaboration with four assessment agencies. Almost all major OEMs have set up well equipped training centers having



Interaction of ICEMA, IESC with IIT Kharagpur



Action Training Program

machines, components, cut sections, electric and hydraulic systems that can be used for simulating faults, classrooms, simulators and open areas for machine demos.

Key activities of IESC:

- Skill mapping for the sector
- Creation of qualification packs for job roles
- Affiliation of training partners
- Accreditation of training centers
- Training of trainers
- Assessment and certification of candidates
- Serving as a skill repository/ knowledge base
- Exploring new opportunities for skilling

IESC currently has 28 job roles which are aligned to National Skill Qualification Framework (NSQF) levels 3, 4 and 5. Additional job roles in emerging

areas of new products and technologies and are constantly evaluated and acted upon. IESC constantly strives to create and upgrade qualifications based on evolving industry needs and technology. IESC also assists in accreditation and affiliation of training partners and training centers. Promotion of Centers of Excellence is also one of the services provided by IESC. Trainings delivered by IESC are assessed by a third party, as per the Government's regulations.

IESC offers a platform, through regular meetings, conferences and exhibitions, for members to connect on key issues related to skill development in the Construction Equipment industry. Through these platforms IESC facilitates industry partnerships, academic connect, and linkages with private training partners and NGOs. IESC also works with the government through private training partners to provide last mile training in small villages and districts.

As required by the Government's emphasis on skilling in the recent Budget, IESC is endeavoring to undertake a higher quantum of skilling activities by expanding its outreach to more skilling partners, to be funded through CSR projects.

Efforts are underway to increase women's participation in the CE workforce. Women operators are being trained for Excavator and Dumper operations in iron ore mines, as well as on Backhoe Loaders. Women operators were featured in EXCON 2023, showcasing their growing role in the CE ecosystem.

The ambit of IESC training programs encompasses:

- Upskilling programs
- NSQF aligned training programs (levels 3 and 4)
- Fee based programs
- Government funded programs (State and Central)
- CSR funded programs
- Customised programs



Operator Training Program at Kotak

STRATEGIC PLANS OF IESC to evolve from simply facilitating to driving knowledge and skills in the industry.

Immediate:

- New OEM Memberships
- Deepen existing relationships
- State Government engagement
- Private partnerships
- User industry
- ITIs

Near Term:

- Academia – Higher education programs
- IESC-fee based programs
- Technical seminars/conferences
- Learning Management Systems (LMS)
- AI integration
- Global partnerships

Mid-term:

- IESC Training Academy
- CSR Fund deployment
- Think Tank for the industry





As the apex body representing the Indian Construction Equipment industry, ICEMA is constantly engaged in policy advocacy with government departments, ministries and regulatory bodies in the best interests of the CE industry. The following are the most recent policy related endeavors of the Association.

MEETINGS WITH MHI ON HS CODE MAPPING AND RECLASSIFICATION

MHI and DPIIT have commenced an initiative of reclassification of Indian Trade Clarification based on Harmonized System (ITC-HS). ICEMA is working closely with MHI for mapping the HS codes and held discussions with Shri Shubhankit Shrivastava, Deputy Secretary MHI on the subject.

ICEMA highlighted key issues of HS codes in CE Industry which comprised appropriate classification of the concrete mixers, SLCM and boom pumps under the GST regime; duplication of HS codes description for certain equipment like wheeled dozers/bulldozers; and absence of distinct HS codes for Tower cranes/Crawler cranes, which results in trade of these equipment interchangeably across these HS codes. ICEMA requested for streamlining these issues pertaining to HS codes for CE Industry.

REPRESENTATION TO MHI ON PROPOSED AMENDMENT OF PUBLIC PROCUREMENT ORDER (PPO-MII), 2017

ICEMA has made a representation to MHI regarding the proposed amendment in the Public Procurement (Preference to Make in India) Order, 2017 [PPP-MII Order, 2017], wherein the minimum local content requirement for Class-I and Class-II suppliers was proposed to be revised from 50%; 20% to 70%; 50% respectively. ICEMA proposed a two-pronged approach, which included:

Gradual Increase: Instead of a sudden increase, consider a phased approach with a 5% annual increase in local content requirements from the current levels to proposed levels of local content for Class I and Class II suppliers, which can be achieved by 2030. However, there could be some equipment for which localisation content level could be capped at 60% and 40% respectively as beyond these levels it would be difficult to increase localisation content due to limitations of design, component availability, limited volume as well as high cost of technology.

Incentivizing Domestic Production: Introducing Production Linked Incentive (PLI) scheme or similar incentives to boost investment for manufacturing key components for Construction Equipment. This will encourage the development of a robust domestic supply chain for currently imported parts.

ICEMA PARTICIPATION IN SHAPING THE NATIONAL CAPITAL GOODS POLICY 2025

ICEMA is actively participating in the development of the National Capital Goods Policy 2025, led by MHI. MHI is reviewing the existing National Capital Goods Policy 2016 and gathering feedback from the industry in the following areas:

- ★ WG 1 – Super Charging Domestic Demand (FICCI)
- ★ WG 2 – Turnaround Trade Balance (CII)
- ★ WG 3 – Promotion of making India Manufacturing Hub (CII)
- ★ WG 4 – Building IP ecosystem & enhancing R&D (FICCI)
- ★ WG 5 – Leveraging Digital Technology (CII)
- ★ WG 6 – Build Energy Transition and Sustainability (FICCI)

Each working group comprises of representatives from MHI, concerned government departments & agencies, industry, and industry associations. CII and FICCI are co-convening three sub-groups each, with the support of BCG and Deloitte as knowledge partners. ICEMA has represented the concerns and recommendations in each of the above areas for the Indian CE Industry.

PARTICIPATION IN INTERACTIVE SESSION WITH MINISTER OF COMMERCE & INDUSTRY:

ICEMA participated in the interactive session conducted by Ministry of Commerce and Industry under the chairmanship of Shri Piyush Goyal, Minister of Commerce & Industry on 20th August 2024 at Vanijya Bhawan. ICEMA proposed some of the key measures on behalf of the Construction Equipment (CE) Industry that would encourage domestic manufacture of construction equipment, accelerate exports and curb unfair competition in domestic market due to import dependence, and predatory pricing/ unfair lending terms, and develop the necessary ecosystem to promote growth and development of the Indian CE industry.

VENDOR MEETING WITH DPIIT REGARDING DOMESTIC MANUFACTURING CAPABILITY OF CRANES TO BE PROCURED THROUGH GLOBAL TENDER ENQUIRIES (GTES)

ICEMA participated in the vendor meeting organised by DPIIT under the Chairmanship of Deputy Director General, Shri Rajesh Kumar, on 9th September, 2024 through video conference with relevant industry players and Ministries / Departments / Agencies to understand and analyse the available domestic capacity for listed items and items required to be indigenised, and to check the status of indigenisation efforts by the industry under “Make in India” focusing on:

- ★ The domestic capacity and capability of the specific high-capacity cranes intended to be procured by Hindustan Urvarak & Rasayan Limited (HURL) through GTE.

- ★ The viability and expected time frame required for indigenisation of these cranes.

Thirteen GTE proposals have been submitted by Government procuring agencies on the e-Samiksha portal to seek GTE exemptions. Among the listed items, the following construction equipment is proposed for procurement by Hindustan Urvarak & Rasayan Limited (HURL) under the Ministry of Fertilizers:

- ★ Tyre mounted telescopic hydraulic diesel driven, multi-axle, all terrain mobile crane of 150-160 MT capacity
- ★ Hydraulic rough terrain, tyre mounted, telescopic boom, mobile crane of 80T capacity

The meeting established that the maximum capacity of domestically manufactured cranes is 75 T. Hence the high-capacity cranes intended for procurement by HURL may be imported. Subsequently, MHI convened a virtual meeting on 23rd September 2024 with the objective of understanding and analysing the available domestic capacity to manufacture the cranes intended to be procured by HURL through GTE.

MHI recommended that domestic crane manufacturers examine the feasibility of manufacturing domestically the high-capacity cranes intended for procurement by HURL.

MEETING WITH MHI REGARDING SPECIFIC ISSUES PERTAINING TO CONSTRUCTION EQUIPMENT

MHI organised a virtual meeting on 9th September 2024 under the chairmanship of Deputy Secretary, Shri Shubhankit Srivastava, with the following agenda:

- ★ Import Surge of Construction Equipment over the period April-June, 2024
- ★ The India-Japan Industrial Cooperation Partnership (IJICP)

A follow-up virtual meeting was organised on 27th September 2024, to delve further into the above issues.

With regard to Import surge of construction equipment for the specified period, it was noted that the high-capacity equipment, which are not manufactured domestically are being imported.

With respect to the India-Japan Industrial Cooperation Partnership (IJICP), it was noted that IJICP was launched in 2019 with an objective to enhance the industrial competitiveness of India through India-Japan cooperation. Several sectors have been identified as the possible cooperation field to form Working Groups. The 1st Industrial Capital Goods Working Group (ICGWG) meeting between India and Japan was held on December 2, 2022. The 2nd meeting is proposed to be held shortly.

The Construction Equipment industry has been identified as one of the potential areas of cooperation under IJICP. ICEMA has shared a brief presentation highlighting the CE Industry Overview, the current presence of Japanese Industries in India and the way forward to strengthen the India-Japan collaboration

for the Construction Equipment industry through Technology Transfer, Establishment of joint ventures with Indian players, and R&D centric collaboration on joint projects to develop new and innovative components for the CE industry.

MEETING WITH MHI REGARDING ANTI-DUMPING OF CRAWLER CRANES & TRUCK CRANES

ICEMA participated in the meeting convened by MHI on 23rd September 2024, under the chairmanship of Director, Shri Vikas Dogra, concerning anti-dumping investigation pertaining to crawler cranes and truck cranes. ICEMA shared pertinent data on the market scenario of these cranes in India.

The same data regarding the market scenario of cranes was also provided to Directorate General of Trade Remedies (DGTR), the investigating authority for the anti-dumping investigation.

Classification of concrete equipment under GST regime: Some concrete equipment including Concrete Mixers/ Self Loading Concrete Mixers (SLCM) and Boom Pumps have been classified under the HSN Codes 8474 and 8413 respectively under both the Excise and GST regime, and presently attract 18% GST. However, the Directorate General of Goods and Services Tax Intelligence (DGGI) is considering reclassifying these products as 'Body' of Motor Vehicles, which will thereby subject them to a higher GST rate of 28% under Tariff Heading 8707.

These items are neither defined in the Central Goods and Services Tax Act, 2017 (CGST Act), the Customs Tariff Act, 1975 (Customs Tariff Act), or the Rules made thereunder, nor do they have the attributes which can classify them as 'Body' of a Motor Vehicle. In contrast to a body, this construction equipment does not have a roof assembly, bumpers, driver cabin, etc. and cannot be termed as the outer body of the motor vehicle. Therefore, they can be construed as machines covered under Chapter 84.

Due to lack of clarity on appropriate classification of the concrete mixers, SLCM and boom pumps, ICEMA has requested that the following clarification be issued:

- ★ The concrete mixer/ SLCM and boom pump supplied independently or mounted on a chassis supplied by the customer would not constitute a body for the motor vehicle and therefore not to be classified under HSN 8707.
- ★ The concrete mixer/ SLCM would be classifiable under Tariff Heading 8474 and would attract GST @18% in terms of Sl. No. 363 of III Schedule of Notification No.1/2017-Integrated Tax (Rate) dated 28.06.2017.
- ★ The boom pump would be classifiable under Tariff Heading 8413 and would attract GST @18% in terms of Sl. No. 317A of III Schedule Notification No.1/2017-Integrated Tax (Rate) dated 28.06.2017.
- ★ Representation to DPIIT on show cause notice to an ICEMA member company: In this context the DGGI Kolkata Office has issued a show cause notice to an ICEMA member company, which is operating in the CE industry for the last 25 years, with a demand to the tune of more than Rs 400 Crore. These products have always been classified under 8474 and 8413 in India as well as globally, indicating that the assigned HSN codes to these equipment are globally acknowledged and hence

the same should be followed. The Consumer Industry Section of DPIIT has advised ICEMA to reach out to DGCIS for examining this issue.

ACTIVE ENGAGEMENT WITH ARAI IN DEVELOPING STANDARDS

ICEMA is actively collaborating with the Automotive Research Association of India (ARAI) in developing new standards aimed at facilitating the production of construction equipment vehicles (CEVs) powered by alternative fuels, thereby setting new benchmarks for safety, efficiency, and environmental responsibility. Recent activities in this regard are as follows:

Regulation of emissions for Non-Construction Equipment Vehicles

As a result of continuous engagement by ICEMA, on 30th September, MoRTH has notified the draft proposal on the amendments to the Motor Vehicle Act, for regulating the emissions for Non-Construction Equipment Vehicles. After obtaining the approval for the amendment in the parliament, ARAI (Automotive Research Association of India) SCOE (Standards Coordination Committee) will formulate the detailed regulations for incorporating the same in the CMVR (Central Motor Vehicles Rules).

With the introduction of emission regulation for Non-CEVs, the CE industry products will be on par with the global standards, which in turn enhances their export potential as ICEMA member organisations can also aim to become a global hub for non-CEVs.

Machinery and Electrical Equipment Safety (Omnibus Technical Regulation) Order, 2024. Ref: S.O. 3649 dated 28 Aug 2024

MHI has released the above OTR, to be effective from 28th August 2025, in which CEVs which are being regulated under CMVR are excluded. However, inclusion of a few non-CEVs and off-highway equipment under the scope of the order is posing serious challenges to the OEMs in terms of compliance with the OTR.

ICEMA has deliberated upon these concerns with the T&S panel members in the course of several meetings and has taken up these challenges with MHI. ICEMA is continuously engaged with MHI in resolving the concerns.

Hydrogen Powered CEVs: During the AISC (Automotive Industry Standards Committee) meeting held on 7 Aug 2024, the draft standards AIS-195A [Safety and procedural requirements for Type Approval of Hydrogen powered CEVs (Liquid / Compressed Gaseous Hydrogen)] and AIS-157A (Safety and procedural requirement for Type Approval of Hydrogen powered Fuel Cell for CEVs) were approved and the final standards are in the process of release by ARAI.

These standards will establish the safety and procedural requirements necessary for type approval of Hydrogen powered CEVs. Further, the hydrogen-powered CEVs operate safely and efficiently, paving the way for a greener CE industry.

Electric Powered CEVs: AIS-174 regarding 'Specific requirements for Electric Power Train Construction Equipment Vehicle(s)', has already been released by ARAI. With the continuous engagement of ICEMA with ARAI and MoRTH, draft GSR (General Safety Regulation) 497 dated 9 August 2024 was released

by MoRTH, for regulating the Electric powered CEVs, seeking comments from all the stakeholders. The final Gazette notification (GSR) is expected to be released any time.

This notification will be instrumental in accelerating the adoption of electric powered construction equipment, thereby reducing emissions, and promoting sustainable construction equipment. Further, ICEMA has taken up the following concerns with ARAI and suggested amendments to AIS 174:

- Conducting EMC (electromagnetic compatibility) test for the CEVs equipped with HST (hydrostatic transmission) driveline / transmission in the EMC lab at the test centres
- Clarity regarding certification procedure for lead acid batteries

ARAI assured that these proposals will be discussed in the next AISC meeting and necessary action will be taken

Amendments to AIS 160 - Safety Requirements for CEVs: Amendment 5 was proposed to add clarity that tests such as Physical dimension of operator, Minimum operator space and Zone of comfort and reach for controls, which, as per IS/ISO 6682:1986 or IS 11252:1993 are not applicable for Roller, fitted cab. The amendment is approved and published.

Amendment 6 was proposed to add installation requirements of three-point seat belt for CEVs. The amendment is approved and published.

Registration Challenges for Off-highway Equipment: Heavy Earth Moving Machinery (HEMM) such as Dump Trucks, Payloaders, large capacity Wheel Loaders, Motor Graders etc. are categorised as 'Off-road equipment' and these are not covered under Central Motors Vehicles Rule (CMVRO-1989). However, the transport authorities of Odisha State were insisting for registration of these Off-highway equipment. OEMs were unable to upload the chassis number, engine number and other particulars of off-highway equipment in the homologation portal. ICEMA members were facing challenges in marketing their products to the vital projects, like Mahanadi Coalfields Limited (MCL).

Further to the discussions held during the meeting ICEMA Team had with Shri Amitabh Thakur, Transport Commissioner - cum - Chairman, STA of Odisha State and ICEMA is closely working with the Odisha State Transport Authority to resolve the registration concerns and requested the Transport Commissioner, for release of an advisory to all the RTOs of Odisha state, in this regard. The Transport Commissioner has responded positively to ICEMA's request.

MEETING WITH DR. T. V. SOMANATHAN, SECRETARY, FINANCE & EXPENDITURE ON CE INDUSTRY FINANCING CHALLENGES

On 18th July 2024, a small team from ICEMA members met with Dr. T. V. Somanathan to discuss key challenges in financing and opportunities in the sector. The delegation highlighted the need for granting priority sector status to enable low-cost, long-term financing, particularly for first-time users. They proposed a dedicated Production Linked Incentive (PLI) scheme with a ₹10,000 crore outlay to boost domestic manufacturing and reduce import dependency. Concerns were raised about the SARFAESI Act's high threshold for loan recovery by NBFCs, with a suggestion to reduce it from ₹20 lakhs to ₹1 lakh. The delegation also requested a GST waiver on repossessed machines sold at a loss

by financial institutions and addressed issues related to the potential reclassification of CE equipment into a higher GST bracket of 28%. Dr. Somanathan engaged positively, recognising the sector's critical role in India's infrastructure growth and its future potential.

REPRESENTATION TO RBI ON FINANCING CHALLENGES IN THE CONSTRUCTION EQUIPMENT (CE) INDUSTRY

The Indian Construction Equipment (CE) industry, valued at USD 9.5 billion and employing over 3 million people, is crucial for infrastructure development. The industry depends heavily on financing, with over 90% of CE purchases funded through banks and NBFCs. Given its critical role, ICEMA sought RBI's support to address the following key issues:

1. Priority Sector Lending Status or similar treatment for CE financing as Infrastructure financing would ensure access to low-cost, long-term funds and enabling timely project execution.
2. A 55% rise in unauthorised exports of hypothecated CE in FY 2023-24 has escalated NPAs for financiers. ICEMA urges regulatory interventions, including amending the Customs Act and mandating export certifications, to mitigate these risks.
3. Reducing the NBFC debt recovery threshold from INR 20 lakhs to INR 1 lakh under the SARFAESI Act would enhance recovery capabilities and align NBFCs with banks.

These measures will strengthen the financial ecosystem, enabling the CE industry to drive India's infrastructure growth.



TECHNOLOGY SPOTLIGHT

The Indian Construction Equipment (CE) industry has always been a pioneer in adopting new technologies in the country's mobility ecosystem, including adoption of Internet of Things (IoT). By 2035, the Indian Construction Equipment industry will be a benchmark to the world in driving safe, efficient and environment friendly working conditions across construction applications through effective stakeholder collaboration and relevant technology adoption. As the industry navigates the evolving trends and demand segments, it recognises the importance of embracing new technologies, sustainability measures and safety regulations to ensure continued progress and success.

The TECHNOLOGY SPOTLIGHT section of CE Beats has curated information from partners in the CE Technology Vision Roadmap 2035, regarding their adoption of the Roadmap in their operations and products. We thank the participants for their efforts and inputs.

ARGO-HYTOS PVT. LTD.

India: Smart Products in Hydraulics



MR. SHRIKANT S. BAIRAGI
Managing Director
ARGO-HYTOS Pvt. Ltd. India

"CE Technology Vision Roadmap 2035 defines the broader contours of efficient and effective use of various technologies to substantially improve jobsite safety, jobsite solutions and sustainability. At ARGO-HYTOS, we are already innovating products driven by Industry 4.0 initiatives to make construction machines smarter and better. Our products allow remote monitoring of machines, thereby providing vital data for improving machine productivity, operator safety and sustainability".

ARGO-HYTOS focuses on smart products and assistance systems that are designed to enhance productivity, efficiency, safety and sustainability in various hydraulic applications through several key innovations and technologies that offer features like real-time monitoring, analytics, and predictive maintenance, among others. Some of the company's product offerings are given below:

ADVANCED FILTRATION TECHNOLOGY

The Exapor®Max 3 filter elements by ARGO-HYTOS offer optimised power density, increased dirt holding capacity, and a reduction in pressure losses by up to 50%. This leads to more efficient hydraulic systems, which in turn enhances overall productivity.

ELECTROHYDRAULIC SYSTEMS

ARGO-HYTOS provides electro hydraulically controlled systems that improve productivity, efficiency, and operator comfort. These systems include proportional hydraulic systems, which are employed in various applications such as suspension, steering, and working hydraulics. The integration of these systems ensures precise control and efficient operation, contributing to higher productivity.

MODULAR HYDROPNEUMATIC SUSPENSION SYSTEM (MHPS)

This system is an example of ARGO-HYTOS's innovative approach to improving productivity through advanced suspension support. It enhances the



comfort and operational efficiency of mobile machinery, which can lead to better performance and reduced downtime.

ENERGY CONSUMPTION OPTIMISATION

ARGO-HYTOS continuously analyses and addresses the main causes of energy loss in hydraulics, such as losses during energy conversion in pumps, motors, and cylinders, as well as losses in pipes, hoses, control blocks, and valves. Optimisation of these areas results in reduction of overall energy consumption.

CONDITION MONITORING SYSTEMS

ARGO-HYTOS provides condition monitoring systems including sensors and algorithms to predict the future state of machinery. This predictive maintenance approach helps in reducing unexpected downtimes and ensuring that the hydraulic systems operate efficiently.

Implementing these technologies and solutions from ARGO-HYTOS can lead to substantial improvements in the efficiency of hydraulic systems, contributing to reduced energy consumption, lower operational costs, and enhanced system performance.

The ARGO-HYTOS Group is a global supplier of hydraulic system solutions. With more than 1000 employees and more than 75 years of experience in fluid & motion control and filtration, ARGO-HYTOS continues to set new standards in the hydraulics industry. In particular, the company is leading innovation in mobile hydraulics.(www.argo-hytos.com)

CASE CONSTRUCTION EQUIPMENT



MR. SHALABH CHATURVEDI
Managing Director
CASE Construction Equipment,
India & SAARC Region

NAVIGATING THE FUTURE: CASE CONSTRUCTION'S CE TECHNOLOGY VISION ROADMAP 2035

"As we move towards a Viksit Bharat, it is important to embrace technological advancements to achieve our goal. At CASE, over last two centuries, we have always been at the forefront to provide technologically advanced solutions to the ever-evolving customer needs. The CE

Technology Vision Roadmap 2035, introduced by ICEMA, emphasises on three key pillars — Safety, Solutions and Sustainability — to guide the Construction Equipment industry towards a technologically advanced future.

CASE Construction is already aligned with these three pillars and further aims to add value to it with our expertise. Firstly, safety is our utmost priority, demonstrated through our upgraded machinery featuring cutting-edge telematics, advanced warning systems, ROPS/FOPS cabins, and shutdown mechanisms to enhance operator safety and minimise risks. For us, safety is not just a compliance obligation, it is a core principle ingrained in our design and manufacturing processes.

Furthermore, we are committed to constantly exploring innovative solutions through extensive research and development. These efforts focus on enhancing equipment efficiency, durability, and performance, ensuring that our machinery is equipped with the latest advancements to tackle diverse and complex construction challenges. We aim to pioneer innovations that not only improve productivity but also reduce operational costs and environmental impact, setting a new standard for excellence in the sector.

And finally, sustainability remains an important focus for us at CASE. Globally we are the first company to introduce electric backhoe loader in 2020, as well as Hydrogen and Biomethane powered tractors. Taking inspiration from these technologies, many features are being rolled out for our products in India which reduce our environmental footprint and enhance efficiency for our customers. With the launch of our BS CEV V

compliant machinery we will be taking a step closer towards environmental consciousness. Starting January 2025, all our equipment will meet the latest emission, noise and safety norms, underscoring our commitment to a greener future.

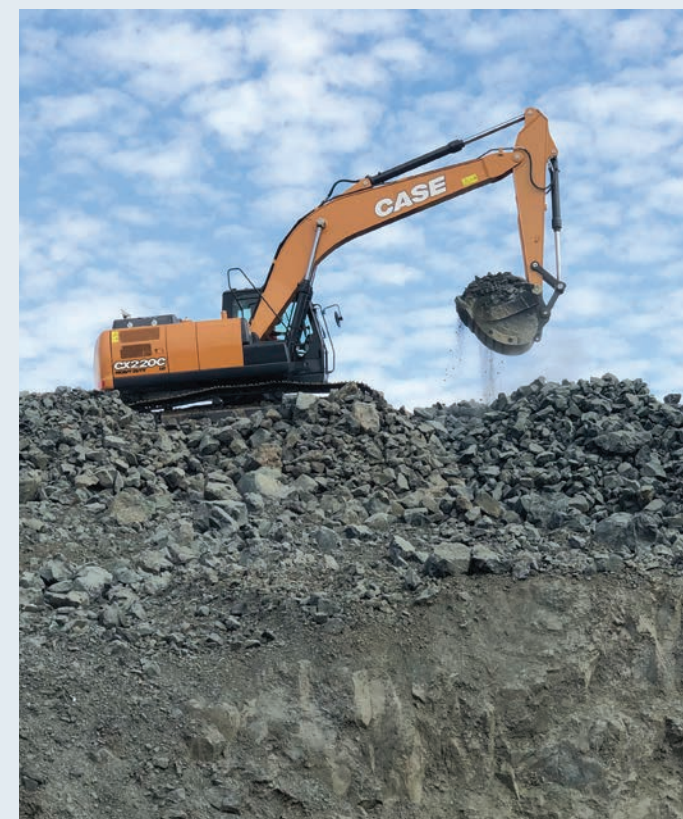
Our goal is to lead the industry by setting new benchmarks for solutions that address real-world challenges while ensuring sustainable practices that reduce our environmental footprint. We believe that by integrating these principles into our operations and innovations, we can drive meaningful progress for our industry and economy alike."

India is driving an infrastructure transformation, and the construction industry has a key role in ensuring that it is safe, technology-led, and sustainable. To that end, the ICEMA Indian Construction Equipment Roadmap 2035 presents a path that merges cutting-edge advancements with sustainability and productivity. It is a roadmap that mirrors our journey at CASE Construction. Our vision is driven by a persistent commitment to excellence, pushing boundaries to redefine the Construction Equipment sector.

Innovation lies at the core of our operations, integrating state-of-the-art technologies in our products and services. From intelligent hydraulics to autonomous machines, we seek to adopt the latest advancements to enhance performance, efficiency, and reliability across our range of equipment. Sustainability is another key pillar of our focus. As we progress towards 2035, our emphasis on electrification and alternative fuels paves the way for a future where sustainability and efficiency harmonize.

Our global portfolio already includes electric and alternative fuel products, such as methane-fueled engines, hydrogen-based equipment, electric compactors, and loader backhoes, to meet the growing demand for eco-friendly solutions. These innovations align with our commitment to providing sustainable options and ensuring that our equipment supports India's long-term infrastructure and industrial growth goals. We are ready to introduce these advanced products to the Indian market as it as and when the market is ready.

As the Indian CE Industry moves towards eco-friendly regulations and emission norms, we aim to lead by adopting measures for a greener future. Our



commitment to sustainability reflects our dedication to innovation, echoing the industry's shift towards eco-friendly practices. We aim to embrace alternative fuels like synthetic fuel, biofuels, and natural gas, reducing emissions and minimising our carbon footprint. By aligning with emission compliance requirements and noise regulations, we ensure our products meet and exceed industry standards, driving a greener future for construction equipment.

For us at CASE, customer-centricity is fundamental to our product design and manufacturing approach. Our dedication to understanding and fulfilling the evolving needs of our clients helps us plan for a future where our solutions not only meet current industry standards but also anticipate future demand trends. We strive to bring in new technologies that enhance efficiency and set new benchmarks in performance and customer satisfaction.

The CE Technology Vision Roadmap 2035 is more than a roadmap — it is a testament to the industry's commitment to innovation, sustainability, and customer satisfaction. These are values we at CASE live today, aligning with the country's mission of Viksit Bharat.

COBO S.p.A.

On a Strategic Expansion Path



MR. MITESH CHITKARA

Business Head
COBO INDIA

"We believe that the CE Technology Vision Roadmap is a strategic plan that outlines the vision, direction, and milestones for adopting technologies and implementing it. It serves as a guide to navigate the complex landscape of technological advancements in different industries all across the globe, ensuring alignment with long-term goals and operational needs."

By mapping out technology trends, potential innovations, regulatory frameworks and necessary upgrades in skilling, improvising the machine efficiencies, safety compliances, enabling infrastructure, the roadmap helps organizations anticipate future challenges, allocate resources efficiently, and stay competitive in a rapidly and fast changing markets. It is a dynamic tool that bridges the gap between current capabilities and future aspirations, fostering informed decision-making and sustainable growth. ICEMA has ably captured technological trends like Electrification and Alternate Fuels, Digitalisation and IOT Integration, Automation and Robotics, as well as Reducing Environmental Footprint. We at COBO are proudly partnered with ICEMA in this initiative of framing CE Technology Vision Roadmap 2035.

We look forward to contributing further towards this vision with our expertise in these technology domains."



DR. ENRICO LINETTI

Group CEO
COBO S.p.A.

"In the fast-paced world of business, where change is the only constant, a clear and compelling vision can serve as a guiding light for sustained growth and success. This philosophy is reflected in our Company's Slogan "Future in the Tradition"."

COBO is a worldwide leader, providing technological solutions in various domains like Driving, Controlling, Sensing, Lighting, Information, Powering, Coding, Processing, Wiring and Digital Services to various specialised sectors like Agricultural Machinery, Earthmoving, Lifting, Construction, Environmental Vehicles, Industrial Vehicles and Two Wheelers. Since 1950, COBO has been consistently developing new technologies and evolving further.

Our presence in more than 65 countries is helping us to navigate the complex landscape of global business. At the same time, it is crucial to identify and strategically target key markets that promise growth and competitive advantage. Our approach to market expansion is driven by a comprehensive analysis of emerging trends, OEMs' expectations and regional opportunities.

Some of the strategic initiatives that we have been taking from time to time are:

1. Leveraging innovation and technology through product innovation, customer experience and sustainability.
2. Integrated System solution approach through our various product offerings
3. Product diversification to complement Integrated System approach
4. Continuously Investing in Emerging Key Markets from time to time

By aligning our strategies with market dynamics and leveraging our strengths, we are well-positioned to drive sustainable growth and create value for our stakeholders. Our journey in India has been a rewarding but complex endeavour. Our approach is very simple, right from understanding the local context, to building strong relationships and being flexible in our approach.

India is an important market that promises growth and competitive advantage to the group. Expanding further into India requires careful planning and a willingness to adapt to its diverse and dynamic market. Our commitment to expansion in India reflects an understanding of the market's complexities and a long-term vision for growth and integration within the country's economic landscape.

DYNAPAC

DYNAPAC PRESENTS FAYAT ROAD EQUIPMENT; DRIVES INNOVATION EXCELLENCE AND SKILLING

"Fayat Road Equipment division offers Road construction industry a 360 degree solution for road construction, rehabilitation and maintenance in a sustainable way. Our product development process is focused on improving productivity, reducing the carbon footprint and using digitalisation to get optimised result from all our equipment. We achieve this by core technology development like SEISMIC for soil & asphalt compaction that reduces compaction effort by 20%. On the other hand, by choosing advanced hydraulic solutions we reduce overall power demand. Our impact is also driven by process optimisation in Compaction & Paving through use of digital technology".

Fayat Road Equipment is offering a comprehensive 360-degree solution for road construction and maintenance. Leveraging advanced technologies from Marini, Dynapac, Secmair, Dulevo, and PTC, Fayat is driving innovation towards sustainable practices that reduce costs and environmental impact while enhancing efficiency and quality.

OFFERINGS FROM FAYAT ROAD EQUIPMENT

Fayat Road Equipment offerings are technologies from Marini and Dynapac, which incorporate recycling concepts to revolutionise highway construction. By using recycled materials, Fayat not only lowers construction costs but also significantly reduces the carbon footprint associated with road projects.

Innovative Road Construction Solutions

Our Asphalt plant recycling solutions come with different offers with cold recycling, hot & cold recycling as well as double drum hot recycling solutions that enables customers to choose the right approach for their project. In addition, offering warm mix asphalt production helps in paving at lower temperatures saving carbon footprint. We also complete the package with paving and compaction solution for highway construction and maintenance.

Advanced Road Maintenance Solutions

Secmair, a prominent brand under Fayat Road Equipment, specialises in road maintenance products that cater to both small repairs and advanced micro-surfacing solutions. This comprehensive approach



ensures that India's road infrastructure remains durable and safe, minimising disruptions and optimising longevity. Fayat Road Equipment portfolio extends beyond traditional road construction and maintenance with specialised equipment like PTC vibro-hammers and Dulevo sweeping solutions. These products complement various construction projects, including Metro Rail, ensuring clean and efficient work environments while enhancing overall project efficiency.

Future Directions: Market-Driven Innovations

Looking ahead, Fayat Road Equipment remains proactive in responding to market needs with innovations with it multi-fuel burners for Marini asphalt batch plants as well as optimising the heat loss in the asphalt production process for lowest cost per ton of asphalt production. Also our solution with material feeders in paving with many paving assistance systems allows optimisation of the laying process with saving mix as well as ensure higher quality for longevity of pavements. These developments underscore Fayat's adaptive approach, aligning technological advancements with industry demands to deliver sustainable solutions tailored to India's evolving infrastructure requirements.

As they continue to evolve and innovate, Fayat Road Equipment remains committed to driving positive change and setting new benchmarks in India's infrastructure development landscape through strategic partnerships, rigorous training programs, and a relentless pursuit of excellence, ensuring resilient road infrastructure for generations to come.



TECHNOLOGICAL INNOVATIONS AT DYNAPAC DRIVING EFFICIENCY

Our commitment to technological innovation is evident through initiatives like Dynapac Z Era program, which focuses on developing sustainable technologies. This includes the introduction of electric rollers and pavers, as well as seismic technology in compactors. Dynapac's seismic technology adjusts compaction energy based on soil characteristics, optimizing efficiency, reducing fuel consumption, and enhancing compaction quality—a testament to dedication to operational excellence and environmental sustainability. MatManager, Dynapac's connected paving quality system, exemplifies their commitment to precision and quality. By monitoring key parameters in real-time and documenting performance analytics, MatManager ensures optimal paving results while controlling material consumption. This advanced system not only enhances project efficiency but also sets industry standards for quality assurance and performance documentation.

ENHANCING OPERATOR SKILLS AND EFFICIENCY AT DYNAPAC

Recognizing the pivotal role of skilled operator in project success, Dynapac invests in training and development programs like the ICES (Intelligent Compaction Education Series) program. This initiative prepares operators for the complexities of modern equipment through virtual simulators and hands-on training, ensuring proficiency and safety on job sites. Refresher courses further empower existing operators, equipping them with updated knowledge and skills essential for operating our latest range of compaction equipment.



MR. ABHIJIT SOM
Managing Director
Fayat Road Equipment Division-India



GULF OIL LUBRICANTS

Driving Innovation and Sustainability
in the Infrastructure & Mining Sector



MR. RAVI CHAWLA
Managing Director & CEO,
President, APAC
Gulf Oil Lubricants India Ltd.

"As a leading lubricant company, we have been at the forefront of long drain solutions for over a decade, enabling consumers to maximize equipment productivity and minimize energy use. Our advanced synthetic lubricants and AdBlue® solutions, produced locally in support of 'Make in India' initiatives, optimize total cost of operations with assured quality. We are committed to driving sustainability through our e-mobility solutions, including fast DC chargers. Additionally, our CVP offers onsite workshops that train users in best practices for lubricant handling, storage, and product rationalization, ensuring a safer working environment and enhanced operational efficiency. Aligning with the CE Technology Vision Roadmap 2035, we are dedicated to fostering innovation and sustainable growth in India's evolving infrastructure landscape."

At Gulf Oil Lubricants India Ltd, we are committed to driving sustainable growth through cutting-edge technology and innovative solutions tailored for the infrastructure and mining sectors. Under our strategic business division IMF with a unique business model, we serve Infrastructure, Port and Mining sectors along with our esteemed Construction Equipment OEM partners. This division comprises of a dedicated team of highly motivated, trained, and experienced B2B



professionals who are passionately committed to delivering a best-in-class customer experience marked by technical excellence and unparalleled service. Our approach is centered around providing advanced, energy-efficient products underpinning our commitment to reducing the total cost of operations for our clients and also contributing significantly to environmental sustainability.

Central to our product strategy is the development of long drain solutions which are engineered to increase equipment productivity while reducing maintenance frequency. Our focus on indigenously manufactured synthetic and biodegradable hydraulic oils aligns with the growing demand for eco-friendly solutions, embodying the essence of the 'Make in India' initiative. These products are meticulously designed to meet the stringent requirements of our clients, ensuring superior performance even in the most challenging conditions.

A key area where Gulf Oil has established leadership is in the AdBlue® segment. As the industry undergoes significant changes in emission norms, transitioning from BS IV to BS VI and CEV III & IV to CEV V, Gulf Oil has been at the forefront of innovation. Since pioneering AdBlue® production in India in 2016, we have become one of the largest manufacturers in this field, setting the quality benchmark with outstanding performance and reliability. Our extensive and reliable distribution network ensures that infrastructure and mining operations remain compliant with the latest environmental regulations.

Recognising the evolving needs of the industry, we have also expanded our portfolio to include fast DC chargers for electric vehicles (EVs). This strategic diversification positions us to meet the rising demand for EV infrastructure,

particularly in the construction and mining sectors. By investing in EV charging technology, Gulf Oil is supporting the transition to cleaner energy sources, thereby playing a pivotal role in shaping a more sustainable future for the industry. We also place a strong emphasis on jobsite safety and operational efficiency. We work closely with our customers to implement right lubricant solutions tailored for their machinery, ensuring product rationalisation



for enhanced performance and reliability. Our CVP is focused on adopting best practices for lubricant handling and storage at sites, including correct lube room design, right dispensing options, and strategies to avoid contamination, slippage and pilferage. These measures not only improve operational efficiency but also significantly enhance jobsite safety.

As we continue to expand our offerings and enhance our capabilities, Gulf Oil remains dedicated to supporting the infrastructure and mining sectors with solutions and services that drive growth, operational efficiency, jobsite safety and environmental stewardship.

SIDDHARTH GREASE AND LUBES

Lubricating the Path to Progress



MR. SUDHIR SACHDEVA

President NLGI India Chapter
Chairman of Siddharth Grease and Lubes
Pvt Ltd. India
Trinity Lubricants and Grease FZC Dubai

"Siddharth Grease is proud to serve CE industry with specialised range of Construction & Mining greases. Driven by innovation and precision engineering we are ready with new generation, bio-degradable & nano greases, designed to address tomorrow's construction & mining equipment requirements. This will elevate performance, efficiency, reliability, safety, durability and drive sustainable solutions aligned to "CE TECHNOLOGY VISION ROADMAP 2035". CE industry, is one of the largest consumer of grease, poised to reach US\$37 Billion in India by FY35 from current US\$10 billion, which will significantly drive grease demand. We are geared up to meet the growing demands, through our world class manufacturing facilities".



Siddharth Grease & Lubes Private Limited (along with its Subsidiary Trinity Lubes & Greases FZC, is a private label grease & lubricants manufacturer with a legacy of over 36 years. A testament to the resilience & solidity of an enterprise which stood the test of time, kept pace with the changing needs to serve the industry with grease as a focused product line. We are equipped with the state-of-the-art manufacturing facilities in Manesar (near Delhi) India and Trinity Lube & Grease - Dubai, UAE. We have established a best-in-class R&D infrastructure, with exhaustive analytical and testing capabilities. This exceptional combination makes Siddharth group unique and one of the largest amongst the private label grease and lubricant manufacturers.

Led by Mr. Sudhir Sachdeva the Founder and Chairman of Siddharth group and President NLGI-India, with his passion has turned the vision to reality of establishing a world class facility for Grease in India and carrying the legacy to the middle east as well.

We are an Innovation led organization, hold many patents, having an NABL certified Lab and ISO 9001:2015, ISO 14001:2015, ISO 45001:2018, DSIR Accreditations. Pioneer in introduction of Patented Long-Life greases, Sustainable Greases, Transparent Greases, Non-Lithium Greases, with high focus on HSSE & Sustainability. We are proud to receive the patronage and trust of global and Indian Oil Companies, leading Bearing brands, Construction & Mining Equipment OEMs, Indian Defence and core sector companies. We have exported our products to 60+ countries in Asia, Africa, Middle East, Europe, and Australia.

Honoured recipients of National Awards from Hon'ble Prime Minister over two years and Export Excellence Award from Minister of Commerce, Chief Minister of Haryana and many more acknowledgements from our valued customers.

Siddharth Grease and Lubricants group are solution providers to the industry by reducing friction of all moving parts in automotive, steel, construction and various industries. We bring an ocean of possibilities, to solve the problems of today and the future. We have introduced a bio-degradable & nano range of greases for construction & mining equipment's aligned to the "CE TECHNOLOGY VISION ROADMAP 2035". Our dedicated teams collaborate throughout in solving sustainability, regulatory needs, supply chain efficiency and cost challenges. We work closely with customers as partners in progress to deliver efficiency and cost optimised solutions.

KEY PRODUCTS:

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TATA HITACHI

Driving Growth in Challenging Times



MR. SANDEEP SINGH
Managing Director,
Tata Hitachi

"Our vision is to pioneer transformative solutions for our customers, that drive sustainability, innovation, and inclusivity. By harnessing cutting-edge advancements and fostering a culture of continuous improvement, we at Tata Hitachi aim to not only meet the demands of the future but shape it in a way that benefits all stakeholders. Our commitment to excellence and responsible innovation will ensure that we remain at the forefront of technological evolution, creating a smarter, greener, and more connected world".

FY2024 saw sustained growth for the Construction Equipment (CE) industry that achieved significant milestones. This has propelled the Construction Equipment industry to achieve a historic milestone, with peak volumes surpassing over 1,30,000 units for the first time in industry history.

The robust demand in our industry is primarily driven by the Government's steadfast commitment to infrastructure development across diverse sectors including Roads, Railways, Urban Development, Ports, Airports, and Rural Water Supply. The recent Budget's allocation of INR 11.1 lakh crores for Capex further underscores the Government's intent to bolster infrastructure growth.



The first quarter of this year has already belied expectations of a slowdown, due to general elections and heavy rains in some part of India, with the industry seeing a marginal growth in volumes. This sets the stage for a robust recovery in the 2nd half – especially with a stable government in place and continuity in policies – due to the thrust on infrastructure as expended in the recent budget.

However, amidst these promising prospects, inflationary pressures, volatile crude oil prices, supply chain disruptions due to geopolitical tensions, and currency fluctuations continue to pose significant threats to our future growth trajectory. In this context, sustained demand creation with timely execution of projects is paramount – especially in light of some slowdown in highway construction, urban development and Jal Jeevan Yojana projects. A renewed focus on building the pipeline of projects and accelerated execution in the balance part of the year is paramount.

At Tata Hitachi, we remain at the forefront of innovation and sustainability. Our recent E-Electric Battery Operated Excavator prototype was unveiled at EXCON 2023 and supplied 5 No's 190 Tonne AC Drive Dump Truck to Coal India, marking a significant step towards powering a sustainable future. Moreover, the indigenously produced Electric Excavator exemplifies our commitment to pioneering technologies that not only meet but exceed environmental standards.

As India moves ahead to align itself with global emission standards, this year will see the transition to CEV5 standards for wheeled on road CE. We are fully geared up to launch this emission compliant backhoe loaders & wheel loaders at the time of transition.

Looking forward, the adoption of BS4 regulations is paramount for non-road CE, not only to bolster our domestic market but also to enhance our global competitiveness and tap global opportunities. India's potential as a manufacturing hub is undeniable, and our strategic focus remains on leveraging local design & manufacturing capabilities to capitalize on emerging opportunities to offer our wide range of products to nearly every segment of customers & applications.

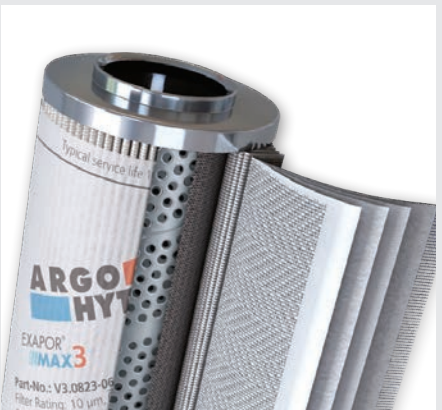
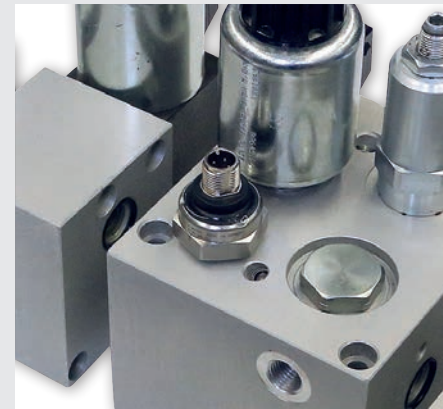
Moreover, as we navigate through these dynamic times, Tata Hitachi remains dedicated to driving growth, fostering innovation, and contributing to India's infrastructure development journey. Together, let us seize the opportunities ahead and continue to shape the future of the Construction Equipment industry.

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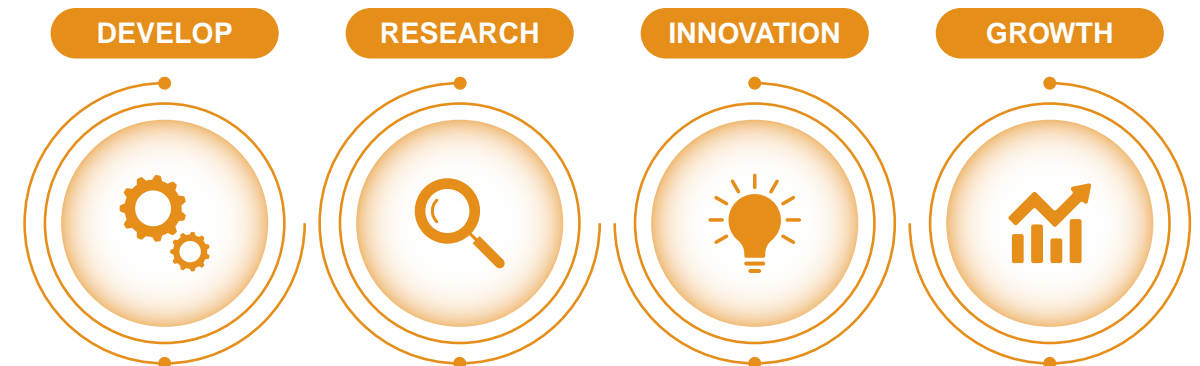
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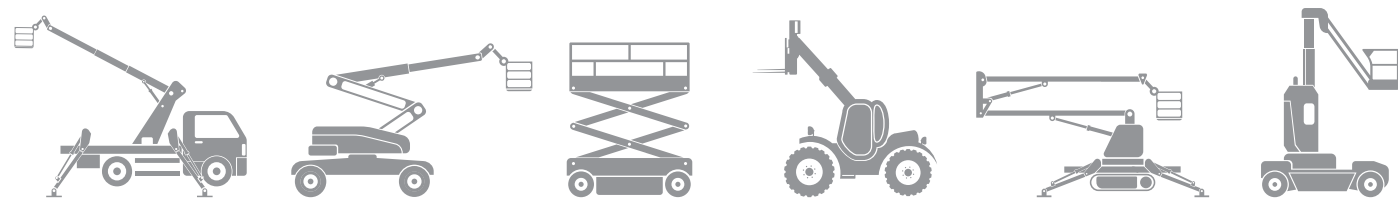


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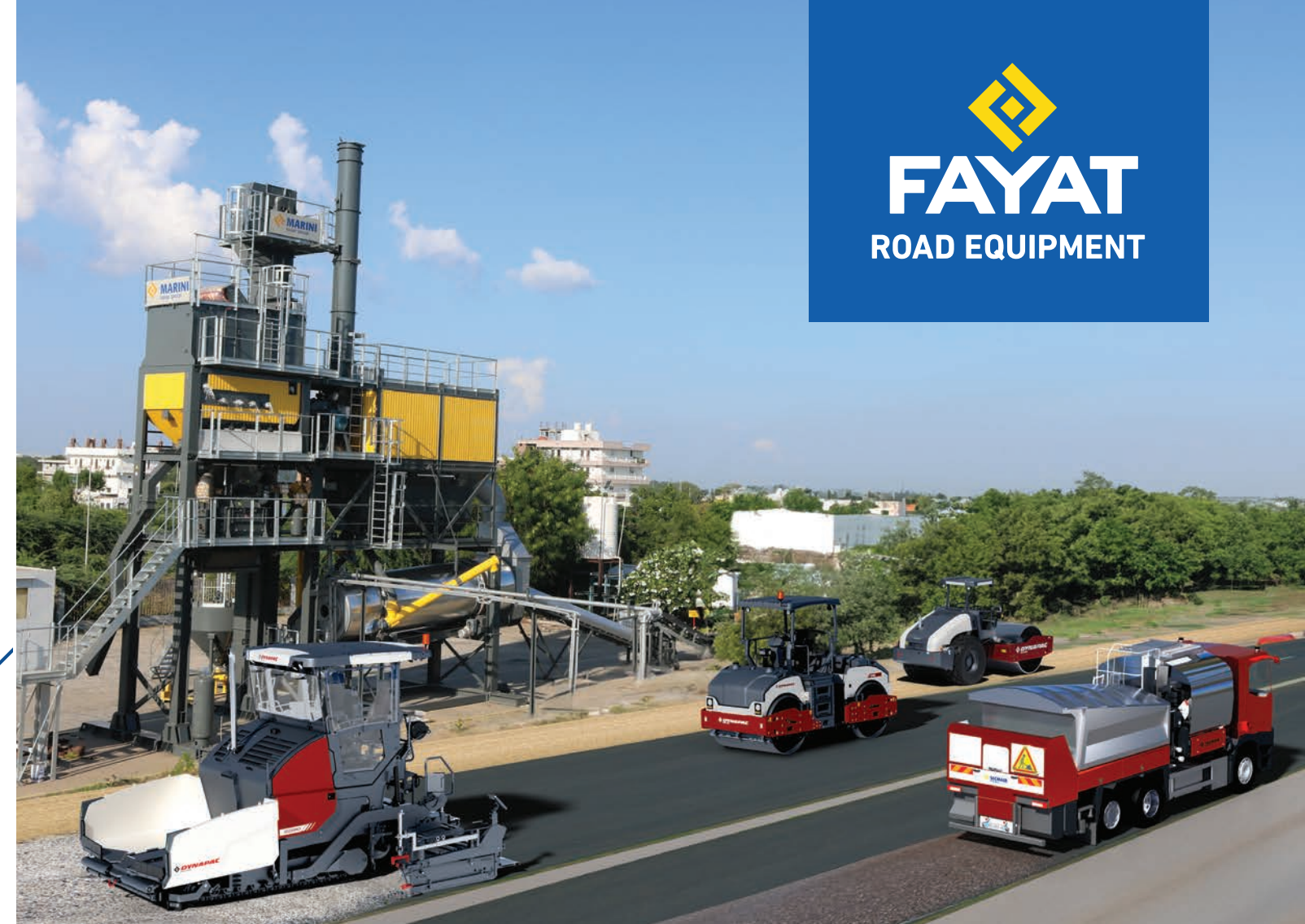
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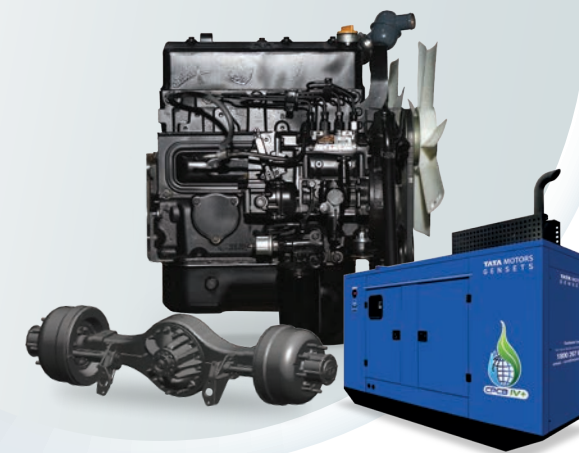
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GIVES APPLICATION-LEVEL VIEW OF TECHNOLOGY MIGRATION



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REPRESENTING
130+
members including
CE Industry OEMs,
Component
Manufacturers, Financiers
and Other Stakeholders

VISION

To grow ICEMA as the apex body facilitating
healthy and sustainable growth of Indian
Construction Equipment Industry

MEMBERSHIP SERVICES

- Policy Advocacy
- Government Interface
- Networking Platforms
- Knowledge Sharing
- Domestic and International Outreach
- Brand Building

STELLAR LEGACY OF

75
YEARS

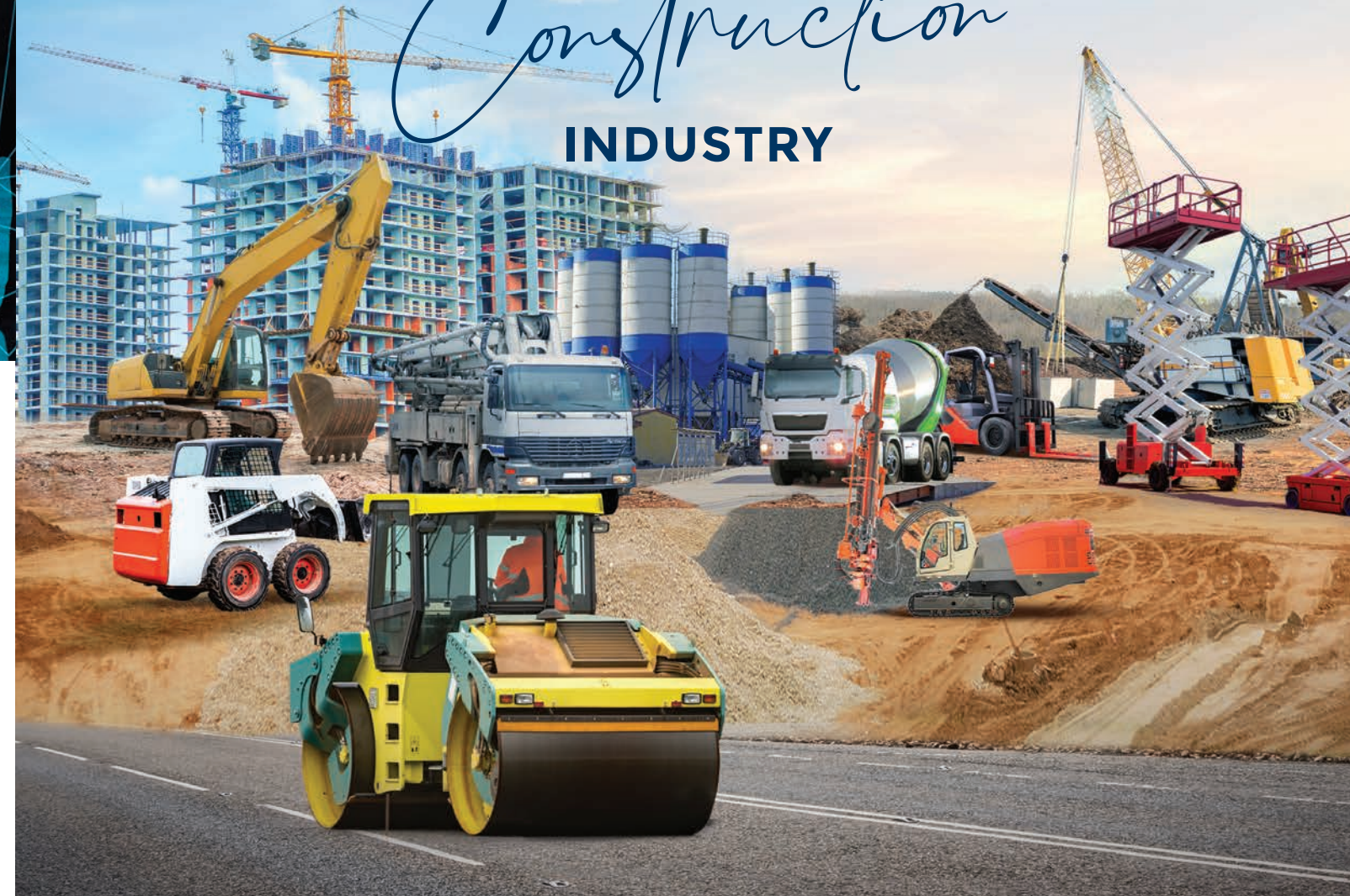
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For more details, please contact:

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SCAN ME



ICEMA is an apex body for Construction Equipment (CE) manufacturers in India and represents over 130 OEMs, component manufacturers, financiers and other CE industry stakeholders. The members of the Association comprise 95% of the OEMs and component manufacturers in the Indian CE Industry, along with other leading companies that manufacture, trade and finance a variety of Construction, Earthmoving, Concrete, Mining, Material Handling and Material Processing equipment used for developing a robust, world-class infrastructure in the country.

ICEMA boasts a stellar legacy of nearly 75 years. Constituted in 1949 as Tractor & Allied Equipment Manufacturers and Importers Association Ltd., with 10 Indian member companies, and rechristened as Indian Earthmoving & Construction Industry Association Ltd. (IECIAL) in 1986, the Association acquired its present nomenclature, viz., Indian Construction Equipment Manufacturers' Association (ICEMA), in 2012, in an endeavour to make it truly representative of the Indian CE industry and to expand its scope of services.

A non-government and not-for-profit organization, ICEMA serves as a reference point for India's CE industry. The Association supports and guides the CE industry and engages with the Government in shaping new policies, works towards development of new standards for construction equipment and creates platforms for knowledge sharing. The Association also serves as a bridge between the Indian and global construction equipment industries by interfacing with international counterparts.

The key aspects of the work being done by ICEMA include promotion of safety, setting of emission norms, technology integration and adoption, as well as continuous stakeholder engagement. To help improve the industry's efficiency, ICEMA is also involved in facilitating development of a skilled workforce for the CE industry.

The Association's activities are guided by a Governing Council and eight ICEMA panels comprising of industry leaders to achieve the objectives of the Indian CE industry's Vision Plan 2030 with the help and support of its members.

Indian Construction Equipment Manufacturers' Association (ICEMA)

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