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■ **Role of Spectrometry
in Metallurgical Industry**

Akshay Jha

Director - VAS Spectrometers Pvt Ltd

■ **Green Technologies and Innovation
in the Foundry Sector**

■ **Diffusible Hydrogen measurement in Steel -
addressing the analytical challenges**

■ **Honoring Metallurgical Excellence:
NMA 2023**



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D. A. Chandekar Editor

Dear Readers,

As we all know, India is the fastest growing large economy in the world, surpassing even the giants like US, China and Germany. We have seen for more than two decades, from 2000 till 2022, China continuously expanded its economy by double digit growth rate. Now it seems the Chinese economy is slowing down a bit. Many experts believe that China has crossed that fastest growing period in the famous economy growth curve. The US is struggling with its internal issues like illegal immigration, state centre relations and though their economy is growing, the growth rate is not satisfactory. EU is also fighting recession in most of its member countries and though Germany's economy is supposed to be the strongest among EU countries, it also is facing a threat of recession. Whatever it may be, the fact remains that India's economy is growing at a decent rate and would continue to do so in coming years.

I have repeatedly mentioned in this column that India's economic growth is triggered by the infrastructure development and 'metals' is at the centre of infra development. One can not imagine infrastructure development without metals. Thus if India's economy has to grow, it has to have a strong support from metals industry. This way, the growth of metals industry is directly related to

Editorial Desk



the economic growth of the country. There may be temporary ups and downs in the journey but the overall direction is certainly north.

The infrastructure development led economic growth is the striking feature of not only India but is also true for the other south Asian countries as well. The economy will revolve around big infra projects but if we look around, most of the India's neighbours are in trouble. Look at the situation in Bangladesh, Pakistan, Nepal, Sri Lanka, Myanmar, Afghanistan, and Maldives. All these countries are facing a political crisis. Till last year, Bangladesh's economy was doing quite well but the political instability has ruined it completely. A similar story is true for most of the other neighbouring countries. Friends, here is the opportunity for India. As the big brother, India is helping these countries to come out of the crisis, sometimes by giving aid and sometimes by giving business. I think the metals industry should look for more and more business with these countries. Our associations should invite the companies from these countries to their events, offer them memberships and spread our activities in these countries also. This can help not only the metal producers and processors but also the technology and equipment supplying companies to spread their business activities in these countries.

This way, we can help the domestic industry and also the country to strengthen our influence in these countries, isn't it ?

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Role of Spectrometry in Metallurgical Industry

Akshay Jha

Director at VAS Spectrometers Pvt Ltd



Akshay Jha is the Director at VAS Spectrometers Pvt Ltd, a company specializing in high-quality spectrometric solutions. Under his leadership, VAS has become a recognized player in the spectrometry market, focusing on delivering advanced, precise, and efficient instruments to industries such as metallurgy, mining, and research. Akshay has been instrumental in driving the company's growth, ensuring continuous technological innovation, expanding its global footprint, and maintaining a strong commitment to customer support and social responsibility.

D.A.Chandekar,
Editor & CEO of

Steelworld magazine had an exclusive interaction with Akshay Jha to understand more about How important is spectrometry for metallurgical industry, the Indian market in short term as well as long term, future expansion / diversification plans.

1. How important is spectrometry for metallurgical industry?

Spectrometry plays a vital role in the metallurgical industry, particularly when it comes to quality control and analysis. Metallurgists rely on spectroscopic techniques to analyze the composition of materials during various stages of metal production. Spectrometric tools allow for precise identification and quantification of elements and compounds in alloys and melts, ensuring that the final product meets the required standards. Without

these analytical methods, it would be nearly impossible to accurately monitor and control the quality of materials on the production line in real-time. Spectrometry helps prevent costly mistakes, enhances product consistency, and ensures compliance with regulations, all of which are crucial to maintaining the integrity of the manufacturing process and meeting customer specifications.

2. How has the technology changed in the case of spectrometers and how has VAS adopted to it?

Spectrometric technology has undergone significant advancements in recent years. Modern spectrometers are now more precise, faster, and easier to use, with capabilities such as portable spectrometers, real-time analysis, and enhanced detection limits. These innovations are primarily driven by advances in detector technology, software development, and improvements in hardware components. VAS Spectrometers has stayed ahead of these changes by

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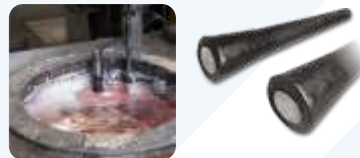
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Face to Face

continually upgrading its range of spectrometric solutions. They offer a wide selection of instruments that cater to various customer needs, whether it's for laboratory settings or on-the-field measurements. Their focus on customer support sets them apart, as VAS provides 24/7 online assistance and quick response times, ensuring that their users have continuous access to technical expertise. By embracing new technology and providing efficient service, VAS has solidified its reputation as a leader in the spectrometer market.

3. How do you see the Indian market in short term as well as long term?

The Indian metal industry has experienced rapid growth in recent years, largely driven by industrialization, infrastructure development, and a growing demand for metal products. However, experts believe that this growth is just the beginning. In the short term, the industry will likely experience fluctuations due to factors such as global market trends, policy changes, and fluctuations in demand. These cyclical "ups and downs" are common in the industry, but they are part of a larger, inevitable trend of growth. Looking towards 2035, the Indian metal industry is expected to grow exponentially, possibly expanding by tenfold or more, thanks to India's

increasing urbanization, the expansion of manufacturing capabilities, and its positioning as a global hub for steel and other metals. The long-term outlook for India's metal sector remains optimistic, with a strong growth trajectory fueled by infrastructure development, increasing demand, and technological advancements.

4. Is VAS catering to export markets? In which countries?



VAS Spectrometers has a significant international presence, providing high-quality spectrometric solutions to over 15 countries worldwide. Their products are used in a diverse range of markets, from the Americas to Africa, the Middle East, and Asia. Notable countries where VAS has successfully delivered spectrometers include Canada, Colombia, Iran, various countries in the Middle East, Uganda, Guinea, Morocco, and China. This global presence highlights VAS's ability to cater to a wide array of industries, from mining and metallurgy to research institutions. Their international outreach reflects their commitment to becoming a global leader in

the spectrometry field and showcasing their adaptability in meeting the needs of diverse markets.

5. Please share with us your future expansion / diversification plans.



VAS Spectrometers is focused on achieving organic growth rather than emphasizing rapid financial expansion. Their philosophy centers around long-term sustainability and enhancing customer satisfaction by providing top-tier spectrometric solutions and unparalleled customer support. Looking ahead, VAS plans to diversify by expanding its product portfolio to include a wider range of analytical instruments, catering to a broader industrial base beyond metallurgy. This could include sectors like pharmaceuticals, chemicals, and environmental testing, where advanced analytical tools are increasingly required. Additionally, VAS is committed to social responsibility and aims to give back to society through educational initiatives. They plan to create programs that empower individuals with skills and knowledge, helping them achieve personal and professional growth. By investing in these self-support programs, VAS hopes to foster a more prosperous, self-reliant society while also contributing to broader industry advancements. ■



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Diffusible Hydrogen measurement in Steel - addressing the analytical challenges

Hydrogen embrittlement is a widespread and dreaded phenomenon in the metal industry, especially affecting high-strength steels even without a visible indication of corrosion it can lead to material failure. There are three forms of hydrogen that can be present in a metal lattice:

- 1) diffusible hydrogen, which can freely move through the lattice
- 2) reversibly trapped/weakly bonded hydrogen, or
- 3) irreversibly trapped hydrogen present form of hydrides or within dislocation cores.

All these forms can contribute to hydrogen embrittlement, which in turn can lead to material failure. However, in high-strength steels, diffusible hydrogen is considered to be mainly responsible for the loss of ductility and/or tensile strength, i.e. by hydrogen-induced cracking of the material. It can enter the material during production, post-production, or environmental exposure and can freely move within the metal lattice. Therefore, it can diffuse out of the

sample within a few hours or sometimes hours or sometimes days, leaving space for hydrogen to re-enter the metal lattice at any given time. This makes it crucial to either determine the correct amount of diffusible hydrogen immediately after production or to properly store/seal samples (i.e., galvanization with zinc, storage in liquid nitrogen, or dry ice) until they can be analyzed. Depending on the tensile strength of the steel, different hydrogen concentrations can be critical: at ≥ 800 MPa, hydrogen concentrations of < 1 ppm can already result in hydrogen embrittlement, whereas at 300 MPa material might be able to take in up to 100 ppm without failure. Hence, determining the amount of diffusible hydrogen is essential for process and quality control to avoid the consequences of hydrogen embrittlement. The BRUKER AXS, Germany make G8 GALILEO combined with the external infrared furnace IR07 and the G4 PHOENIX provide an efficient and reliable means of determining the amount of diffusible hydrogen.

The G8 GALILEO uses inert gas fusion (melt extraction by carrier gas) to determine the oxygen, nitrogen and hydrogen content in solid materials. The sample is fused in a graphite crucible



Suyash Nadkarni
CEO,
DTS ANALYTICAL
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under a flowing inert gas stream. The temperature of the electrode furnace is freely programmable and monitored and controlled by a contact-free optical sensor. The detectors are equipped with automatic level control, base line compensation and an automatic optimal range selection for data evaluation. The G8 GALILEO is the most flexible instrument on the market and can be equipped with automatic cleaning, automatic crucible changing and automatic sampler. By connecting an additional external infrared furnace (IR07) diffusible hydrogen can also be analyzed. An optional mass spectrometer increases sensitivity and can measure down to 10 ppb of hydrogen and additionally offers the opportunity to measure the argon content of a sample. To develop a proper experimental set-up to truly evaluate the diffusible hydrogen, preparation techniques and storage must be accurately planned.

VAS

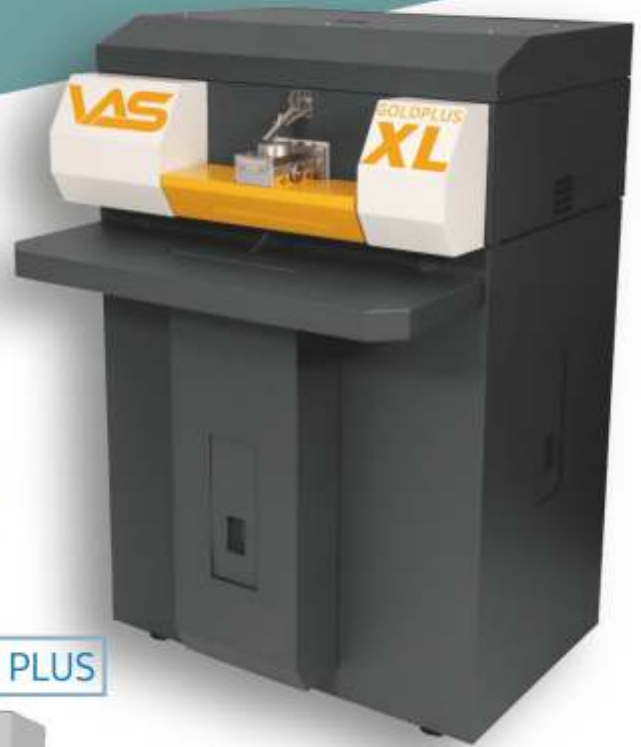
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Green Technologies and Innovation in the Foundry Sector

On 4th November 2024, the Indian Institute of Foundrymen (IIF), Jamshedpur Chapter, hosted a significant seminar titled "The Transformation of the Foundry Industry – Challenges and Solutions for a Sustainable Future" at Hotel Ramada, Bistupur, Jamshedpur. This high-profile event brought together key industry leaders, innovators, and experts from the foundry sector to discuss the pressing challenges faced by the industry and explore viable, sustainable solutions that would shape its future.

The seminar was meticulously organized by the IIF Jamshedpur Chapter, an esteemed organization dedicated to promoting the growth and development of the foundry industry in India. The event was hosted by Gargi Huttenes-Albertus Private Limited, a renowned leader in the foundry sector, known for its groundbreaking innovations in resin systems, activators, refractory coatings, and feeder systems for foundries across India. The company's commitment to technological advancements and sustainable practices made it a fitting host for an event focused on the future of the foundry industry.

The keynote address was delivered by Mr. Chandan Panda, Director of Sales and Marketing at Gargi Huttenes-Albertus. His presentation was centered around the urgent need for the foundry industry to embrace environmental sustainability and resource efficiency. He

discussed how green technologies, such as eco-friendly resin systems and energy-efficient processes, could be integrated into foundries to reduce their environmental footprint. Mr. Panda also emphasized the importance of adopting cutting-edge technological advancements to improve productivity, minimize waste, and lower operational costs. He highlighted the role these innovations play in advancing the industry's goals of achieving greater sustainability and helping India meet its broader climate goals.

The seminar featured engaging panel discussions, allowing industry experts and attendees to exchange ideas and strategies on overcoming the current challenges in the foundry sector. Topics ranged from improving energy efficiency and waste management to developing a more sustainable supply chain. The discussions reinforced the growing commitment within the foundry industry to move toward more sustainable practices and adopt forward-thinking solutions that would not only benefit the industry but also contribute to a greener, more

sustainable future for the country.

As the seminar concluded, Mr. Chandan Panda was honored for his leadership and contributions to the foundry industry. He was felicitated by Dr. Devinder Padan, Chairman of the IIF Jamshedpur Chapter and General Manager of the Foundry Division at Tata Motors Limited, who praised his commitment to advancing sustainable practices within the sector. Mr. Panda was also recognized by Mr. Lalatendu Mahapatra, DGM – Core Shop Foundry, further highlighting the collaborative spirit of the event and the collective efforts of industry leaders to ensure the foundry industry evolves in an environmentally responsible and technologically advanced manner.

The seminar highlighted the importance of innovation and sustainability in the foundry



sector, aiming for future growth while fulfilling environmental and social responsibilities. It emphasized the industry's commitment to sustainable practices, resource efficiency, and advanced technologies for a greener future.



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Feature

Honoring Metallurgical Excellence: NMA 2023

The National Metallurgist Awards (NMA) 2023 ceremony, held on November 21, 2024, in Bengaluru during the IIM-ATM 2024 event, celebrated the remarkable achievements of professionals in the metallurgy and steel sectors in India. The awards were presented by Shri H. D. Kumaraswamy, Union Minister of Heavy Industries and Steel, in the presence of other distinguished figures such as Shri Sajjan Jindal, Chairman of JSW Group, and Prof. B. S. Murty, Director of IIT-Hyderabad.

The National Metallurgist Awards, conferred by the Ministry of Steel, Government of India, celebrated the exemplary contributions of professionals in the metallurgical field during its 2023 edition. The awards honored individuals for their remarkable achievements in operations, R&D, waste management, and energy conservation, reinforcing India's strides in metallurgical advancements.

The prestigious Lifetime Achievement Award was presented to Shri Sashi Shekhar Mohanty, CEO & Managing Director of Essar Minmet Limited. With an illustrious career spanning over 47 years, Shri Mohanty's contributions to the Indian steel industry include pioneering product development, technological upgrades, and cost-reduction measures that saved the industry over \$1 billion. His leadership in critical national projects, such as developing special steels for defense



applications and enhancing sustainability in steelmaking, was commended.

The National Metallurgist Award was conferred upon Dr. T.P.D. Rajan, Senior Principal Scientist at CSIR-NIIST, for his significant work in lightweight aluminum alloys, composites, and advanced materials for strategic and industrial applications. His contributions to indigenous development under the Atmanirbhar Bharat mission include innovations in thermal management materials for aircraft and space technologies. In the R&D category, Dr. D. Satish Kumar from JSW Steel was honored for his groundbreaking advancements in steelmaking, waste utilization, and machine learning applications. His innovative processes and sustainable practices have set benchmarks in productivity and environmental conservation.

The Young Metallurgist (Environment) Award was awarded to Dr. Sai Gautam Gopalakrishnan from IISc Bengaluru for his contributions to energy materials design using computational and machine learning techniques. Similarly, Dr. Biraj Kumar

Sahoo from CSIR-NML received the Young Metallurgist (Metal Science) Award for his transformative work in advanced steel development and strategic sector applications.

The event also featured recognitions by the Indian Institute of Metals (IIM), including honorary memberships and fellowships to distinguished individuals like Mr. Satish Pai, Dr. D. De Sarkar, and Prof. Bikramjit Basu, among others, acknowledging their leadership in metallurgy and materials research. The ceremony highlighted India's advancements in metallurgy, fostering innovation, sustainability, and self-reliance across industries. ■



Dr. T.P.D. Rajan
National Metallurgist Award



Shri Sashi Shekhar Mohanty
Lifetime Achievement Award



Dr. Biraj Kumar Sahoo
Young Metallurgist (Metal Science) Award



Dr. Sai Gautam Gopalakrishnan
Young Metallurgist Award (Environment) Award



Dr. D Satish Kumar
R&D in Iron & Steel Sector Award



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Feature

What would it take to decouple copper supply from China?

Meeting this demand will require major investment. And while the scale of the investment required in new mine supply is well understood, the implications for the downstream processing (smelting and

These dual goals – of decarbonisation and reducing dependence on metals supply from China – are at odds. Governments and manufacturers that seek to diversify away from China need to consider the full

rebalancing has already begun in some countries. However, the scale of China's dominance in the copper supply chain means it cannot be fully replaced.

It's not just about copper mining, the copper supply chain is a complex, global system comprising trade in both raw materials and semi-fabricated products. Geographically, the net flow of copper units is between raw-material extraction in the Americas and Africa and downstream processing and manufacturing largely in China. The value chain for primary supply can be broken down into four key stages – mining, smelting-refining, semi-fabricating and the end-use manufacturing of finished goods. Each stage involves different types of company and there is limited vertical integration.

Mining isn't the only issue. The world, excluding China, currently has more primary mine supply than it needs to meet its requirements. China's domestic supply accounts for just 8% of global mine output, but its share rises closer to 20% when we include Chinese mining assets overseas. This is still way short of its needs. As with many other critical metals and minerals, it is China's overwhelming investment in the downstream processing and semi-manufacturing sectors that presents the biggest challenge to the supply security agenda.



refining) and semi-manufacturing of copper are being overlooked. Currently, China dominates both these sectors. At the same time, nations such as the US also seek supply chain diversification away from China. Legislation such as the Inflation Reduction Act (IRA) aims to subsidise supply chain investments in the US. Meanwhile, critical minerals strategies in Europe, Australia and Canada that now include copper lean toward supporting mineral extraction and the circular economy.

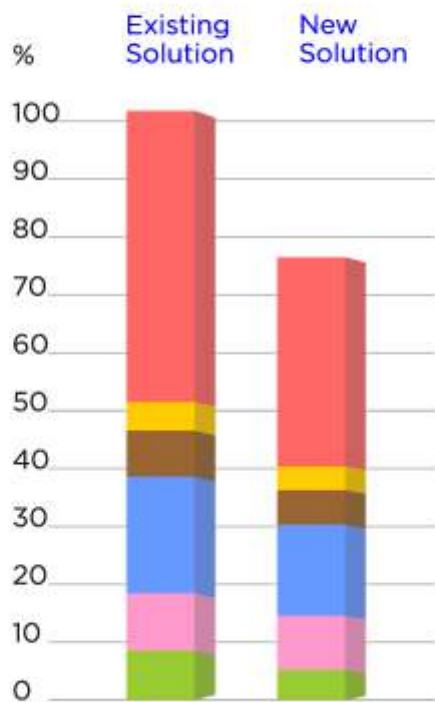
supply chain, not just mining. Hundreds of billions of dollars in new copper processing and fabrication capacity would be required to replace China. This would create inefficiencies that would result in significantly higher-priced finished goods and increase the cost and timeliness of the energy transition. For the copper market to remain effective and deliver on the world's requirements, key stakeholders need to chart a realistic course that involves China. Yes, supply risk can be mitigated, and a certain amount of

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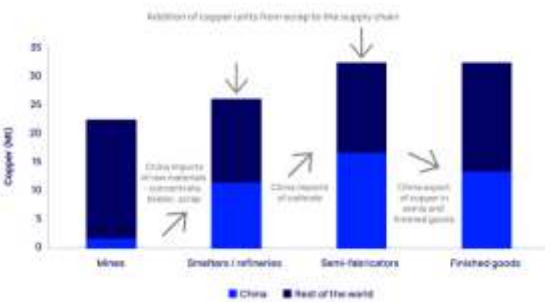
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Feature

These are the sectors that the rest of the world will struggle to dissociate from and, for copper, the risks least discussed in the mineral security debate. Close to 80% of copper mining produces copper concentrate, which must then be processed at smelters and refineries, often by third parties, to produce the copper cathode traded in terminal markets such as the London Metal Exchange. Cathode, along with high-grade scrap, is then purchased by semi-fabricators ("first use") to make wire rod, tubes, plates, sheets and strips (PSS) and foil, among other products. These form the basis for the component parts of finished goods.

Figure 1: China's role in the copper supply chain, 2023



Ensuring greater security of copper supply does not simply mean investing in new mine supply, be it domestic or through free-trade partnerships. Security of supply is only achieved with heavy investment in stages two and three of the supply chain – smelting/refining and semi-fabricating.

Likewise, investing in copper end uses, such as battery

gigafactories, exacerbates supply risks if there is no support for metals processing.

China continues to dominate copper supply

The US introduced a critical mineral strategy in 2017 that has not yet succeeded in reclaiming material market share in the copper supply chain.

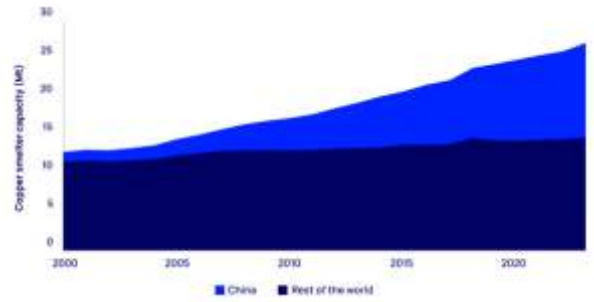
Rather, China has continued to dominate investment in the supply chain over the past five years. It has invested nearly half of the US\$55 billion committed to new copper mine supply since 2019, primarily in overseas projects.

In smelting and refining, China has added 97% of global capacity, amounting to more than 3 Mt of production and nearly US\$25 billion in investment. Since

2000, China has accounted for 75% of all global smelter capacity growth.

China's investment spree extends to fabrication capacity, where it has added nearly 11 Mt of copper and alloy capacity since 2019, some 80% of global additions. About two-thirds of these plants make wire rod, giving China half of the world's fabrication capacity, with more on the way.

Figure 2: China dominates growth in global smelting capacity this century
China's dominance of the



copper supply chain stems from its rapid industrialisation and urbanisation over the past 25 years. The country's share of global copper demand has grown from less than 20% to more than 50% over the last quarter century, necessitating a huge scaling up of copper imports in various forms.

Initially, Chinese state-owned enterprises prioritised economic growth over profitability and environmental standards. However, China's copper smelting industry has evolved significantly. In the 2000s, a drive for more stringent environmental and efficiency standards led to the regeneration of new smelting capabilities. Outdated furnaces were replaced with modern technology, including domestic Shuikoushan (SKS) and side-blown furnaces, and Chinese versions of European flash technology. The industry today is low cost and meets high environmental standards (especially in sulphur dioxide capture), making Chinese smelters highly competitive.

Swimming against the tide of market forces

Because of the scale and low cost of China's smelters, the rest of the industry has had to adapt. This includes focusing on niche areas such as complex concentrate treatment and secondary



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Feature

material processing. These specialisations help counteract margin pressures from higher input costs and global overcapacity. Meanwhile, semi-fabricators outside China, especially in Europe, struggle to compete due to lower utilisation rates and higher operating costs.

Carbon emission regulations, such as the EU's Carbon Border Adjustment Mechanism (CBAM), may reduce competitiveness by imposing higher taxes on the European copper industry without equivalent benefits. Moreover, government incentives, such as the Inflation Reduction Act (IRA) in the US, may not guarantee long-term industry sustainability.

The investment case for building subsidised capacity outside China in a market already teeming with capacity is lacking, with players desperate to avoid a race to the bottom.

Meanwhile, it is unlikely that government incentives such as the IRA will prop up these industries indefinitely.

Figure 3: Copper smelter industry cost curve

What would it take to decouple copper supply from China?

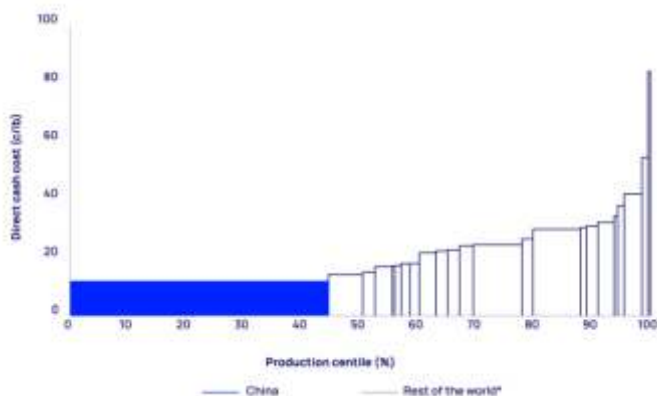
China's first use of copper now amounts to 17 Mt, or 50% of global demand. However, we estimate that 20% of this, or 3.3 Mt, is subsequently exported in finished goods. This is about the same volume of refined copper production capability that China has managed to add over the last five years. But what about future growth? In a non-China scenario, significantly more processing capacity would be required to meet energy transition targets. We estimate around 8.6 Mt of additional copper demand in the world ex-China over the next decade, driven by growth in transport, power and electrical networks. This equates to 70% of smelter capacity and 55% of fabricator capacity in the rest of the world. Assuming global average capital intensity, nearly US\$85 billion in new smelting and refining capacity would be needed to displace Chinese supply. Yet, over the last 20 years, capacity has barely changed outside China. This raises

the question of whether such a shift is achievable. Semi-fabricators might manage with lower entry barriers and nascent markets such as foil. However, they still need local copper raw materials. A wave of new primary copper smelters in the US and Europe seems unlikely.

Financing would also need to be made available. However, even if policy incentives make returns more attractive, resistance to new smelter projects on environmental and social grounds is high, especially in Europe. Smelting's environmental risks, stemming from emissions and impurities such as arsenic and mercury, make it unappealing to both policymakers and communities.

Scrap looks set to play a more significant role within the market if copper is to meet the environmental challenges facing the world today. We have begun to witness an acceleration in the direct use of scrap at the semi-fabricator level, especially for the manufacture of copper foil in the world outside China. Copper producers and consumers are also either developing standalone secondary capacity or increasing the share of scrap into their raw-material feed where possible, given the challenges associated with primary supply.

Figure 4: Greater direct use of scrap at semi-fabricators is part of the long-term solution *Mine-site processing technology can reduce the need for smelting*, In the mining sector, there is now significant





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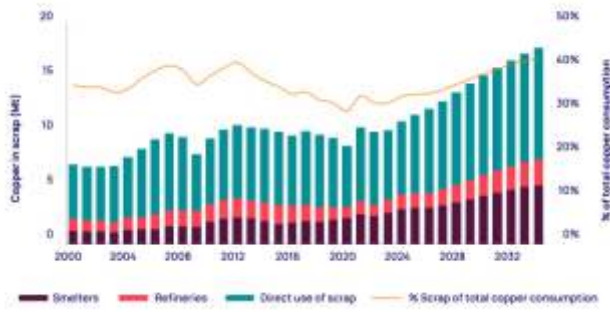
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investment being made in technology to reduce the requirement for the traditional concentrate-smelter-refinery route altogether.

Hydrometallurgical leaching of ores can produce cathode onsite, negating the smelting stage, meaning copper goes straight to semi-fabrication. Already, 20% of mine supply is produced in this way, but only on oxide ore types. The opportunity lies in expanding this to sulphide deposits as well. Crunch time for copper smelters

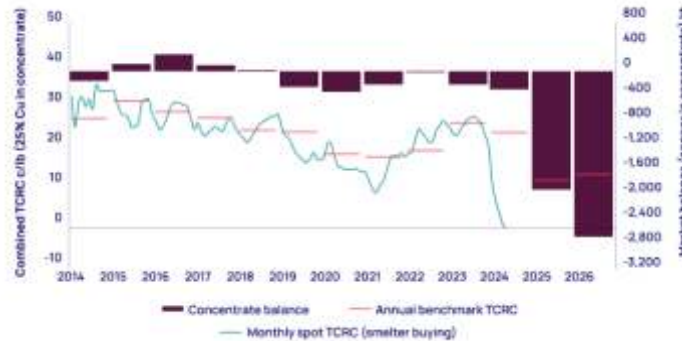
The sincerity of the reshoring mantra looks set to be tested sooner rather than later. Additions to smelting capacity in China, coupled with the new capability in India and Indonesia this year, are leading to huge overcapacity and a deep implied deficit in the copper concentrate market. Smelters are struggling with low spot treatment charges and refining charges (TCRCs) as a result. TCRCs, the discount to the full value of the metal processed, are the main source of revenue for smelter-refineries.

Mining companies now face a decision. They can squeeze out inefficient capacity but present China

t share, or they can accept less attractive terms with some smelters outside China, but potentially embed market inefficiencies.

Annual contract TCRC negotiations will begin later this year and the outcome will be telling for the direction of the industry.

Figure 5: The concentrate market is moving into a deep deficit due to smelter overcapacity



the complexities and current efficiencies of copper market supply chains.

Developing more and potentially higher-cost capacity swims against the tide of market economics. The investment required to change the trade flows is huge. Unless there is a seismic shift in the rate and efficiency at which the rest of the world deploys capital and operates, decoupling from China completely will mean a more expensive and much slower energy transition.

The rhetoric about replacing Chinese supply will continue, but governments and manufacturers must not overlook the scale of the task. Pragmatism must hold sway and compromises will be

needed to reach net zero while avoiding an unbearable cost to taxpayers. Perhaps loosening the noose around global trade is one of those concessions.

Conclusion:

Compromise is key

The need to secure minerals for the energy transition and meet climate targets is a global priority. However, protectionist measures to secure raw materials for geopolitical reasons ignore



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News Update

Hindalco Expands Aluminium, Copper Capacity with \$5 Billion Investment



Hindalco Industries, a prominent global player in aluminium and copper production, is set to make a significant investment of \$4-5 billion over the next three years as part of its expansion strategy. This

investment will be directed towards enhancing the company's production capacity to meet the increasing global demand for both aluminium and copper. Hindalco's strong operational performance in the second quarter of this fiscal year has been a key driver of this growth, with the company focusing on improving operational reliability and cost efficiency. This has paved the way for an ambitious upstream expansion, which includes the establishment of multiple new production facilities. These facilities will comprise a state-of-the-art aluminium smelter, an alumina refinery, a copper smelter, and a copper recycling plant. The expansion is designed not only to boost Hindalco's production but also to strengthen its position in the global metals market. The company's profitability has also witnessed an upward trajectory, largely due to the strong performance of its operations in India, which continues to be a core pillar of Hindalco's business. This expansion aligns with Hindalco's broader strategy to meet rising demand, diversify its product offerings, and capitalize on emerging growth opportunities in the metals sector.

Innovative LIBS Sorting Technology Boosts Constellium's Aluminium Recycling



Paris-based aluminum producer Constellium SE has adopted laser-induced breakdown spectroscopy (LIBS) technology to sort mixed aluminum scrap

from the automotive industry, improving the efficiency and purity of recycling. Developed in collaboration with OSR GmbH & Co. KG and a European automaker, this innovation allows for the precise separation of 5000 and 6000 series alloys, achieving over 95% purity. By recycling this scrap into high-quality aluminum, Constellium reduces carbon emissions and supports the automotive industry's sustainability goals. The company plans to enhance LIBS

further and expand its use for recycling end-of-life vehicles. Constellium's efforts align with similar initiatives by other companies like Novelis and Hydro, who are also exploring advanced sorting technologies to improve aluminum recycling.

Copper Gains on Dollar Weakness, Chinese Stimulus Anticipated



Copper prices saw a rise on Monday as the dollar weakened against most major currencies, while traders assessed potential impacts from China's government policies aimed at stimulating economic growth and demand. With expectations of increased demand for copper in China, the market remained attentive to the government's next moves.

In the U.S., sources suggest that President-elect Donald Trump is likely to appoint Marco Rubio as his Secretary of State. This would signal a more aggressive foreign policy stance, especially toward China and Israel, marking a shift toward hawkish rhetoric. Such a decision could result in heightened tensions with China, especially given Trump's firm stance on trade, which includes the imposition of significant tariffs on Chinese and European goods. These trade policies, while intended to protect U.S. industries, may also contribute to inflationary pressures on the broader economy.

The U.S. dollar, which had been strengthening in recent weeks, exerted downward pressure on commodities like copper. A stronger dollar makes metals more expensive for international buyers, potentially dampening demand. The dollar index had reached a four-month high, fueled by expectations surrounding Trump's trade agenda and broader market momentum.

However, on Monday, the dollar index saw a slight pullback, dropping 0.1% to 106.5 by 15:33 GMT. The index had reached a session high of 106.8 earlier in the day, with a low of 106.4. In turn, copper futures for December rose by 0.7%, reaching \$4.13 per pound in U.S. trading. This uptick reflected the dollar's dip and the ongoing analysis of global economic factors, particularly the impact of U.S. trade policies and China's economic outlook.

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Coal Secretary Launches 'Mining with Conscience' at MCL Meet



Vikram Dev Dutt, Secretary to the Government of India, Ministry of Coal, on Monday introduced the concept of "mining with conscience" while emphasising the need for responsible mining practices that align with

India's ambitious growth targets and its energy needs.

Dutt, who was on a two-day tour of Mahanadi Coalfields Limited (MCL), addressed a gathering of senior officers and employees at a special event organised here as part of Coal India's Golden Jubilee Year celebrations. Among those present at the function were P M Prasad, Chairman of Coal India, Uday A Kaole, CMD of MCL, S K Kassi, Joint Secretary (Coal), MCL's senior management, former directors, and representatives from trade unions. During his address, the Secretary praised Team MCL for its continuous growth in production, stating, "MCL is the bedrock of performance within Coal India," and commended its contributions during the Covid-19 pandemic.

Dutt also urged that the concept of "mining with conscience" should become the new guiding theme for the coal sector, focusing on sustainable development while addressing both environmental and social concerns. The initiative aims to ensure that India's progress in energy production does not come at the cost of its natural resources or local communities. Earlier in the event, Uday A Kaole welcomed the dignitaries and reaffirmed MCL's commitment to continuous performance excellence. P M Prasad, Chairman of Coal India, also lauded Team MCL for their outstanding performance over the years. He emphasised the importance of sustainability initiatives and diversification as essential strategies to prepare for the evolving business landscape.

During his visit, Dutt chaired a review meeting of MCL in Sambalpur and toured key mining operations, including the Lakhanpur Area and Ib Valley Washery in Jharsuguda district, Odisha.

India's Aluminium ADC12 Prices Rise Amid Higher Raw Material Costs

India's ADC12 non-OEM prices saw a slight increase of INR 1,000/t (approximately \$12/t) week-on-week, driven by higher raw material costs. However, demand for aluminium ADC12 remained weak in the domestic markets of Delhi-NCR and Chennai.

BigMint's benchmark assessments for ADC12 (non-OEM) grade were INR 201,000/tonne in Delhi and INR 203,000/tonne in Chennai, reflecting a week-on-week increase of INR 1,000/t (\$12/t). Meanwhile, three-month London Metal Exchange (LME) aluminium prices rose by 5% week-on-week to around \$2,677/t, with LME-registered



warehouse stocks declining by 1%.

The increase in LME aluminium prices led to higher prices for both imported and domestic aluminium scrap, resulting in a modest rise in ADC12 prices in the Delhi and

Chennai regions. The current scrap-to-semi-finished spread remains stable at INR 28,000-29,000/t.

In contrast, a major automobile manufacturer announced its December 2024 ADC12 prices at INR 209,000/t, down INR 900/t from the previous month's price of INR 209,900/t, marking the lowest price in nine months, last seen in March 2024. The price decline is mainly attributed to weak demand in the automobile sector. This reduction could impact alloy ingot producers, especially smaller and medium-scale manufacturers, as the price gap between tense and ADC12 narrows, putting pressure on profit margins.

The global ADC12 export market is also facing weak demand, although China has been importing aluminium ADC12 ingots from Thailand due to lower prices and duty exemptions. China's aluminium alloy production increased by 9% year-on-year to 1.41 million tonnes in October 2024.

Meanwhile, the price of basic raw materials, such as scrap, also saw slight increases, with tense scrap from the UAE priced at \$1,800/t CFR Nhava Sheva (up by \$30/t), and zorba 95/5 from the UK rising to \$2,110/t CFR India (up by \$10/t). Domestic scrap prices were stable, with tense scrap priced at INR 173,000/t in Delhi and INR 174,000/t in Chennai.

Looking ahead, ADC12 prices are expected to stay within a narrow range in the near term, with price announcements from major automobile manufacturers likely to influence market trends. Overseas demand is expected to remain sluggish due to the upcoming winter holidays.

Rs.34 Crore Funding for EMR's High-Performance Aluminium Project

EMR has secured £3.4 million in funding from the Advanced Propulsion Centre (APC) to support a groundbreaking research project aimed at developing a new metals processing facility. The project will focus on creating a process that produces aluminium extrusion billets with a significantly reduced carbon footprint. These billets will be made using post-consumer metals, with the goal of achieving up to 100% recycled aluminium content, while maintaining the mechanical strength and durability of primary aluminium.

The billets produced will be used in manufacturing structural components for the automotive industry. These components will meet the same quality and performance standards as those made from primary aluminium, and their



News Update



quality will be verified through qualification protocols with OEM partners.

EMR is collaborating with several key partners on this initiative, including Constellium, a leading manufacturer

and tier-one supplier in the automotive sector specializing in aluminium alloy development. The project also involves the Brunel Centre for Advanced Solidification Technology (BCAST), surface treatment specialist BCW Treatments, and software company Riskoa. Stellantis, a major automotive manufacturer, is serving as a technical advisory group leader for the project.

Bruce Miller, commercial director at EMR, described the project as a significant step for both the aluminium and automotive industries. By demonstrating that high-performance automotive parts can be made from recycled materials, the project will contribute to a more sustainable, circular vehicle manufacturing sector in the UK. The APC funding will help push the limits of what recycled aluminium can achieve, driving economic benefits, reducing carbon emissions, and securing investment and jobs in UK manufacturing.

Dr. Andy Wilson of BCW Treatments emphasized the importance of advancing post-consumer scrap use in the aluminium supply chain, helping to reduce carbon emissions and promote sustainability for future generations.

Aircraft Aluminium Finds New Purpose with Nandina REM



Singapore-based start-up Nandina REM is transforming the way aircraft materials, particularly aluminium, are recycled, offering a pioneering approach that supports

sustainability in industries like aviation and automotive. The company takes materials from retired aircraft and converts them into high-quality, ultra-low-emission, and traceable resources. These recycled materials are then repurposed for new aircraft and products such as battery casings for electric vehicles. Nandina REM's use of advanced technology and material science preserves the quality of aluminium alloys, enabling manufacturers to reduce their reliance on primary aluminium and help build a more sustainable future.

CEO Karina Cady believes retired aircraft are a valuable source of materials, with aluminium being a key resource that can be reused to create a greener, more sustainable world. Despite aviation's significant contribution to global CO2 emissions, Nandina REM is focused on reducing the

carbon footprint of the industry. By recycling aircraft materials, the company aims to reduce the carbon intensity of aircraft by more than 50%, providing a tangible solution to lowering aviation's environmental impact.

Nandina REM's strategy is built around three main areas: sourcing retired aircraft to ensure a steady supply of materials, ensuring certification for secondary aluminium to meet the aviation industry's rigorous standards, and striving to reduce one gigatonne of greenhouse gas emissions from industrial supply chains by 2030. The company faces challenges in raising awareness within the aviation industry, but progress is being made as major players like Boeing and Airbus adopt circular manufacturing practices. Nandina REM is also a founding member of the Aviation Circularity Consortium, which promotes a circular economy within the aviation industry. By providing sustainable materials that reduce operating costs, Nandina REM makes the case for circularity a compelling business choice.

SAIL, Rourkela inks deal with Adani Enterprises to augment iron ore production

SAIL, Rourkela Steel Plant (RSP) has entered into a long-term agreement with Adani Enterprises Limited (AEL) for the development and operation of the Taldih Iron Mine.

Mining equipment

The project, based on the Mines Developer and Operator (MDO) model, will expand the mine's production capacity from the current 2 million tonnes per annum (MTPA) to 7 MTPA. The development phase, including the construction of a new plant and infrastructure, will be completed within two years, with production set to begin in the third year and continue for 25 years.

The existing capacity of Taldih Iron Mine is 2 MTPA which is being operated by SAIL contractually with help of mobile crushing and screening plant and small capacity earth moving machineries. This contract includes development of mine and construction of new plant and other infrastructure facilities. Environment Clearance for expansion of Taldih Iron Mines for 7 MTPA has been granted by Ministry of Environment, Forest and Climate Change on 28th April, 2023 with installation of long distance conveyor belt system from Taldih mines to Railway Siding at Barsua Valley. This initiative will not only secure a stable supply of iron ore for SAIL's current production requirements but also support future expansions of its steel plants. By scaling up operations at Taldih, SAIL aims to strengthen its raw material base and contribute to the growth of India's steel industry.

Sudip Pal Chowdhury, ED (Projects), Anand Kumar, CGM (Mines-Projects) and G S Das, CGM (Project-Commercials) represented RSP while Rajendra Singh, Joint President and Business Unit Head, Ajit Kumar Patra, Cluster Head, Iron Ore Business and Jay Viswanath, Project-Head, Iron Ore Business represented Adani Enterprises Limited in the contract agreement signing ceremony. Many other senior officers and representatives of both the organizations were also present on the occasion.



SIAM									
Summary Report: Production, Domestic Sales & Exports data for the month of April 2024									
Report I									
(Number of Vehicles)									
Category Segment/Subsegme	Production		Domestic		Exports				
	April		April		April				
	2023	2024	2023	2024	2023	2024	2023	2024	2023
Passenger Vehicles*									
Passenger Cars	1,42,933	1,31,846	-7.8%	1,2	96,35	-23.4%	22,94	30,26	31.9%
Utility Vehicles	1,62,309	2,06,585	27.3%	1,4	1,79,3	21.2%	17,71	19,02	7.4%
Vans	10,921	12,859	17.7%	10,50	12,06	14.8%	284	273	-3.9%
Total Passenger Vehicles	3,16,163	3,51,290	11.1%	2,8	2,87,7	1.2%	40,94	49,56	21.1%
Three Wheelers									
Passenger Carrier	54,709	61,612	12.6%	34,60	38,72	11.9%	22,99	22,35	-2.8%
Goods Carrier	6,183	9,758	57.8%	5,367	8,818	64.3%	97	122	25.8%
E-Rickshaw	1,738	1,350	-22.3%	2,591	1,308	-49.5%	-	-	-
E-Cart	131	289	120.6	319	265	-16.9%	-	-	-
Total Three Wheelers	62,761	73,009	16.3%	42,88	49,11	14.5%	23,09	22,48	-2.7%
Two Wheelers									
Scooters	4,96,196	5,94,694	19.9%	4,6	5,81,2	25.2%	49,53	65,87	33.0%
Motorcycles	10,45,771	12,98,063	24.1%	8,3	11,28,	34.4%	2,0	2,54,5	22.0%
Mopeds	36,435	40,229	10.4%	34,92	41,92	20.0%	-	432	-
Total Two Wheelers	15,78,402	19,32,986	22.5%	13,3	17,51,	30.8%	2,5	3,20,8	24.3%
Total Quadricycle	314	756	140.8	61	19	-68.9%	296	664	124.3
Grand Total	19,57,640	23,58,041	20.5%	16,6	20,88,	25.4%	3,2	3,93,5	22.0%
* BMW, Mercedes,JLR, Tata Motors and Society of Indian Automobile Manufacturers									

SIAM						
Category & Company wise Summary Report for the month of April 2024						
Report II						
(Number of Vehicles)						
Category Segment/Subse Manufacturer	Production		Domestic		Exports	
	April		April		April	
	2023	2024	2023	2024	2023	2024
Passenger Vehicles						
FCA India Automobiles Pvt Ltd	1,186	439	558	377	407	-
Force Motors Ltd	4	49	-	93	-	-
Honda Cars India Ltd	4,950	9,150	5,313	4,351	2,363	6,516
Hyundai Motor India Ltd	60,491	62,989	49,701	50,201	8,500	13,500
Isuzu Motors India Pvt Ltd	58	131	34	21	-	-
Kia Motors India Pvt Ltd	29,902	21,800	23,216	19,968	7,785	2,204
Mahindra & Mahindra Ltd	33,219	41,944	34,698	41,008	879	544
Maruti Suzuki India Ltd	1,44,097	1,66,325	1,37,320	1,37,952	16,834	21,964
MG Motor India Pvt Ltd	5,418	2,588	4,551	2,956	-	-
Nissan Motor India Pvt Ltd	3,401	6,843	2,617	2,404	633	639
PCA Motors Pvt. Ltd	954	700	1,003	404	686	343
Renault India Pvt Ltd	2,868	2,865	4,323	3,707	75	6
SkodaAuto India Pvt Ltd	3,889	2,762	4,009	2,579	164	50
Toyota Kirloskar Motor Pvt Ltd	20,246	24,268	13,896	18,676	1,348	1,794
Volkswagen India Pvt Ltd	5,480	8,437	3,032	3,049	1,266	2,003
Total Passenger Vehicles	3,16,163	3,51,290	2,84,271	2,87,746	40,940	49,563



SIAM						
Category & Company wise Summary Report for the month of April 2024						
						Report II
						(Number of Vehicles)
Category	Production	Domestic	Exports			
Segment/Subse	April	April	April			
Manufacturer	2023	2024	2023	2024	2023	2024
Three Wheelers						
Atul Auto Ltd	743	2,089	582	1,646	133	46
Bajaj Auto Ltd	41,259	45,907	31,283	32,114	11,653	13,670
Continental Engines Pvt Ltd	492	330	358	418	-	-
Force Motors Ltd	210	168	-	-	140	280
Mahindra & Mahindra Ltd	4,849	6,565	5,552	5,504	6	84
Piaggio Vehicles Pvt Ltd	5,656	8,751	3,505	7,776	1,329	1,036
TVS Motor Company Ltd	9,552	9,199	1,605	1,658	9,833	7,365
Total Three Wheelers	62,761	73,009	42,885	49,116	23,094	22,481
Two Wheelers						
Ather Energy Pvt. Ltd	7,185	10,124	6,746	8,850	-	40
Bajaj Auto Ltd	2,57,838	3,00,579	1,81,690	2,16,950	1,06,157	1,24,839
Chetak Technology Ltd	373	-	138	-	-	-
Hero MotoCorp Ltd	4,30,766	5,08,612	3,86,184	5,13,296	9,923	20,289
Honda Motorcycle & Scooter India	3,62,923	4,93,420	3,38,290	4,81,046	36,458	60,900
India Kawasaki Motors Pvt Ltd	80	72	416	351	-	-
India Yamaha Motor Pvt Ltd	69,539	82,298	52,939	63,098	16,646	20,504
Okinawa Autotech Pvt. Ltd	-	-	36	1	-	-
Piaggio Vehicles Pvt Ltd	5,278	5,511	2,990	3,117	1,446	3,020
Royal-Enfield (Unit of Eicher	71,014	76,216	68,881	75,038	4,255	6,832
Suzuki Motorcycle India Pvt Ltd	86,936	1,05,594	67,259	88,067	21,472	11,310
Triumph Motorcycles India Pvt Ltd	34	43	63	130	-	-
TVS Motor Company Ltd	2,86,436	3,50,517	2,32,956	3,01,449	61,830	73,143
Total Two Wheelers	15,78,402	19,32,986	13,38,588	17,51,393	2,58,187	3,20,877
Quadricycle						
Bajaj Auto Ltd	314	756	61	19	296	664
Total Quadricycle	314	756	61	19	296	664
Grand Total	19,57,640	23,58,041	16,65,805	20,88,274	3,22,517	3,93,585
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Segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report III
						(Number of Vehicles)
Category	Production	Domestic	Exports			
Segment/Subseg	April	April	April			
Manufacturer	2023	2024	2023	2024	2023	2024
Passenger Vehicles						
A: Passenger Cars						
Honda Cars India Ltd	4,950	3,450	5,313	2,620	2,097	4,016
Hyundai Motor India Ltd	29,248	26,579	22,397	16,413	6,206	11,096
Maruti Suzuki India Ltd	1,01,319	92,532	90,062	69,339	13,125	13,282
Nissan Motor India Pvt Ltd	63	2,631	-	-	592	561
Renault India Pvt Ltd	1,009	593	1,082	977	45	-
SkodaAuto India Pvt Ltd	1,781	1,121	1,707	1,266	-	-
Toyota Kirloskar Motor Pvt Ltd	72	174	3,716	4,559	-	-
Volkswagen India Pvt Ltd	4,491	4,766	1,481	1,183	881	1,313
Total A: Passenger Cars	1,42,933	1,31,846	1,25,758	96,357	22,946	30,268
B: Utility Vehicles						
FCA India Automobiles Pvt Ltd	1,186	439	558	377	407	-
Force Motors Ltd	4	49	-	93	-	-
Honda Cars India Ltd	-	5,700	-	1,731	266	2,500
Hyundai Motor India Ltd	31,243	36,410	27,304	33,788	2,294	2,404
Isuzu Motors India Pvt Ltd	58	131	34	21	-	-
Kia Motors India Pvt Ltd	29,902	21,800	23,216	19,968	7,785	2,204
Mahindra & Mahindra Ltd	33,199	41,929	34,694	41,008	859	534
Maruti Suzuki India Ltd	31,877	60,949	36,754	56,553	3,445	8,419
MG Motor India Pvt Ltd	5,418	2,588	4,551	2,956	-	-
Nissan Motor India Pvt Ltd	3,338	4,212	2,617	2,404	41	78
PCA Motors Pvt. Ltd	954	700	1,003	404	686	343
Renault India Pvt Ltd	1,859	2,272	3,241	2,730	30	6
SkodaAuto India Pvt Ltd	2,108	1,641	2,302	1,313	164	50
Toyota Kirloskar Motor Pvt Ltd	20,174	24,094	10,180	14,117	1,348	1,794
Volkswagen India Pvt Ltd	989	3,671	1,551	1,866	385	690
Total B: Utility Vehicles	1,62,309	2,06,585	1,48,005	1,79,329	17,710	19,022
C: Vans						
Mahindra & Mahindra Ltd	20	15	4	-	20	10
Maruti Suzuki India Ltd	10,901	12,844	10,504	12,060	264	263
Total C: Vans	10,921	12,859	10,508	12,060	284	273
Total Passenger Vehicles	3,16,163	3,51,290	2,84,271	2,87,746	40,940	49,563



Statistics

SIAM							
Segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024							
							Report III
(Number of Vehicles)							
Category	Production	Domestic Sales	Exports				
Segment/Subsegment	April	April	April				
Manufacturer	2023	2024	2023	2024	2023	2024	
Three Wheelers							
A: Passenger Carrier							
Atul Auto Ltd	340	689	201	457	129	42	
Bajaj Auto Ltd	37,886	41,896	28,320	28,119	11,565	13,654	
Continental Engines Pvt Ltd	73	70	34	80	-	-	
Force Motors Ltd	210	168	-	-	140	280	
Mahindra & Mahindra Ltd	2,392	3,714	2,119	3,272	4	84	
Piaggio Vehicles Pvt Ltd	4,257	6,030	2,363	5,222	1,326	974	
TVS Motor Company Ltd	9,551	9,045	1,571	1,575	9,833	7,325	
Total A: Passenger Carrier	54,709	61,612	34,608	38,725	22,997	22,359	
E-Rickshaw							
Atul Auto Ltd	272	372	265	324	-	-	
Continental Engines Pvt Ltd	406	163	324	204	-	-	
Mahindra & Mahindra Ltd	1,060	815	2,002	780	-	-	
Total E-Rickshaw	1,738	1,350	2,591	1,308	-	-	
B: Goods Carrier							
Atul Auto Ltd	-	884	-	746	4	4	
Bajaj Auto Ltd	3,373	4,011	2,963	3,995	88	16	
Continental Engines Pvt Ltd	13	49	-	103	-	-	
Mahindra & Mahindra Ltd	1,397	1,939	1,228	1,337	2	-	
Piaggio Vehicles Pvt Ltd	1,399	2,721	1,142	2,554	3	62	
TVS Motor Company Ltd	1	154	34	83	-	40	
Total B: Goods Carrier	6,183	9,758	5,367	8,818	97	122	
E-Cart							
Atul Auto Ltd	131	144	116	119	-	-	
Continental Engines Pvt Ltd	-	48	-	31	-	-	
Mahindra & Mahindra Ltd	-	97	203	115	-	-	
Total E-Cart	131	289	319	265	-	-	
Total Three Wheelers	62,761	73,009	42,885	49,116	23,094	22,481	

SIAM							
Segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024							
							Report III
(Number of Vehicles)							
Category	Production	Domestic Sales	Exports				
Segment/Subsegment	April	April	April				
Manufacturer	2023	2024	2023	2024	2023	2024	
Two Wheelers							
A: Scooters							
Ather Energy Pvt. Ltd	7,185	10,124	6,746	8,850	-	40	
Bajaj Auto Ltd	4,375	12,694	4,546	11,121	72	-	
Chetak Technology Ltd	373	-	138	-	-	-	
Hero MotoCorp Ltd	27,520	30,478	25,384	31,712	1,893	5,329	
Honda Motorcycle & Scooter India Pvt Ltd	2,56,914	2,79,399	2,46,016	2,83,482	18,798	36,374	
India Yamaha Motor Pvt Ltd	16,863	29,730	16,245	24,781	1,708	7,766	
Okinawa Autotech Pvt. Ltd	-	-	36	1	-	-	
Piaggio Vehicles Pvt Ltd	5,278	4,146	2,990	2,885	1,446	1,884	
Suzuki Motorcycle India Pvt Ltd	74,948	92,125	66,694	86,106	13,716	2,694	
TVS Motor Company Ltd	1,02,740	1,35,998	95,594	1,32,339	11,902	11,787	
Total A: Scooters	4,96,196	5,94,694	4,64,389	5,81,277	49,535	65,874	
B: Motorcycles							
Bajaj Auto Ltd	2,53,463	2,87,885	1,77,144	2,05,829	1,06,085	1,24,839	
Hero MotoCorp Ltd	4,03,246	4,78,134	3,60,800	4,81,584	8,030	14,960	
Honda Motorcycle & Scooter India Pvt Ltd	1,06,009	2,14,021	92,274	1,97,564	17,660	24,526	
India Kawasaki Motors Pvt Ltd	80	72	416	351	-	-	
India Yamaha Motor Pvt Ltd	52,676	52,568	36,694	38,317	14,938	12,738	
Piaggio Vehicles Pvt Ltd	-	1,365	-	232	-	1,136	
Royal-Enfield (Unit of Eicher Motors)	71,014	76,216	68,881	75,038	4,255	6,832	
Suzuki Motorcycle India Pvt Ltd	11,988	13,469	565	1,961	7,756	8,616	
Triumph Motorcycles India Pvt Ltd	34	43	63	130	-	-	
TVS Motor Company Ltd	1,47,261	1,74,290	1,02,437	1,27,186	49,928	60,924	
Total B: Motorcycles	10,45,771	12,98,063	8,39,274	11,28,192	2,08,652	2,54,571	
C: Mopeds							
TVS Motor Company Ltd	36,435	40,229	34,925	41,924	-	432	
Total C: Mopeds	36,435	40,229	34,925	41,924	-	432	
Total Two Wheelers	15,78,402	19,32,986	13,38,588	17,51,393	2,58,187	3,20,877	
Quadricycle							
Bajaj Auto Ltd	314	756	61	19	296	664	
Total Quadricycle	314	756	61	19	296	664	
Grand Total	19,57,640	23,58,041	16,65,805	20,88,274	3,22,517	3,93,585	

Society of Indian Automobile Manufacturers (14/05/2024)



SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
Passenger Vehicles						
A : Passenger Cars - Upto 5 Seats						
Mini :Seats upto-5, Length Normally <3600 mm, Body Style-Hatchback, Engine Displacement Normally upto 1.0 Litre						
Maruti Suzuki India Ltd (Alto,Spresso)	16,918	13,702	14,110	11,519	2,630	1,625
Renault India Pvt Ltd (Kwid)	1,009	593	1,082	977	45	-
Total Mini	17,927	14,295	15,192	12,496	2,675	1,625
Compact :Seats upto-5, Length Normally between 3600 - 4000 mm, Body Style-Sedan/Estate/Hatch/Notchback, Engine Displacement Normally upto 1.4 Litre						
Honda Cars India Ltd (Amaze)	2,519	600	3,393	1,796	4	180
Hyundai Motor India Ltd (Aura,Grand i10,i20)	20,936	19,970	18,396	14,842	2,233	6,597
Maruti Suzuki India Ltd (OEM Model# Baleno,Celerio,Dzire,Ignis,Swift)	83,256	76,845	74,935	56,953	10,357	11,087
Toyota Kirloskar Motor Pvt Ltd (Glanza)	-	-	3,653	4,380	-	-
Total Compact	1,06,711	97,415	1,00,377	77,971	12,594	17,864
Mid-Size: Seats upto-5, Length Normally between 4250 - 4500 mm, Body Style-Sedan/Estate/Hatch/Notchback, Engine Displacement Normally upto 1.6 Litre						
Honda Cars India Ltd (City)	2,431	2,850	1,920	824	2,093	3,836
Hyundai Motor India Ltd (Verna)	8,312	6,609	4,001	1,571	3,973	4,499
Maruti Suzuki India Ltd (Ciaz)	1,145	1,985	1,017	867	138	570
Nissan Motor India Pvt Ltd (Sunny)	63	2,631	-	-	592	561
Volkswagen India Pvt Ltd (Virtus)	4,491	4,766	1,481	1,183	881	1,313
Total Mid-Size	16,442	16,841	8,419	4,445	7,677	10,779
Executive :Seats upto-5, Length Normally between 4500 - 4700 mm, Body Style-Sedan/Estate/Notchback, Engine Displacement Normally upto 2 Litre						
SkodaAuto India Pvt Ltd (Slavia)	1,781	1,121	1,586	1,253	-	-
Total Executive	1,781	1,121	1,586	1,253	-	-
Premium :Seats upto-5, Length Normally between 4700 - 5000 mm, Body Style-Sedan/Estates, Engine Displacement Normally upto 3 Litre						
SkodaAuto India Pvt Ltd (Superb)	-	-	121	13	-	-
Toyota Kirloskar Motor Pvt Ltd (Camry)	72	174	63	179	-	-
Total Premium	72	174	184	192	-	-
Total Passenger Cars	1,42,933	1,31,846	1,25,758	96,357	22,946	30,268

#Only production volume of OEM Model is reported by Maruti Suzuki India Limited.

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
B: Utility Vehicles						
B : Utility Vehicles/ Sports Utility Vehicles; 4x2 or 4x4 offroad capability ; Generally ladder on frame ; 2 box ; 5 Seats or more but upto 10 Seats.						
UVC : Length < 4000 mm & Price <20 Lakhs						
Honda Cars India Ltd (WR-V)	-	-	-	-	266	-
Hyundai Motor India Ltd (Exter,Venue)	11,698	18,359	10,342	16,876	1,006	1,462
Kia Motors India Pvt Ltd (Sonet)	13,594	8,600	9,744	7,901	4,206	920
Mahindra & Mahindra Ltd (Bolero,Kuv100,Thar,XUV 3XO,Xuv300,XUV4	19,018	20,556	20,320	19,765	588	7
Maruti Suzuki India Ltd (Brezza,Fronx,Jimmy)	20,517	41,327	20,620	31,656	146	5,771
Nissan Motor India Pvt Ltd (Magneite)	3,338	4,212	2,617	2,404	41	78
PCA Motors Pvt. Ltd (C3,EC3)	926	693	993	310	686	26
Renault India Pvt Ltd (Kiger,Triber)	1,859	2,272	3,241	2,730	30	6
Total UVC	70,950	96,019	67,877	81,642	6,969	8,270
UV1 : Length 4000 to 4400 mm & Price <20 Lakhs						
Force Motors Ltd (Surkha,Trax)	4	11	-	-	-	-
Honda Cars India Ltd (Elevate)	-	5,700	-	1,731	-	2,500
Hyundai Motor India Ltd (Creta)	15,763	15,561	14,186	15,447	513	1
Kia Motors India Pvt Ltd (Seltos)	9,659	7,610	7,213	6,734	2,864	564
Maruti Suzuki India Ltd (OEM Model # Ertiga,Grand Vitara,S-Cross)	8,506	16,238	13,274	21,195	3,272	2,647
MG Motor India Pvt Ltd (Astor)	1,060	1,213	704	1,019	-	-
PCA Motors Pvt. Ltd (C3 Aircross)	-	7	-	93	-	317
SkodaAuto India Pvt Ltd (Kushaq)	1,745	1,641	2,162	1,158	164	50
Toyota Kirloskar Motor Pvt Ltd (Model Manufactured for the sale to othe	12,818	14,490	2,616	4,444	1,348	1,794
Volkswagen India Pvt Ltd (Taigun)	989	3,476	1,520	1,758	385	690
Total UV1	50,544	65,947	41,675	53,579	8,546	8,563
UV2 : Length between 4400 - 4700 mm & Price <20 Lakhs						
Hyundai Motor India Ltd (Alcazar)	3,082	2,298	2,037	1,219	775	941
Kia Motors India Pvt Ltd (Carens)	6,649	5,590	6,107	5,328	715	720
Mahindra & Mahindra Ltd (Bolero Neo Plus,Marazzo,Scorpio,Xuv700)	14,181	21,373	14,374	21,243	271	527
Maruti Suzuki India Ltd (XL6)	2,854	3,384	2,880	3,509	27	1
MG Motor India Pvt Ltd (Hector)	3,121	1,188	3,103	1,813	-	-
Total UV2	29,887	33,833	28,481	33,112	1,788	2,189
UV3 : Length >4700 mm & Price <20 Lakhs						
Force Motors Ltd (Trax)	-	38	-	40	-	-
Isuzu Motors India Pvt Ltd (Hi-Lander,V-Cross)	54	-	30	-	-	-
Toyota Kirloskar Motor Pvt Ltd (Innova Crysta,Innova HyCross)	4,701	6,684	4,837	7,103	-	-
Total UV3	4,755	6,722	4,867	7,143	-	-

#Only production volume of OEM Model is reported by Maruti Suzuki India Limited.



Statistics

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
UV4 : Price between Rs. 20 to 30 Lakh						
FCA India Automobiles Pvt Ltd (Jeep Compass)	739	311	266	282	374	-
Force Motors Ltd (Gurkha)	-	-	-	53	-	-
Hyundai Motor India Ltd (Tucson)	600	163	550	201	-	-
Isuzu Motors India Pvt Ltd (Hi-Lander,V-Cross)	-	131	-	20	-	-
Maruti Suzuki India Ltd (Invicto)	-	-	-	193	-	-
MG Motor India Pvt Ltd (ZS EV)	917	-	463	-	-	-
PCA Motors Pvt. Ltd (C5 Aircross)	28	-	10	1	-	-
Toyota Kirloskar Motor Pvt Ltd (Model Manufactured for the sale to othe	-	524	-	-	-	-
Total UV4	2,284	1,129	1,289	750	374	-
UV5 : Price >Rs. 30 Lakh						
FCA India Automobiles Pvt Ltd (Jeep Meridian)	447	128	292	95	33	-
Hyundai Motor India Ltd (Ioniq5)	100	29	189	45	-	-
Isuzu Motors India Pvt Ltd (MU-X)	4	-	4	1	-	-
Kia Motors India Pvt Ltd (EV6)	-	-	152	5	-	-
MG Motor India Pvt Ltd (Gloster)	320	187	281	124	-	-
SkodaAuto India Pvt Ltd (Kodiahq)	363	-	140	155	-	-
Toyota Kirloskar Motor Pvt Ltd (Fortuner,Hilux, Land Cruiser, Vellfire)	2,655	2,396	2,727	2,570	-	-
Volkswagen India Pvt Ltd (Tiguan)	-	195	31	108	-	-
Total UV5	3,889	2,935	3,816	3,103	33	-
Total Utility Vehicles	1,62,309	2,06,585	1,48,005	1,79,329	17,710	19,022
Vans						
C :Vans ; Generally 1 or 1.5 box; seats upto 5 to 10						
V1 :Hard tops mainly used for personal transport, Price upto Rs. 10 Lakh						
Mahindra & Mahindra Ltd (Maxximo)	20	15	-	-	20	10
Maruti Suzuki India Ltd (Eeco)	10,901	12,844	10,504	12,060	264	263
Total V1	10,921	12,859	10,504	12,060	284	273
V2 :Soft tops mainly used as Maxi Cabs, Price upto Rs. 10 Lakh						
Mahindra & Mahindra Ltd (Supro)	-	-	4	-	-	-
Total V2	-	-	4	-	-	-
Total Vans	10,921	12,859	10,508	12,060	284	273
Total Passenger Vehicles	3,16,163	3,51,290	2,84,271	2,87,746	40,940	49,563

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domesti		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
Three Wheelers						
A: Passenger Carrier						
A1:No. of seats Including driver not exceeding 4 &						
Atul Auto Ltd (Atul Gemini,Atul Rik,Atul Rik + 3P ,Rik)	255	368	135	160	73	42
Bajaj Auto Ltd (Maxima,RE)	37,886	41,896	28,320	28,119	11,565	13,654
Continental Engines Pvt Ltd (Baxy Express Passenger)	73	70	34	80	-	-
Mahindra & Mahindra Ltd (Alfa,Treo)	2,392	3,714	2,119	3,272	4	84
Piaggio Vehicles Pvt Ltd (Ape Auto,Ape City)	4,257	6,030	2,363	5,222	1,326	974
TVS Motor Company Ltd (TVS King 4S)	9,551	9,045	1,571	1,575	9,833	7,325
Total A1	54,414	61,123	34,542	38,428	22,801	22,079
A2:No. of seats Including driver exceeding 4 but not						
Atul Auto Ltd (Atul Gem,Gemi Paxx)	85	321	66	297	56	-
Force Motors Ltd (Minidor)	210	168	-	-	140	280
Total A2	295	489	66	297	196	280
Total A	54,709	61,612	34,608	38,725	22,997	22,359
Total Passenger Carriers	54,709	61,612	34,608	38,725	22,997	22,359
E-Rickshaw						
Atul Auto Ltd (Atul Elite)	272	372	265	324	-	-
Continental Engines Pvt Ltd (Baxy E Rath)	406	163	324	204	-	-
Mahindra & Mahindra Ltd (e-Alfa Mini,Treo Yaari)	1,060	815	2,002	780	-	-
Total E-Rickshaw	1,738	1,350	2,591	1,308	-	-
B: Goods Carrier						
B1: Max mass not exceeding 1 tonnes						
Atul Auto Ltd (Atul Gem,Atul Gemini,Atul Samart Aqua,Atul	-	884	-	746	4	4
Bajaj Auto Ltd (Maxima)	3,373	4,011	2,963	3,995	88	16
Continental Engines Pvt Ltd (Baxy Cargo)	13	49	-	103	-	-
Mahindra & Mahindra Ltd (Alfa,Treo,Zor Grand)	1,397	1,939	1,228	1,337	2	-
Piaggio Vehicles Pvt Ltd (Ape Xtra)	1,399	2,721	1,142	2,554	3	62
TVS Motor Company Ltd (TVS King Kargo)	1	154	34	83	-	40
Total B1	6,183	9,758	5,367	8,818	97	122
Total Goods Carrier	6,183	9,758	5,367	8,818	97	122
E-Cart						
Atul Auto Ltd (Atul Elite Cargo)	131	144	116	119	-	-
Continental Engines Pvt Ltd (Baxy E Cart)	-	48	-	31	-	-
Mahindra & Mahindra Ltd (e-Alfa Cargo)	-	97	203	115	-	-
Total E-Cart	131	289	319	265	-	-
Total Three Wheelers	62,761	73,009	42,885	49,116	23,094	22,481



SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
Two Wheelers						
A : Scooters : Wheel size is less than or equal to 12"						
A1: Engine capacity less than or equal to 75 CC						
Piaggio Vehicles Pvt Ltd (SXR 50)	576	909	-	-	576	909
Total A1	576	909	-	-	576	909
A2: Engine capacity >75 CC but less than or equal to 90 CC						
TVS Motor Company Ltd (Pep +)	-	-	2,136	-	-	-
Total A2	-	-	2,136	-	-	-
A3: Engine capacity >90 CC but less than or equal to 125 CC						
Hero MotoCorp Ltd (Hero Destni 125, Maestro, Pleasure, Xoom)	27,099	27,182	25,024	28,832	1,893	5,329
Honda Motorcycle & Scooter India Pvt Ltd (Activa, Aviator, Dio, Dio 125, G)	2,56,914	2,79,399	2,46,016	2,83,482	18,798	36,374
India Yamaha Motor Pvt Ltd (Fascino, Ray)	16,863	28,100	16,245	22,879	1,708	7,736
Piaggio Vehicles Pvt Ltd (Aprilia, Vespa)	3,252	2,489	2,458	2,514	247	682
Suzuki Motorcycle India Pvt Ltd (Access, Avenis, Burgman)	74,948	92,125	66,694	86,106	13,716	2,694
TVS Motor Company Ltd (Jupiter, Ntorq, Wego, Zest)	97,522	1,18,271	87,231	1,15,626	11,902	11,097
Total A3	4,76,598	5,47,566	4,43,668	5,39,439	48,264	63,912
A4 : Engine capacity >125 CC but less than or equal to 150 CC						
Piaggio Vehicles Pvt Ltd (Aprilia, Vespa)	797	440	202	93	514	292
Total A4	797	440	202	93	514	292
A5 : Engine capacity >150 CC but less than or equal to 200 CC						
India Yamaha Motor Pvt Ltd (Aerox)	-	1,630	-	1,902	-	30
Piaggio Vehicles Pvt Ltd (Aprilia)	653	308	330	278	109	1
Total A5	653	1,938	330	2,180	109	31
AE1: Upto 250 W Electric						
Chetak Technology Ltd (Yulu Ver 3.0x)	373	-	138	-	-	-
Okinawa Autotech Pvt. Ltd (Lite, R-30)	-	-	13	1	-	-
Total AE1	373	-	151	1	-	-
AE2: More than 250 W Electric						
Ather Energy Pvt. Ltd (450 Apex, 450S, 450X)	7,185	10,124	6,746	8,850	-	40
Bajaj Auto Ltd (Chetak)	4,375	12,694	4,546	11,121	72	-
Hero MotoCorp Ltd (Vida)	421	3,296	360	2,880	-	-
Okinawa Autotech Pvt. Ltd (Okhi 90, Praise Pro, Ridge 100)	-	-	23	-	-	-
TVS Motor Company Ltd (BMW EV, TVS iQube Electric)	5,218	17,727	6,227	16,713	-	690
Total AE2	17,199	43,841	17,902	39,564	72	730
Total Scooters	4,96,196	5,94,694	4,64,389	5,81,277	49,535	65,874

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
B : Motorcycles: Big wheel size – more than 12"						
B2: Engine Capacity >75 CC but less than equal to 110 CC						
Bajaj Auto Ltd (Boxer, CT, Discover, Platina)	73,127	64,185	50,987	50,925	44,224	36,375
Hero MotoCorp Ltd (HF Deluxe, Passion, Splendor)	3,49,177	4,10,899	3,12,864	4,21,163	5,378	5,227
Honda Motorcycle & Scooter India Pvt Ltd (CB Twister, Dream, Livo, Shin)	3,786	40,935	-	35,403	4,592	6,903
India Yamaha Motor Pvt Ltd (Saluto RX)	5,985	5,622	-	-	3,360	3,492
TVS Motor Company Ltd (Radeon, Sport, Star City)	44,620	38,783	32,474	28,016	14,770	18,714
Total B2	4,76,695	5,60,424	3,96,325	5,35,507	72,324	70,711
B3: Engine Capacity >110 CC but less than equal to 125 CC						
Bajaj Auto Ltd (Boxer, CT, Discover, Husqvarna, KTM, Platina, Pulsar)	1,02,261	1,15,424	81,270	88,075	18,826	31,442
Hero MotoCorp Ltd (Glamour, Splendor, Xtreme 125R)	49,565	54,306	46,723	53,874	648	2,068
Honda Motorcycle & Scooter India Pvt Ltd (CB Shine, Shine)	91,862	1,23,401	89,261	1,21,338	2,741	4,462
India Yamaha Motor Pvt Ltd (Saluto)	4,405	2,690	-	-	3,306	194
Suzuki Motorcycle India Pvt Ltd (Hayate)	180	120	-	-	260	240
TVS Motor Company Ltd (Raider, Star City 125, Victor)	60,628	83,758	31,491	51,098	28,374	32,378
Total B3	3,08,901	3,79,699	2,48,745	3,14,385	54,155	70,784
B4: Engine Capacity >125 CC but less than equal to 150 CC						
Bajaj Auto Ltd (Boxer, CT 150, Pulsar)	25,311	40,350	16,881	30,608	11,478	16,634
Hero MotoCorp Ltd (Hunk)	1,452	3,813	-	-	1,501	4,766
Honda Motorcycle & Scooter India Pvt Ltd (CB Unicorn 150)	64	-	-	-	56	-
India Yamaha Motor Pvt Ltd (FZ, SZ)	24,442	18,666	20,931	13,778	5,256	7,618
Total B4	51,269	62,829	37,812	44,386	18,291	29,018
B5: Engine Capacity >150 CC but less than equal to 200 CC						
Bajaj Auto Ltd (Avenger, Husqvarna, KTM, Pulsar)	37,692	41,681	23,657	24,598	17,764	21,944
Hero MotoCorp Ltd (Xpulse 200, Xtreme)	3,052	5,137	1,202	3,379	503	2,178
Honda Motorcycle & Scooter India Pvt Ltd (CB 200X, CB Hornet 160R, C)	3,744	45,097	-	37,155	5,064	8,484
India Kawasaki Motors Pvt Ltd (W175)	-	19	143	158	-	-
India Yamaha Motor Pvt Ltd (MT 15, R15)	16,718	24,972	15,763	24,505	1,974	840
Suzuki Motorcycle India Pvt Ltd (Gixxer, Intruder)	8,565	10,890	508	1,405	5,942	7,432
TVS Motor Company Ltd (Apache)	39,460	46,823	38,148	45,520	5,292	8,107
Total B5	1,09,231	1,74,619	79,421	1,36,720	36,539	48,985



Statistics

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
B6: Engine Capacity >200 CC but less than equal to 250 CC						
Bajaj Auto Ltd (Avenger, Dominar, Husqvarna, KTM, Pulsar)	6,633	14,806	2,694	8,162	4,829	7,342
Hero MotoCorp Ltd (Karizma)	-	1,948	-	947	-	720
India Yamaha Motor Pvt Ltd (FZ25)	1,126	618	-	-	1,042	594
Suzuki Motorcycle India Pvt Ltd (Gixxer 250, V-Strom SX)	3,212	2,401	-	503	1,554	944
TVS Motor Company Ltd (Ronin)	-	2,016	-	2,130	-	172
Total B6	10,971	21,789	2,694	11,742	7,425	9,772
B7: Engine Capacity >250 CC but less than equal to 350 CC						
Honda Motorcycle & Scooter India Pvt Ltd (CB 350, CB300F, CB300R, H)	6,553	4,538	3,013	3,618	5,207	4,677
India Kawasaki Motors Pvt Ltd (KLX300R, Ninja300)	-	1	125	39	-	-
India Yamaha Motor Pvt Ltd (R3)	-	-	-	34	-	-
Royal-Enfield (Unit of Eicher Motors) (Bullet 350, Bullet Electra, Classic)	63,430	67,345	62,356	68,959	2,372	3,907
TVS Motor Company Ltd (BMW, RR 310)	2,553	2,910	324	422	1,492	1,553
Total B7	72,536	74,794	65,818	73,072	9,071	10,137
B8: Engine Capacity >350 CC but less than equal to 500 CC						
Bajaj Auto Ltd (Dominar, Husqvarna, KTM, Triumph)	8,439	11,439	1,655	3,461	8,964	11,102
Hero MotoCorp Ltd (HD X440, Mavrick 440)	-	2,031	-	2,202	-	1
Honda Motorcycle & Scooter India Pvt Ltd (CB 500)	-	35	-	35	-	-
India Kawasaki Motors Pvt Ltd (Eliminator, Ninja 400, Ninja 500, Ninja ZX)	-	-	5	30	-	-
Piaggio Vehicles Pvt Ltd (RS)	-	1,365	-	231	-	1,136
Royal-Enfield (Unit of Eicher Motors) (Himalayan)	4,194	4,702	3,521	2,917	767	1,500
Total B8	12,633	19,572	5,181	8,876	9,731	13,739
B9: Engine Capacity >500 CC but less than equal to 800 CC						
Honda Motorcycle & Scooter India Pvt Ltd (XL750)	-	15	-	15	-	-
India Kawasaki Motors Pvt Ltd (Ninja650, Versys 650, Vulcan S, Z650, Z6)	80	-	64	37	-	-
Royal-Enfield (Unit of Eicher Motors) (650 Twin, Super Meteor)	3,390	4,169	3,004	3,162	1,116	1,425
Suzuki Motorcycle India Pvt Ltd (DL800DE)	-	-	-	21	-	-
Triumph Motorcycles India Pvt Ltd (Street Triple, Tiger 660, Trident)	-	43	-	43	-	-
Total B9	3,470	4,227	3,068	3,278	1,116	1,425

SIAM						
Sub-segment & Company wise Production, Domestic Sales & Exports Report for the month of April 2024						
						Report IV
						(Number of Vehicles)
Category	Production	Domestic Sales		Exports		
Segment/Subsegment	April	April		April		
Manufacturer	2023	2024	2023	2024	2023	2024
B10: Engine Capacity >800 CC but less than equal to 1000 CC						
India Kawasaki Motors Pvt Ltd (Ninja ZX-10R, Z900)	-	52	57	87	-	-
Triumph Motorcycles India Pvt Ltd (Speed Twin, Tiger 900)	34	-	42	66	-	-
Total B10	34	52	99	153	-	-
B11: Engine Capacity >1000 CC but less than equal to 1600 CC						
Hero MotoCorp Ltd (Nightster, Pan America, Sportster S)	-	-	6	8	-	-
India Kawasaki Motors Pvt Ltd (Ninja1000, Versys 1000)	-	-	22	-	-	-
Piaggio Vehicles Pvt Ltd (RSV4 Factory)	-	-	-	1	-	-
Suzuki Motorcycle India Pvt Ltd (Hayabusa)	31	58	57	32	-	-
Triumph Motorcycles India Pvt Ltd (Boneville T120, Speed Twin, Tiger 1)	-	-	16	4	-	-
Total B11	31	58	101	45	-	-
B12: Engine Capacity >1600 CC						
Hero MotoCorp Ltd (Fat Bob, Fat Boy 114, Heritage Classic, Road Glide)	-	-	5	11	-	-
Triumph Motorcycles India Pvt Ltd (Rocket III)	-	-	5	17	-	-
Total B12	-	-	10	28	-	-
Total Motorcycles	10,45,771	12,98,063	8,39,274	11,28,192	2,08,652	2,54,571
C: Moped: More than 75 CC to 100 CC and with fixed transmission Ratio, Big wheel size - more than 12"						
C1: Engine capacity less than or equal 100 CC						
TVS Motor Company Ltd (TVS XL)	36,435	40,229	34,925	41,924	-	432
Total Mopeds	36,435	40,229	34,925	41,924	-	432
Total Two Wheelers	15,78,402	19,32,986	13,38,588	17,51,393	2,58,187	3,20,877
Quadricycle						
Bajaj Auto Ltd (Qute)	314	756	61	19	296	664
Total Quadricycle	314	756	61	19	296	664
Grand Total	19,57,640	23,58,041	16,65,805	20,88,274	3,22,517	3,93,585

Society of Indian Automobile Manufacturers (14/05/2024)

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