

Al isn't new to us; it's been supercharged with GenAI!

Mohit Kapoor, Mahindra and Mahindra's group CTO, reflects on the Group's Al journey and more in an exclusive interview.

By Jatinder Singh | jatinder.singh@9dot9.in

Digital integration has become a pivotal factor in elevating organizational customer experiences. Recognizing this early on, Mahindra and Mahindra have become a standout among conglomerates. Leading this charge is Mohit Kapoor, Group CTO, Mahindra and Mahindra who is driving the group's ambitious digital transformation agenda. Mohit collaborates closely with various business units in his role, harnessing emerging technologies to innovate business models and enhance customer experiences across the company's extensive and diverse portfolio.

Mohit occupies a prominent position on the Group Executive Board and serves as a Director on the boards of Mahindra Intertrade Limited and Bristlecone Limited. Beyond his Mahindra responsibilities, he chairs the AI & Digital Tech Committee at the Federation of Indian Chambers of Commerce & Industry (FICCI). His leadership and foresight are pivotal in advancing Mahindra and Mahindra's digital integration efforts, placing the company at the forefront of industry innovation and customercentricity.

In an exclusive conversation with Jatinder Singh, Executive Editor of CIO&Leader. Mohit delves into the group's Al journey, the transformative impact of technology on its operations, and the future roadmap. Here are the excerpts from the discussion.

CIO&Leader: How has technology evolved in the last 25 years, and what significant impact has it had?

Mohit Kapoor: Technology was relegated to the back office twenty years ago. A decade later, it had advanced to the middle office. Today, it occupies the front office as the nucleus of growth, innovation, and customer engagement. Technology now shapes product and service strategies, firmly establishing itself as a critical business enabler.

Many of the top 50 companies worldwide are either technology leaders or avid technology adopters. Companies like Amazon exemplify this trend, operating not just as logistics or online retail giants but fundamentally as technology enterprises. We are experiencing a similar evolution at Mahindra Group, positioning ourselves as much a technology company as any in the industry.

CIO&Leader: What strategic tech areas do Mahindra and Mahindra (M&M) prioritize for success?

Mohit Kapoor: At Mahindra Group, we have implemented a four-pronged strategy to steer our technological transformation:

1. Customer Journey Transformation: Our primary focus is on enhancing the customer journey, aiming to create seamless, instantaneous, and enjoyable experiences that are both predictable and satisfying, regardless of whether the products are digital or physical.

- 2. Advanced Analytics and AI: We prioritize using artificial intelligence, including generative AI and machine learning, to refine our predictive capabilities and elevate customer value and experience
- 3. Cloud Innovation: We emphasize innovation through cloud-based technologies to accelerate our processes and service delivery.
- 4. Digital Trust: Ensuring digital trust is paramount. This includes robust cybersecurity measures and stringent data privacy protocols to protect our customers and operations.

The Mahindra Digital engine aims to integrate these four elements in a complementary manner, directly supporting business scalability in a highly customer-centric manner. This approach helps us differentiate ourselves from the market by offering a unique value proposition. Even products like the Thar and XUV 700, launched two to three years ago, are highly technology-enabled. Therefore, a digital engine is powered by how we sell, engage with customers, conduct business, plan, execute, and maintain the customer journey. This approach integrates various capabilities and serves as a talent magnet, attracting individuals from tech industries and sectors that have embraced technology. such as banking. This strategic move helps future-proof Mahindra Group by attracting top talent, developing key capabilities, and fostering rapid innovation.

CIO&Leader: What is your perspective on the future of AI, and how is M&M integrating AI into its operations?

Mohit Kapoor: Al has been on a fast track for Mahindra Group since the beginning of the decade. Al isn't new to us; it has been supercharged in the last year with generative AI (Gen AI), allowing tasks that once required extensive coding to be completed more efficiently using these models. This technology aligns closely with human thinking, enhancing Al's effectiveness. We took an early bet and began developing our Gen Al strategy in January 2023. However, we are mindful of associated risks such as data confidentiality, copyright infringement, and errors in AI decisionmaking (hallucination).

To manage these risks, we've developed a controlled model, leading to the birth of Mahindra Al. Mahindra Al is a private cloud container with an underlying model garden where all the prevalent, popular models are available. The platform is designed to be used for internal use cases, where you can put in Mahindra-specific documents and analyze them, summarize them, infer on them, make a visual report of them, and develop lots of outcomes which take a lot of research to do internally and externally. This platform has been instrumental in turbocharging and fast-tracking many of our outcomes, benefiting areas such as customer service, sales and marketing, technical use cases, technology, and analytics and analysis. In the end. it's all about the customer.

This benefit has to translate to the customer in terms of product value and better service. So, this is an up-andcoming technology. As far as we can contain the risk and manage the outcomes by the proper design and testing, which is what we have been doing in Al, it can be a promising leverage for most companies.

CIO&Leader: How does AI impact Mahindra's tractor and farm machinery business?

Mohit Kapoor: We are a large tractor

How Mahindra & Mahindra is leveraging AI a glance

The diversified conglomerate has a robust global presence across over 100 countries. Here are a few initiatives taken by M&M that harness AI to drive rapid innovation, achieve scalable growth, and consistently deliver exceptional user experiences.

Enhancing customer experience and product innovation with Al Mahindra Group is revolutionizing customer journeys by integrating AI to provide hyper-personalized experiences, demonstrating its commitment to enhancing customer value. For instance, the XUV700 launched nearly three years ago, was among the first cars in its segment to feature level-two autonomy. This Al-powered feature allows the vehicle to anticipate and react to potential hazards, significantly improving safety and the driving experience.

Mahindra Al

Mahindra Al, a cutting-edge private cloud-based platform, is transforming all Mahindra & Mahindra businesses by turbocharging their generative AI and co-pilot use cases using company data that remains within the organization's boundaries. This ensures that responses are tailored to the context of the domains in which Mahindra operates.

Responsible AI at Mahindra

Mahindra's AI platform supports internal use cases, allowing the analysis of Mahindra-specific documents, summarizing them, and generating visual reports without compromising data privacy. Significant precautions are taken to ensure the responsible use of Al, including training on enterprise data and reinforcement learning from human feedback to minimize biases.

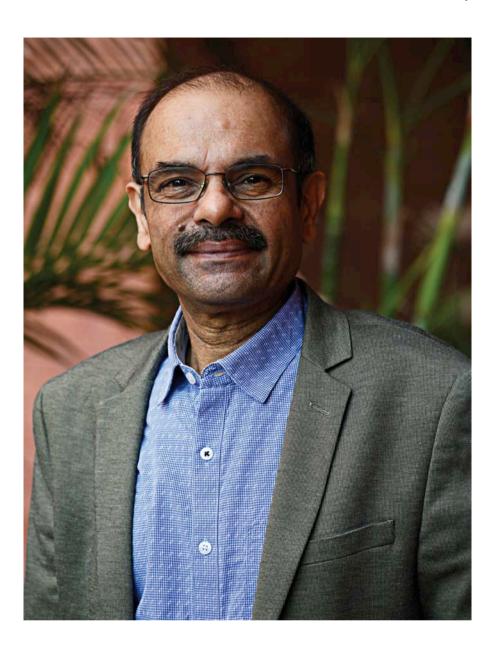
Digital human and conversational Al

Mahindra is developing advanced conversational AI technologies. The Digital Human, equipped with natural language processing (NLP) and generative AI capabilities, is designed to emulate humanlike conversations. This technology aims to enhance customer interactions by providing more natural and engaging conversational experiences. The Digital Human can understand and respond to complex queries, learn from interactions, and adapt its responses to individual users, making it a powerful tool for improving customer service.

Al in financial services

Mahindra Finance, a leading financer for semi-urban and rural areas, is committed to responsible lending. They use AI and GenAI to provide tailored financial products, supporting farmers and rural customers in improving their livelihoods. These technologies help analyze customer data to ensure the right financial solutions are offered.

"We took an early bet and began developing our **Gen Al strategy** in January 2023. However, we are mindful of associated risks such as data confidentiality, copyright infringement, and errors in Al decision-making (hallucination)."



manufacturer and farm machinery, making our tractors more intelligent and more IoT powered, bringing together weather data and soil data and bringing together predictability in terms of advice. So, two years ago, we launched an Al-powered platform called Krishi, which Farmers love to subscribe to, where they can get customized, hyperpersonal advice for their farm, what they grow, and how they can become better. Al has a significant role in the tractors, around the tractors, the livelihood of the farmers, and equally for finance. It has enabled us to provide farmers with realtime, personalized advice, improving

their productivity and profitability.

If you are aware, Mahindra Finance is a leading financier for semi-urban and rural, and we take pride in being able to help the farmers improve their livelihoods. And in that as well, lots of use of Al and geniuses there for us to be able to lend responsibly so that we can help the farmer with the credit line, so that they can increase their crop and you know, grow more, grow more, and earn more, that's our intent. You will slowly see the pervasiveness of AI, front-facing, facing the customer and the farmer, and front-to-back, equally, and we are very well on the journey.