

# INTRODUCTION

Additive manufacturing (AM) or 3D printing is being adopted by many industries as it helps in bringing innovative products to market at lower cost and with speed. With the synergy of digital technologies and Industry 4.0, AM is impacting the entire spectrum of enterprises activities from conceptualization to manufacturing. Since 2015, it has been observed that many Indian organisations such as aeronautical, automotive, defense, energy, medical, manufacturing and tooling sectors set up dedicated AM departments and the number of projects handled by them is growing annually. Satellites of ISRO, electric vehicles of automotive industries, medical devices of bioengineering groups, reengineered tools of manufacturing units, RF feeders of electronic companies and monolithic drones of armed forces are some of the Indian case studies that showcase versatile use of AM. Commercial application of AM been playing a big role in our day-to-day operations due to quick and very easy customization to customer needs.

Keeping this in view, IMTMA is organizing an exclusive 3-Days Hands-on workshop on Additive Manufacturing (3D Printing) Technology. This helps Designers and Manufacturing engineers to get Very good understanding of Additive Manufacturing Technology and industry applications. Trained engineers will be able to deploy AM technology for right applications in their industry.

# FOCUS AREAS

- Introduction and Technology Landscape
- Benefits of Additive Manufacturing
- AM Processes Technology Overview, Classification of Processes
- AM Materials Metals & Plastics
- Applications of AM Real-world examples across the industry
- CAD for AM and Pre-Processing of models
- Design for AM DFAM approach and different design techniques which AM enables.
- Post Processing To ensure part strength and integrity, surface quality, dimensional accuracy
- Market Scenario Global and India
- Challenges of Additive Manufacturing
- Supply Chain for AM
- Mini Project Design of 3D models for printing
- Visit to Additive Manufacturing Labs and Live demo Polymers and Metals

# **KEY TAKE AWAYS**

- Understand today's Manufacturing and Design Challenges
- Additive and Conventional Manufacturing to complement each other address the Industry Challenges
- Leverage the AM technology to design Innovative and more energy efficient products
- Deploy AM technology to bring speed in product development
- Leverage AM technology to bring speed in bringing Innovative products to market.

# **PARTICIPATION FEE**

Rs. 13500/-

+18% GST IMTMA Members/ Micro Companies/ Individuals/ **Educational Institutions / Students/ IMTMA Non Members/ Others** 

USD 540/-**Overseas Participants** 

Group Concession : 10% for 3 to 5 and 20% for 6 and more delegates being nominated from the same company

# FACULTY

This programme will be conducted by Mr. Vaman Kulkarni and Mr. Venkataraman K.

Vaman Kulkarni - one of the pioneer to deploy AM technology in the country very effectively for last 10 Years. Industry recognizes him as AM expert and has been the chair person for several AM conferences / Workshops. He is Review panel of MHI, Mentor with AMTDC, IIT Chennai. He also has been working with Industry and Educational Institutions to provide Additive Manufacturing Training to the Leaders, managers, Engineers, Faculty and Students. He worked for 14 Years with Honeywell Technology Solutions as Director and worked for 21 Years with DRDO as Group Director

Venkataraman K- Management Expert, author of international best seller, has over 35 years' experience in engineering companies of repute such as BEL, MICO Bosch, Godrej GE appliances, CEAT tyres etc. He has been a consultant to the Aerospace and Space industry for over 25 years and has deployed over 1000 engineers on high technology projects in these domains. He has been a training expert and has

trained over 30000 professionals in various management domains.

## For Registration Contact

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### **Contact Address**

### INDIAN MACHINE TOOL MANUFACTURERS' ASSOCIATION

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REGISTRATION : Prior registration for participation is necessary. Number of participants is limited and will be accepted on 'First Come First Serve' basis. A Certificate of

participation will be issued to participants.
Important Information : Participation fee includes, course material, working lunch and tea / coffee. Interested companies are requested to register online by clicking on 'REGISTER' button and by filling up the nomination authority and participant's details in specified form.