



Powder Metallurgy Association of India (PMAI)
www.pmai.in



“HEAT TREATMENT OF PM PARTS”

8th-9th Dec 23

The Powder Metallurgy Association of India (PMAI) is conducting a Two-day course on “Heat Treatment of PM parts” in hybrid mode(Physical + online at same time) in collaboration with Dept. of Metallurgy and Materials Science, COEP Technological University (Unitary Public University of Govt. of Maharashtra) Pune. The course presents a technology overview for new and prospective entrants to the PM. Those who desire to attend and interact with faculties in person can do so by reaching the Board Room at Dept. of Metallurgy and Materials Science, COEP Technological University, Shivajinagar, Pune. Participants attending online will be provided the course link a day in advance to join the course. Registration for the course may be done by visiting our website www.pmai.in or by writing email to director@pmai.in

PROGRAM SCHEDULE

Time	DAY 1 (8 th Dec, 2023)	DAY 2 (9 th Dec, 2023)
10:00-12:00	SPEAKER: N. L. CHANDRACHUD Introduction to Powder Metallurgy (Brief description of PM Process to understand the presence of pores and it's relation to the post sinter treatments like electro plating, heat treatment, welding etc.)	SPEAKER: N. B. DHOKEY Heat treatment of tool steels; Hardening and salt bath treatment; multiple tempering; microstructure and hardness, applications to dies and tooling.
12:00-12:15	TEA BREAK	
12:15-13:15	SPEAKER: N. L. CHANDRACHUD Why heat treatment? Improvement in static and dynamic strength, relevance to microstructure Property measurement of PM parts– Understanding microstructures.	SPEAKER: S. MENAVLIKAR Furnace in relation to the thermal processing of metals, Batch type furnaces and continuous furnaces, Type of commonly used furnaces today for heat treatment and the details.
13:15-14:15	LUNCH BREAK	
14:15-16:15	SPEAKER: N. L. CHANDRACHUD Theory of Quenching – Quenchants for PM Parts - Oils and polymers – Quench speed measurements; Types of heat treatments and their objectives mainly related to PM parts – Quench and temper.	SPEAKER: S. MENAVLIKAR Furnace protective atmospheres, Generation of atmosphere in furnace, Furnace instrumental and manual controls, Cryogenic treatments (Tool steels and high alloy PM parts).
16:15-16:45	(Q and A Session)	(QA and Closing Session)

Registration Fees : 5000/-
Registration details Name, Designation, Organization, Phone, and Email along with Proforma tax invoice of payment details must send to director@pmai.in

All communication may address to
director@pmai.in,
Unit 401, K Square, P.K. Shroff Road,
Near Union Bank, Baner,Pune - 411045, India

SPEAKERS		
 Mr. N. L. Chandrachud <ul style="list-style-type: none">BEMetallurgy from COEP Pune in 1974 and M.Tech Metallurgical Engineering from IIT Bombay in1976Senior Scientific Officer at DMRL, Hyderabad for about 2yearsManager- Metallurgy for about 16 years at Telco (Tata Motors) PuneGeneral Manager- Materials Engineering at Cummins India, Pune for about 10 yearExecutive Vice President at GKN Sinter Metals, Pune for about 12 yearsAt present- Consultant to GKN-Hoeganaes Corporation, USAPast Vice President of PMAI and Fellow PMAIAt present Member - Governing Council, PMAI	 Mr. Sandeep Menavlikar <ul style="list-style-type: none">Total 32+ years of rich experience in Heat treatment manufacturing, Customer & Supplier Relationship Management Quality Control; Process Improvement, New Product Development /CRM,catering to all OEMs industry in India and abroad.Expertise in using PPAP, Poka-Yoke, Kaizen, Why-Why Analysis, CAPA Tools at supplier end for NPD; source change while adhering to TS16949 standards; structured processes /internal control plans for manufacturing operations.Proven acumen in implementing CQI-9standard; procedures; catering to all OEMs industry in India and abroad.Expertise in managing various operations involving resource planning, materials planning, Lab inspection, team building and co-ordination with the internal departments.	 Dr. N B Dhokey <ul style="list-style-type: none">Professor, Metallurgy & Material Science Dept, COEP Tech Pune.Vice President of PMAI and Fellow PMAIPublished more than 100 research articles in reputed national journals and international journals. He also published 4 patents and 2 book chapters.