



**NANYANG  
TECHNOLOGICAL  
UNIVERSITY**  
SINGAPORE

College of Professional and  
Continuing Education

# Specialist Certificate

in Manufacturing Engineering



# SPECIALIST CERTIFICATES

Specialist certificates enable working adults to update their knowledge and upgrade their skills required in key growth sectors to keep pace with the fast-changing economy. Each specialist certificate comprises of modules which are taken from the Undergraduate Full Degree Programme in key growth sectors including manufacturing engineering. These modular courses can also be taken individually and each course lasts for one semester of 13 weeks.

Each course is credit bearing and can be stackable to the relevant degree. There will be continuous assessments during course period and a final exam at the end of the course which contribute to a final grade. The maximum candidature period for earning a Specialist Certificate is 3 years from the first enrolled Specialist Certificate course under the specific certificate. A certificate will be awarded to the successful participants upon completion of courses.

## Specialist Certificate in MANUFACTURING ENGINEERING

### LEARNING OBJECTIVES

- Understanding fundamental principles, theory, quality issues and applications, dimension and surface measurement.
- Understanding the importance of the competing types of measurement which can be taken as well as the instrumentation used and its relevance to product design.
- To delineate the concepts, theories, and applications of manufacturing systems and operations management.

### PROGRAMME STRUCTURE

This Specialist Certificate comprises of the following 3 modules (*Modules can be taken individually*):

1. [MA2004 Manufacturing Processes\\*](#)
2. [MA4842 Engineering Metrology\\*](#)
3. [MA4853 Manufacturing Systems](#)

### ADMISSION CRITERIA

- At least 21 years of age
- Have 2 years of full-time work experience, or have fully discharged full-time NS liability, or are currently employed on a full-time basis
- Degree in Engineering/Science or Polytechnic Diploma with relevant working experience
- Selective module(s) require relevant prerequisite modules or can be substituted with relevant work/industry experience

### WHO SHOULD ATTEND

- Manufacturing Engineer, Production Engineer, Process Engineer, Product and Design Engineer, Material Engineer, Logistics and Supply Chain Engineer

### FEES AND SUBSIDIES

- Total course fee of around S\$4,100 before any applicable subsidy
- MOE Skills-based Modular fee subsidy
- Additional 60% fee subsidy under SkillsFuture Mid-Career Enhanced Subsidy (MCES)
- \*e2i fee subsidy
- Up to S\$250 course fee subsidy under NTUC UTAP

**Log on to [www.copace.ntu.edu.sg](http://www.copace.ntu.edu.sg) to apply**

### Applications for Specialist Certificates are open all year round

Academic Semester 1: August to December  
(Process in May)

Academic Semester 2: January to May  
(Process in October)