# School of Mechanical & Aerospace Engineering

# MSc Supply Chain Engineering

### **Overview**

The supply chain industry is one of the key sectors driving the development of Singapore as a critical hub in the global supply chains. The MSc in Supply Chain Engineering addresses the needs of both manufacturing and service sectors with an integrated and comprehensive programme in supply chain engineering functions such as inventory management, order fulfilment, procurement, distribution, warehousing, and transportation, equipping graduates with the right set of skills to manage end-to-end supply chains. The programme relies extensively on industry speakers, site visits, case studies and hands-on computer modelling and game plays to supplement in-class learning.

### Who should apply

The programme caters to both full-time and part-time students who are seeking employment or advancing their career in supply chain engineering related roles that include procurement, order fulfilment, operations planning, scheduling, distribution, inventory management.

Previous graduates of the programme have found jobs and advanced their careers in a wide range of industry sectors including *Manufacturing*, *FMCG*, *E-commerce*, *Electronics*, *Semiconductors*, *Building and Construction*, *Pharmaceutical*, *Healthcare*, *Aerospace*, *Defence*, *Marine*, *Oil and Gas*.

## **PROGRAMME STRUCTURE**

**Option 1: Coursework Only (Default Option)** 10 Courses 4 Core & 6 Electives

### **Option 2: Coursework and Dissertation**

8 Courses + Dissertation 4 Core & 4 Electives

## **DURATION OF THE PROGRAMME**

### Part-Time Study

Minimum Candidature: 2 years (4 semesters) Maximum Candidature: 4 years (8 semesters)

### Full-Time Study

Minimum Candidature: 1 year (2 semesters) Maximum Candidature: 2 years (4 semesters)

### **CORE COURSES**

MA6701: Quantitative Methods for Operations Analysis MA6702: Corporate Resource Planning MA6703: Supply Chain Inventory Planning MA6704: Management of Logistics Functions

## **ELECTIVE COURSES**

Students are to select at least 2 electives from each basket (Analytical, Functional)

#### Analytical Electives (Select at least 2)

MA6514: Machine Learning and Data Science MA6715: System Simulation & Modeling MA6731: System Reliability & Risk Analysis MA6741: Quality Engineering

### Functional Electives (Select at least 2)

MA6712: Procurement & Supplier Development MA6713: Advanced Topics in Supply Chain Management MA6714: Specialised Logistics Operations (tbc)

# QUOTE

# "

The learning experience here integrates greatly with industrial trends. I appreciated the meaningful group assignments to practise what we learn. This programme enabled my career progression and facilitated networking opportunities with classmates.



Chen Yanzhen (Class of 2022)

# "

My career developed after I graduated from the MSc Supply Chain programme at NTU. I love all the professors, they are very open to any questions and discussions, even outside the class. Especially if you take the dissertation option, you can explore more supply chain research and case studies. Also, with the diversity of the students, we had active discussions exchanging different points of view.



Dwiastuti Cahyaningrum (Class of 2022)

#### Learn more



## **PROGRAMME DIRECTOR**

Assoc Prof Rajesh Piplani Email: mae.msc@ntu.edu.sg