# HONG KONG IGDS - MSC MODULE OUTLINE

| Subject Title                                  | Transport Techniques and Management (TTM)  |                           |
|--|--|---------------------------|
|  | HK PolyU   | WarwickU                  |
| Subject Code                                   | ISE5766  | WM9E3-15                  |
| Credit Value                                   | 3  | 15                        |
| Level  | Level 5  | Taught Postgraduate Level |
| Pre-requisite/ Co-<br>requisite/Exclusion      | None but some preliminary reading of transport techniques and management would be beneficial.  |                           |
| Introduction                                   | The Transport Techniques and Management module explores the integration of freight transportation in logistics & supply chain management through the different freight transport modes, operations, technologies and the environment. The module is delivered through lectures, discussions, case studies, simulation exercises and industry exposure. Freight transportation management, plays a critical role in the world as it enables the movement of materials and products between suppliers and customers. It facilitates local and international trade, while employing millions of people globally. While there are many complexities in freight transportation, it is vital that it is managed in a sustainable manner. |                           |
| Objectives                                     | <ul> <li>No 1 To develop in learners the ability to evaluate different freight transport modes and decide on the most appropriate mode based on diverse criteria.</li> <li>No 2 To design sustainable freight transport solutions using various techniques.</li> <li>No 3 To cultivate the ability to investigate and critique freight transport operations across multiple modes.</li> <li>No 4 to evaluate the impact of freight transport on the environment and learn how to manage freight transport in a sustainable manner.</li> </ul>  |                           |
| Intended Learning Outcomes<br>(ILO's) (Note 1) | Upon completion of the subject, participants will be able to:  No 1 evaluate different freight transport modes and decide on the most appropriate mode or combination of modes based on diverse criteria.  No 2 design sustainable freight transport solutions using various transport planning and management techniques.  No 3 investigate and critique freight transport operations and systems locally, regionally and internationally.  No 4 evaluate the impact of freight transport on the environment and learn how to manage freight transport in a sustainable manner.   |                           |
| Indicative Syllabus Topics<br>(Note 2)         | No 1 Role of freight transport in logistics and supply chain management  No 2 Freight transport modes and operations  No 3 Intermodal freight transport integration  No 4 Information and communication technologies in freight transport  No 5 International freight transport and freight forwarding  No 6 Freight transport networks and planning  No 7 Sustainable freight transport management  |                           |

#### A combination of lectures and case studies are used to deliver the various topics in this module. A series of case studies are discussed in a problembased format where participants are required to apply the tools and techniques learnt to tackle difficulties and strike for a successful operations strategy. All these enhance the learning objectives and learning outcomes. Teaching/Learning Alignment between Teaching/Learning Methodologies and ILOs: Methodology Teaching/Learning **Intended Subject Learning Outcomes** (*Note 3*) Methodologies to be assessed No 1 No 2 No 3 No 4 Lecture $\sqrt{}$ $\sqrt{}$ Case studies Assessment Intended Learning Outcomes (ILO's) % Weight Methods/ No 1 No 2 No 3 Tasks No 4 1. Group Work $\sqrt{}$ $\sqrt{}$ $\sqrt{}$ 20 Presentation 2. Post Module **Assessment Methods in** $\sqrt{}$ $\sqrt{}$ Assignment 80 **Alignment with Intended** (PMA) **Learning Outcomes** (*Note 4*) Total 100 Explanation of the appropriateness of the assessment methods in assessing the intended learning outcomes: The case studies will cover main topics covered in the module which will therefore embrace all the learning outcomes. The PMA requires participants to apply what they have learnt in the module to their own work environment. These will embrace the ILO's albeit in different work situations. Class Contact: 20 Hours Lecture **Student Study Effort** Case Study 10 Hours Required Other Participant Study Effort: Private Study 120 Hours 150 Hours Total Participant Study Effort The list given to participants covers core texts mainly and embraces all the topics covered in the module. In total there are 10 references provided. **Reading List and References** They can be found in the Folder Notes given to participants at the commencement of the module.

## Note 1: Intended Learning Outcomes

Intended learning outcomes state what students should be able to do or attain upon completion of the subject. Subject outcomes are expected to contribute to the attainment of the overall programme outcomes.

### *Note 2: Subject Synopsis/ Indicative Syllabus*

The syllabus adequately addresses the intended learning outcomes. At the same time over-crowding of the syllabus has been be avoided.

<u>Note 3: Teaching/Learning Methodology</u>
This section includes a brief description of the teaching and learning methods to be employed to facilitate learning, and a justification of how the methods are aligned with the intended learning outcomes of the subject.

# Note 4: Assessment Method

This section includes the assessment method(s) used and its relative weighting, and indicates which of the subject intended learning outcomes that each method assesses. It also provides a brief explanation of the appropriateness of the assessment methods in assessing the intended learning outcomes.