

# Specialist Diploma in Quantity Surveying

## OVERVIEW

Specialist Diploma in Quantity Surveying is focus on strengthening student's knowledge and hone the necessary expertise for a competitive market in Singapore. Learner gains a detailed understanding of building production from concept to completion. This course covers all the key aspects of construction, commercial and domestics measurement as well as project estimating and tendering.

## PROGRAMME OBJECTIVES:

Communicate effectively and work well on team-based engineering projects through the knowledge in project, man and safety and health management system. The construction assembly process includes recognition of correct application of build ability, elements, components, materials, techniques, Interpretation of documentation, Understanding the performance of potential of materials and components. The use of relevant mapping/measurement system, instruments and methods to conduct data collection, analyze, synthesis and application of data to produce appropriate construction cost, schedule and material. Application of legal concepts and framework to contract management

## DURATION COMPONENTS:

Classroom Training Hours: 32 Hours Per Module

## ASSESSMENT METHODS:

70% Coursework & 30% Examination

## PROGRAMME OUTCOMES:

Upon completion of this course, the student will be able to understand and apply the process of project management (multi-disciplinary environment), the site safety management and interface with designer/architecture firm with respect to construction activities. Ability to identify, assesses, formulates and solved problem related quantity surveying issues. Ability to apply fundamental and specialized knowledge of building, civil, electrical and mechanical construction, measurement, price estimating techniques to solve quantity surveying problems; reasoning and conceptualizing construction cost, price, risk and value associated with design and construction; evaluating alternatives in the interests of added value in project construction assignments.

## AWARDING BODIES:

Global School of Technology and Management

## NUMBER OF MODULE:

8

## TOTAL CONTACT HOURS:

272

## MODULE SYNOPSIS:

### WSH201 Workplace Safety and Health Practice in Building Industry

Upon completion of this module, students will be able to explain the main health, safety and welfare legislation in the construction sector including the requirements of an effective health and safety policy along with the organizational arrangements necessary for its implementation, demonstrate an understanding of hazard and risk identification in design and construction, undertake risk assessment and formulate control measures to prevent ill health and injury and review, revise and monitor assessments as required.

### CP202 Contracts & Procurement

Upon completion of this module, students will be able to analyse the factors affecting the choice of different procurement and contractual arrangements, determine and apply current issues and best practice associated with the procurement of projects through reference to government and industry sponsored reports and recommendations, examine the roles and activities of the parties and organizations involved, analyse the forms of contract with particular reference to time, cost and quality and evaluate the forms of contract in respect of supply-chain management.

### HMBE203 Human Management in the Built Environment

Upon completion of this module, students will be able to demonstrate an awareness of the ways in which the managers of an organization can seek to ensure that the organization has sufficient competent staff to facilitate the achievement of strategic objectives in the face of a changing environment.

### ITD204 Interpret Technical Drawing

This module is focus on appreciation the use of techniques, drawing skills and modern engineering tools to design and configure drawing. Students will be able to read and understand data required from the drawing, specification in order to complete the material and cost of construction and to identify troubleshoot and solve engineering drawing relate to site configuration and site communication skills based on the drawing and specification.

### CCC205 Construction Cost Control

In this module, students will learn the importance of pre-contract planning, requirements of specific contracts and plan accordingly so as to establish and maintain a functional and profitable construction site and contract undertaking, so as to fulfil the underlying intent from top management, develop feasible site control strategies, and to ensure that contracts are delivered with the balanced achievement of time, cost and quality in mind and appreciate, uphold and apply fundamental health and safety guidelines.

### CT206 Construction Technology

Upon completion of this module, students will be able to understand the production and construction techniques associated with innovative technologies, understand how innovation and sustainability may affect the life cycle of a construction project, performance of buildings and energy efficiency performance of the building services systems.

### M207 Measurement

The Measurement module is providing students with solid knowledge of measurement techniques and their application in the construction and building industry. Students will be able to undertake measurement tasks and apply mathematical calculations to the measurement process, produce measured quantities for a range of elements and components to large scale (nondomestic) structures, prepare relevant preamble and preliminary items to given situations and analyse standard method(s) of measurement and codes, produce measured bills of quantities and schedules using both manual and computer aided systems, including interim certificates and final accounts.

### ET208 Estimating and Tendering

Upon completion of this module, students will be able to describe the information required to produce a tender, apply the principles and techniques of estimating, analyse and apply methods of pricing to determine and formulate an estimate for construction operations and evaluate different tendering procedures and contractual arrangements in common use.