



Introduction

Separate sewerage systems have been adopted for Hong Kong's wastewater and stormwater since early 1900's. Wastewater collection, treatment and disposal are essential for safeguarding public health and improving water quality in inland and coastal waters due to municipal and industrial effluents.

There is inadequate coverage of wastewater collection systems (Sewerage), in comparison with wastewater treatment and disposal in the Civil and Environmental Engineering Programmes in the Universities.

Programme code	10014066
Date and time	23 Feb 2023 9:30 - 17:30 9 Mar 2023 9:30 - 17:30
Venue	Inno Network, 1/F, HKPC Building
Medium	Cantonese with English terminology
Course fee	HK\$4,800
Remarks	Participants who have fulfilled 75% attendance will be awarded an ecertificate of attendance issued by the Hong Kong Productivity Council

Course Description

This 2-day CPD Course is aimed to bridge the training gap for Civil and Environmental Engineers and Environmental Scientists. It covers gravity sewers, sewage rising mains as well as sewage pumping stations, but excludes wastewater treatment and disposal.

WHO SHOULD ATTEND?

This course is targeted at civil and environmental engineering professionals in the public and private sectors, responsible for project management, planning, investigation, design, construction, operation and management of wastewater infrastructure., which is increasingly important for sustainable development to meet social economical needs in times of Climate Change.

Supporting Organisations (In arbitrary order) -







The HK Chapter of the International Association for Hydro-Environment Engineering and Research



Training on Hong Kong's Sewerage System

Course Outline

Day 1

Lecture 1 – Sewerage System Planning

- Quantity of Sewage
- Sewer Plans & Profiles
- Ma Wan Sewerage Case Study

Lectures 2 & 3 – Gravity Sewers

- Hydraulic Design
- > Sewer Processes
- > Structural Design
- Manholes
- HATS Sewage Conveyance System

Lecture 4 - Pumps

- Wastewater Characteristics
- Pump Classification
- Screw vs Centrifugal Pumps

Day 2

Lecture 5 – Pumping Systems

- > Hydraulics of Pumping Systems
- Pump Characteristic Curves
- > Twin or Multiple Rising Mains

Lectures 6 &7 - Pumping Stations & Rising Mains

- Pumping Station Layout Options
- Wet Well Design
- Surge Analysis & Suppression for Rising Mains
- > Structural Design
- > Instrumentation
- Main Pumping Stations of HATS

Lecture 8 - Conclusions

- Ma Wan Sewerage Case Studies
- > Septicity & Odour Management
- > Sewer Inspection & Repair

TRAINER

Ir Prof. CHAN Pak-Keung taught a 2-day CPD course "Sanitary Sewers: Principles and Applications" for HKPC in July 2019, a 1-day course "An Introduction to Wastewater Treatment Plant (WWTP) Hydraulics" in August 2021 and a 2-day course "Intermediate WWTP Hydraulics" in September/October 2022.

Ir Prof. CHAN has over thirty years of experience in Civil and Environmental Engineering. He had spent sixteen years working as a Chief Engineer / Assistant Director in Drainage Services Department (DSD) amongst flood management, major wastewater engineering projects, the Research & Development initiatives of DSD as well as operation and maintenance for sewerage & drainage systems. Since 2015, Ir Prof. CHAN has been active in teaching university programmes and CPD courses.

Enrolment Method

1. Scan the QR code to complete the enrolment and payment online.

OR

2. Mail the crossed cheque with payee name "Hong Kong Productivity Council" in HK dollar and the application form should be mailed to Hong Kong Productivity Council, 2/F, HKPC Building, 78 Tat Chee Avenue, Kowloon (ATTN: Ms Mandy LAM). Please indicate the course name and course code on the envelope.



Enrol HERE