

1. Title	Design drainage systems
2. Code	EMPDDE404A
3. Range	As regards plumbing projects, master all kinds of plumbing system components and their operating principles; design drainage systems according to rules and regulations; and offer several design options for client's consideration.
4. Level	4
5. Credits	3
6. Competency	<p style="text-align: center;"><u>Performance Requirements</u></p> <p>6.1 Understand the construction of various kinds of drainage systems, the system components and their operating principles</p> <ul style="list-style-type: none"> <li>◆ Understand the construction and operating principles of various kinds of drainage systems including: <ul style="list-style-type: none"> <li>• Drainage system</li> <li>• Storm-water drainage system</li> <li>• Underground drainage system</li> </ul> </li> <li>◆ Understand the all kinds of drainage system components and their operating principles</li> </ul> <p>6.2 Design drainage systems</p> <ul style="list-style-type: none"> <li>◆ Design drainage systems (system coordination and accessory equipment) <ul style="list-style-type: none"> <li>• Be familiar with the impact of accessories and auxiliary devices on the system <ul style="list-style-type: none"> <li>▸ impact of changing accessories and auxiliary devices on the system</li> <li>▸ influence of changing and adding accessories and auxiliary devices on the system</li> </ul> </li> <li>• Run the operating procedures according to the system default</li> <li>• Adapt the changes in system load</li> <li>• Work out diversified designs flexibly</li> <li>• Master the limitation of system performance and consider the extendibility of the system</li> <li>• Use the coordination system for the best result</li> </ul> </li> </ul> <p>6.3 Professionalism in designing drainage systems</p> <ul style="list-style-type: none"> <li>◆ Work out a highly efficient system design complying with technical requirements according to legal requirements, professional code of practice and specified conditions</li> </ul>
7. Assessment Criteria	<p>The integrated outcome requirements of this unit of competency are:</p> <p>(i) Capable to master all kinds of plumbing system components and their operating principles; and</p> <p>(ii) Capable to use system coordination to design highly efficient drainage systems.</p>
8. Remarks	The credit value of this unit of competency is set on the presumption that the person already possesses design knowledge of relevant drainage systems.