

**Specification of Competency Standards**  
**for the Retail Industry**  
**Unit of Competency**

Functional Area - Website Monitoring and Testing Technology

Title	Design automatic system testing architecture
Code	107254L6
Description	In the website testing process, implement automated system testing to achieve labor cost reduction, better efficiency of resource usage and early identify potential problems including performance issues. Effective architecture and planning of automated system testing could improve the value and credibility of certification.
Level	6
Credit	6 ( For Reference Only )
Competency	<p>Performance Requirements</p> <p>1. Understand the basic concepts of automated system testing</p> <ul style="list-style-type: none"> <li>• Understand the status of software testing.</li> <li>• Identify the occasion of software testing</li> <li>• Develop software testing automation solution.</li> </ul> <p>2. Master the design and implementation of automated system testing</p> <ul style="list-style-type: none"> <li>• Identify the analytical requirements for automated system testing.</li> <li>• Develop automated systems testing areas such as automated management of software testing processes, automation of dynamic testing (eg, unit testing, functional testing, and performance testing).</li> <li>• Design automation systems testing tools or architectures.</li> <li>• Formulate the automated system testing process.</li> <li>• Evaluate the effectiveness of the automated system testing and compare the actual results with the expected results.</li> </ul> <p>3. Exhibit professionalism</p> <ul style="list-style-type: none"> <li>• Ensure that the process management automated testing comply with the specifications of the CMMI process</li> <li>• Understand the possible changes, risks and costing issues brought by the implementation of automated system testing.</li> </ul>
Assessment Criteria	<p>The integrated outcome requirement of this UoC is the ability to:</p> <ul style="list-style-type: none"> <li>• Understand the status of system testing, occasions and solution of automated system testing.</li> <li>• Master the design and implementation process of automated system testing and evaluate the effectiveness of automated system testing</li> </ul>
Remark	