

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

Functional Area - Vehicle Servicing

Title	Painting process
Code	108666L2
Range	This unit of competency is applicable in vehicle painting workshops. Practitioners should be able to carry out vehicle body painting work according to working instructions or the guidelines in the vehicle manufacturer's servicing manual and providing written report,
Level	2
Credit	3 (For Reference Only)
Competency	<p>Performance Requirements</p> <p>1. Knowledge (Painting materials and spray guns)</p> <ul style="list-style-type: none"> <li>Know the composition and characteristics of primer paint and finish paint, including waterborne paint.</li> <li>Know the characteristics and operating principles of various kinds of spray guns, including high volume low pressure (HVLP) spray guns.</li> <li>Know the content of Safety Data Sheet (SDS) with respect to paints, catalysts and dissolvent, including protective measures.</li> <li>Understand the characteristics of the materials of different work-piece and painting methods.</li> <li>Understand the painting process and the reasons for paint defects.</li> <li>Understanding of the relevant legal requirements on environment protection.</li> </ul> <p>2. Performance (Carry out painting process)</p> <ul style="list-style-type: none"> <li>Observe the condition of the workplace and should carry out painting process in the spray booth equipped with anti-pollution control device; and capable of minimizing material consumption.</li> <li>Select and use suitable tools and instruments; and apply relevant painting techniques correctly with regard to the characteristics of different spray guns.</li> <li>Operate spray booth ; infra-red car paint curer, also control the temperature and time accurately.</li> <li>Complete the painting process according to the guidelines in the vehicle manufacturer manual, the occupational safety and health as well as environmental protection ordinances and Factories and Industrial Undertakings (Spraying of Flammable liquids) Regulations.</li> <li>Conduct inspection upon completion of painting process to ensure that no paint defects and provide written report.</li> </ul>
Assessment Criteria	<p>The integrated outcome requirements of this unit of competency are that the practitioner being assessed shall prove that he/she is:</p> <ul style="list-style-type: none"> <li>Capable of selecting and adjusting spray guns and other devices according to working instructions or the guidelines in the vehicle manufacturer's servicing manual to carry out painting process; and</li> <li>Capable of conducting inspection upon completion of painting process to ensure that no paint defects and providing written report.</li> </ul>
Remark	The credits value of this unit of competency is set on the presumption that the practitioner concerned has already possessed the knowledge of how to handle chemicals and operate commonly used spraying tools and instruments.