

1. Title	Inspect, test and commission automatic train control system equipment on the train
2. Code	EMRAIT412A
3. Range	Inspect and use instruments to test automatic train control (ATC) system equipment on the train according to guidelines and standards to assure that the ATC system function properly.
4. Level	4
5. Credits	6
6. Competency	<p style="text-align: center;"><u>Performance Requirements</u></p> <p>6.1 Structure and working principles of the ATC system</p> <ul style="list-style-type: none"> ◆ Understand the structure and working principles of the ATC system ◆ Understand the functions and working principles of the ATC system equipment components on the train, including: <ul style="list-style-type: none"> • ATC electronic control unit on the train • Interface unit • Antennas • Accelerometer • Tachometer ◆ Understand the scope and standards of inspection, testing and commissioning of the ATC system equipment on the train <p>6.2 Methods and procedures of inspecting, testing and commissioning the ATC system equipment on the train</p> <ul style="list-style-type: none"> ◆ Able to read the inspection, testing and commissioning guidelines and circuit diagrams and select useful information ◆ Calculate and compile the details for testing and commissioning according to relevant information ◆ Inspect, test and commission trackside equipment according to guidelines and standards and record the data from tests ◆ Use general electronic equipment repairing and testing instruments and specialized ATC system testing instruments efficiently <p>6.3 Professionalism in inspecting, testing and commissioning the ATC system equipment on the train</p> <ul style="list-style-type: none"> ◆ Inspect, test and commission the ATC system equipment on the train according to the standards and requirements for work safety, health, environmental protection and quality management of railway works ◆ Understand the safety guidelines as required by the law and codes of practice in inspecting, testing and commissioning the ATC system equipment on the train
7. Assessment Criteria	<p>The integrated outcome requirement of this unit of competency is:</p> <p>(i) Capable to inspect, test and commission safely and efficiently a range of ATC system equipment on the train according to guidelines and standards to assure the safety of train operation, and record the data from tests.</p>
8. Remarks	The credit value of this unit of competency is set on the presumption that the person already possesses knowledge of electronics and telecommunication.