



Australian Government

**Assessment Requirements for MEA730
Apply systems engineering procedures to
airworthiness engineering design project
management**

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Modification History

Release 2. Equivalent to MEA730 Apply systems engineering procedures to airworthiness engineering design project management with amended prerequisite codes.

Performance Evidence

Evidence required to demonstrate competency in this unit must be relevant to and satisfy all of the requirements of the elements and performance criteria under the specified conditions of assessment, and must include:

- setting up and managing procedures for systems analysis and control that comply with relevant airworthiness regulations
- setting up and managing a systems engineering team
- developing and implementing procedures for identification of systems engineering process inputs
- managing, and recording the outcomes of, requirements analysis
- managing and recording the outcomes of functional analysis and allocation and apply the requirements loop process
- developing and documenting the functional baseline
- managing the development of the system specification and preliminary design
- developing and documenting the allocated baseline
- applying the design loop process
- managing the detail design process and using outputs to develop a technical data package that meets airworthiness regulatory requirements
- developing and documenting the product baseline
- maintaining oversight of the production and delivery phase
- providing process outputs for the establishment of CM procedures or ILS plans
- determining requirements for life-cycle management where CM or ILS is not required and setting up and documenting a life-cycle management system that complies with relevant airworthiness regulations.

Knowledge Evidence

Evidence required to demonstrate competency in this unit must be relevant to and satisfy all of the requirements of the elements and performance criteria and include knowledge of:

- the systems engineering process and management procedures, including relevant airworthiness regulations
- how to set up and manage the activities of a systems engineering design team
- development of specifications and standards

- identification of applicable published specifications and standards
- how to set up and manage a systems analysis and control database
- how to use process outputs to set up CM and ILS systems for through-life management
- how to develop and document an applicable life-cycle management system where CM or ILS is not prescribed or is inappropriate
- ethical considerations in systems engineering.

Assessment Conditions

- This unit may be assessed on the job, off the job or a combination of both on and off the job. Where assessment occurs off the job, that is, the candidate is not in productive work, then a simulated working environment must be used that reflects realistic workplace situations and conditions.
- The competencies covered by this unit would be demonstrated by an individual working alone or as part of a team.
- Where applicable, reasonable adjustment must be made to work environments and training situations to accommodate ethnicity, age, gender, demographics and disability.
- Assessment methods must be by direct observation of tasks and include questioning on underpinning knowledge to ensure its correct interpretation and application.
- Assessment may be applied under project-related conditions (real or simulated) and require evidence of process.
- Assessment must confirm a reasonable inference that competency is able not only to be satisfied under the particular circumstance, but is able to be transferred to other circumstances.
- Assessors must be satisfied that the candidate can competently and consistently perform all elements of the unit as specified by the criteria, including required knowledge, and be capable of applying the competency in managing the application of the systems engineering process.
- Assessment may be in conjunction with assessment of other units of competency where required.
- Assessors must satisfy the requirements of the National Vocational Education and Training Regulator (Australian Skills Quality Authority, or its successors).

Links

Companion Volume implementation guides are found in VETNet -

<https://vetnet.education.gov.au/Pages/TrainingDocs.aspx?q=ce216c9c-04d5-4b3b-9bcf-4e81d0950371>