

Australian Government

Department of Education, Employment and Workplace Relations

## LMFFT5013B Develop products and related processes

**Revision Number: 1** 



#### LMFFT5013B Develop products and related processes

## **Modification History**

Not applicable.

## **Unit Descriptor**

| • | This unit covers the competency to define requirements, to<br>confirm feasibility, to develop and trial options and to<br>analyse and report on proposed products and related<br>processes. |
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## **Application of the Unit**

| Application of the unit |  |
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## Licensing/Regulatory Information

Not applicable.

### **Pre-Requisites**

| Prerequisite units | Nil |  |  |  |
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## **Employability Skills Information**

| Employability skills | This unit contains employability skills. |
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## **Elements and Performance Criteria Pre-Content**

| Elements describe the<br>essential outcomes of a<br>unit of competency. | Performance criteria describe the performance needed to<br>demonstrate achievement of the element. Where bold<br>italicised text is used, further information is detailed in the<br>required skills and knowledge section and the range<br>statement. Assessment of performance is to be consistent<br>with the evidence guide. |
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| EI | LEMENT   | PERFORMANCE CRITERIA  |  |  |
|----|--|---|--|--|
| 1. | Assess product feasibility                                     | 1.1.Provisional specifications are identified and<br>interpreted, in consultation with others, where<br>required                        |  |  |
|    |  | 1.2. Provisional specifications are subject to feasibility modelling and analysis   |  |  |
|    |  | 1.3.Recommendations from the feasibility study are processed  |  |  |
| 2. | Participate in<br>developing/engineerin<br>g prototype product | 2.1. Product or process specifications are interpreted<br>and/or preliminary specifications are developed<br>from the feasibility study |  |  |
|    |  | 2.2. Specifications are used to develop or engineer the prototype product   |  |  |
|    |  | 2.3. Results are analysed and decisions to move to a trial are confirmed  |  |  |
| 3. | Conduct trials   | 3.1. Trial procedures/parameters are established and recorded   |  |  |
|    |  | 3.2. Organisation and liaison issues with production areas are resolved   |  |  |
|    |  | 3.3. Raw materials are checked or selected and<br>machines and skill availability allocated against<br>requirements                     |  |  |
|    |  | 3.4. Trials are carried out in accordance with the established procedures   |  |  |
| 4. | Analyse, interpret and report results                          | 4.1.Results of the trials are analysed to determine performance and acceptability for production  |  |  |
|    |  | 4.2. Variations and improvements necessitated by the findings are recorded and/or trialed   |  |  |
|    |  | 4.3. Reports and recommendations are prepared and processed in accordance with enterprise procedures                                    |  |  |

## **Elements and Performance Criteria**

## **Required Skills and Knowledge**

#### **REQUIRED SKILLS AND KNOWLEDGE**

This section describes the skills and knowledge required for this unit.

#### **Required skills**

- research, collect, organise and understand information related to product and process development, including the relevant technical, regulatory, cultural, environmental and safety requirements
- communicate ideas and information to enable clarification of the requirements, coordination of work with managers, supervisors, team members and customers, and the reporting of work outcomes and findings
- plan and organise activities, including the allocation and coordination of functions and the obtaining of equipment, systems and materials to avoid any backtracking, workflow interruptions or wastage
- work with others and in a team by recognising dependencies and using cooperative approaches
- use mathematical ideas and techniques to correctly complete calculations required to support the product development and to estimate flow and material requirements
- create and apply systematic problem solving techniques to anticipate development problems, avoid re-working and wastage
- use the workplace technology related to development, including machinery, tools and equipment, calculators and measuring devices and computing/computer-aided project management systems

#### **Required knowledge**

- intellectual property obligations and codes of practice
- products and process development processes and procedures
- team management and coordination processes
- recording and reporting processes (as they may apply in the enterprise)
- safety and environmental aspects of relevant enterprise activities
- technical background relevant to the sector

## **Evidence Guide**

#### **EVIDENCE GUIDE**

The Evidence Guide provides advice on assessment and must be read in conjunction with the performance criteria, required skills and knowledge, range statement and the Assessment Guidelines for the Training Package.

| Critical aspects of evidence | • Apply safety requirements throughout the work  |
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|                              | sequence, including the use of personal protective clothing and equipment  |
|                              | <ul> <li>Either individually or as part of a multi-disciplinary team develop a significant product and related processes, including to: <ul> <li>interpret/develop specifications</li> <li>conduct feasibility studies</li> <li>produce prototype</li> <li>organise/conduct trials</li> <li>assess results against specifications</li> <li>communicate effectively with development team and customers</li> <li>prepare reports/presentations</li> </ul> </li> </ul> |
|                              | • Work effectively with others   |
| <b>Resource implications</b> | Access to real or appropriately simulated situations requiring the development of products and related processes   |
|                              | This includes real or simulated work areas, materials,<br>equipment, and information on work specifications,<br>relevant safety procedures and regulations, quality<br>standards, organisation procedures and customer<br>requirements.  |
| Method of assessment         | Assessment methods must confirm consistency of performance over time and in a range of workplace relevant contexts.  |
|                              | Assessment should be by direct observation of tasks and/or samples of work and questioning on underpinning knowledge.  |
|                              | Assessment should be conducted over time and may be<br>in conjunction with assessment of other units of<br>competency.   |
| Context of assessment        | Assessment may occur on the job or in a simulated workplace facility with relevant equipment, simulated  |

# EVIDENCE GUIDE work instructions and deadlines.

## **Range Statement**

#### **RANGE STATEMENT**

The range statement relates to the unit of competency as a whole. It allows for different work environments and situations that may affect performance. Bold italicised wording, if used in the performance criteria, is detailed below. Essential operating conditions that may be present with training and assessment (depending on the work situation, needs of the candidate, accessibility of the item, and local industry and regional contexts) may also be included.

| <ul> <li>Work involves activities contributing to<br/>development of products or processes within the<br/>enterprise</li> </ul>  |
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| • The competency may involve applications<br>associated with original creation, adaptation of<br>designs or interpretation of sketches within<br>contexts related to single or multiple production<br>runs   |
| <ul> <li>Activities may include: work allocation,<br/>reviewing/evaluating processes and products,<br/>liaising with relevant personnel, client and/or<br/>other functional areas</li> </ul>                 |
| • OHS requirements include legislation, building codes, material safety management systems, hazardous substances and dangerous goods codes and safe operating procedures                                     |
| • Work is carried out in accordance with<br>legislative obligations, environmental<br>legislation, relevant health regulations,<br>authorised handling procedures and organisation<br>insurance requirements |
| • Work requires individuals to demonstrate conceptual and analytical ability, discretion, judgement and problem solving skills   |
| <ul> <li>size of the workplace</li> <li>range of designs</li> <li>specialisation in the workplace and workplace quality standards</li> </ul>   |
| The competency is used independently within routine and non-routine situations.  |
| <ul> <li>Work specifications</li> <li>Provisional product specifications and design brief</li> </ul>   |
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| RANGE STATEMENT |   |   |
|-----------------|---|---|
|                 | • | Organisational work procedures  |
|                 | • | Manufacturers' technical specifications   |
|                 | • | Legislation/regulations/national and industry codes and practices relevant to the product |
|                 | • | Quality and Australian standards and procedures   |

## **Unit Sector(s)**

| Unit sector | Furnishing Technology |
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## **Competency field**

| Competency field |  |
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## **Co-requisite units**

| Co-requisite units |  |
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