



Australian Government

AHCPER513 Plan and conduct field research

Release: 1

AHCPER513 Plan and conduct field research

Modification History

Release	Comments
Release 1	This version released with AHC Agriculture, Horticulture and Conservation and Land Management Training Package Version 9.0.

Application

This unit of competency describes the skills and knowledge required to plan, develop methodology for and implement field research. It requires the ability to determine research questions, design technical and/or social field research, and prepare, conduct, assess and report on field research outcomes for a specific industry sector.

The unit applies to individuals who analyse information and exercise judgement to complete a range of advanced skilled activities and demonstrate deep knowledge in a specific technical area. They have accountability for the work of others and analyse, design and communicate solutions to a range of complex problems.

No licensing, legislative or certification requirements apply to this unit at the time of publication.

Pre-requisite Unit

Nil

Unit Sector

Permaculture (PER)

Elements and Performance Criteria

Elements	Performance Criteria
<i>Elements describe the essential outcomes.</i>	<i>Performance criteria describe the performance needed to demonstrate achievement of the element.</i>

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1. Scope field research	1.1 Assess suitability of field research subject in relation to industry sector outcomes 1.2 Identify and justify the purpose of field research 1.3 Identify challenges and opportunities to formulate research questions 1.4 Define and justify field research topic, question or hypothesis
2. Design field research methodology	2.1 Identify relevant information sources and review relevant and credible literature related to the research topic 2.2 Develop field research plan 2.3 Determine research methods for data collection 2.4 Identify reference groups for field research according to research plan 2.5 Locate field research sites according to design requirements 2.6 Identify and incorporate site factors impacting research 2.7 Create a budget for field research plan 2.8 Identify and obtain approvals and permits required
3. Prepare to conduct field research	3.1 Identify work health and safety hazards associated with the implementation of field research 3.2 Identify and document social and environmental implications associated with field research 3.3 Identify resource requirements for implementing field research 3.4 Confirm cost and availability of resources with suppliers, contractors and stakeholders 3.5 Establish and prepare field work sites for implementation of research according to research plan 3.6 Organise access to field research subjects at times and places suitable for data collection
4. Implement data collection methods	4.1 Undertake data collection during field research according to research design and chosen methodologies 4.2 Monitor field research and compliance with research plan 4.3 Record all research data accurately using the specifications of the research plan

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<i>Elements describe the essential outcomes.</i>	<i>Performance criteria describe the performance needed to demonstrate achievement of the element.</i>
5. Assess practical application of research outcomes	5.1 Analyse research data according to research plan outcomes 5.2 Create records of research data analysis 5.3 Synthesise research findings and draw conclusions based on evidence and reasoned arguments 5.4 Assess meaning of research outcomes for practical application, based on conclusions drawn
6. Report field research findings	6.1 Determine desired actions from field research 6.2 Determine target audience for field research reporting 6.3 Draft research report and obtain feedback 6.4 Publish and circulate field research report

Foundation Skills

This section describes those language, literacy, numeracy and employment skills that are essential for performance in this unit of competency but are not explicit in the performance criteria.

Skill	Description
Reading	Identify and extract relevant information from complex texts, reports, maps and plans including legislation to formulate research plans and implementation strategy
Writing	Collate and organise results of research and prepare an accurate, succinct and logically constructed report expressing ideas, exploring complex issues being studied
Oral communication	Use appropriate tone, pitch, eye contact, fluency and listening skills for the target group to elicit information required during field research
Numeracy	Conduct numerical analysis of results of research to formulate reasoned outcomes

Unit Mapping Information

Code and title current version	Code and title previous version	Comments	Equivalence status
AHCPER513 Plan and conduct field research	AHCPER501 Carry out permaculture field research	Redesigned unit to reflect skills for other industry sectors Amended Application, minor changes to Elements and Performance Criteria for brevity and clarity Changes to Performance Evidence, Knowledge Evidence and Assessment Conditions for clarity Addition of Foundation Skills	Not equivalent

Links

Companion Volumes, including Implementation Guides, are available at VETNet: -
<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=c6399549-9c62-4a5e-bf1a-524b2322cf72>

Assessment Requirements for AHCPER513 Plan and conduct field research

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Performance Evidence

An individual demonstrating competency must satisfy all of the elements and performance criteria in this unit.

There must be evidence that the individual has, on at least one occasion, planned and conducted field research relevant to a specific industry sector and has:

- formulated and justified research questions
- designed a field research plan
- conducted research and evaluated information
- entered, analysed and organised data quantitatively and qualitatively, which must include at least one of the following according to research plan:
 - charts
 - tables
 - graphs
- produced written reports on research outcomes and provided conclusions based on evidence and reasoned argument for stakeholders.

Knowledge Evidence

An individual must be able to demonstrate the knowledge required to perform the tasks outlined in the elements and performance criteria of this unit. This includes knowledge of:

- potential research opportunities for the specific industry sector
- field research data collection techniques, including:
 - interviews for individuals and groups
 - use of historical records, data
 - conducting observations, surveys and questionnaires
- research methodologies, including:
 - qualitative, quantitative and mixed methodologies
 - action research
 - needs studies

- case studies
- statistical sampling
- technologies for communications
- field research plan design
- beneficiaries of the research for specific industry sector
- research ethical standards
- scientific and mathematical research approaches, data collection, processing and analytical techniques and procedures
- auditing and reporting procedures
- research planning and budgeting
- field research health and safety procedures
- research report writing and presentation.

Assessment Conditions

Assessment of the skills in this unit of competency must take place under the following conditions:

- physical conditions:
 - skills must be demonstrated in the field specific to the industry sector or an environment that accurately represents workplace conditions
- resources, equipment and materials:
 - industry specific research materials and field research data
- specifications:
 - workplace policies, procedures and processes
 - research ethical standards
- relationships:
 - stakeholders.

Assessors of this unit must satisfy the requirements for assessors in applicable vocational education and training legislation, frameworks and/or standards.

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