Modification history

| Release | Comments |
|-----------|---|
| Release 1 | This version released with SFI Seafood Industry Training Package Version 1.0. |

| SFIFSH302 | Collect reliable scientific data and samples | |
|-------------------|--|--|
| Application | This unit of competency describes the skills and knowledge required to collect a wide range of reliable scientific data and samples for fisheries management and scientific research purposes. It includes the ability to identify sampling plans, assemble equipment, conduct measurements and observations during a commercial fishing activity, collect, store and preserve samples, and collect and report data. | |
| | The unit applies to observers who collect scientific data and samples related to fisheries management. | |
| | All work must be carried out to comply with workplace procedures, according to state/territory health and safety, biosecurity and environmental regulations, legislation and standards that apply to the workplace. | |
| | No occupational licensing, legislative or certification requirements apply to this unit at the time of publication. | |
| Prerequisite Unit | Nil | |
| Unit Sector | Fishing Operations (FSH) | |

| Elements | Performance Criteria | |
|--|---|--|
| Elements describe the | Performance criteria describe the performance needed to demonstrate | |
| essential outcomes. | achievement of the element. | |
| 1. Prepare for | 1.1 Confirm and explain purpose of collection to vessel crew | |
| measurements and sampling | 1.2 Identify relevant sampling plans, procedures, materials and equipment1.3 Confirm required measurements, observations, samples and sampling frequencies | |
| | 1.4 Assemble, check and calibrate all measuring and sampling equipment before use | |
| 2. Conduct measurements and observations | 2.1 Perform required sequence of measurements and observations according to sampling plan | |
| | 2.2 Operate equipment according to manufacturer instructions and health and safety requirements | |
| | 2.3 Record measurements and estimations with the appropriate units, required precision and accuracy | |
| | 2.4 Recognise atypical or out of specification data and record explanatory notes | |
| | 2.5 Identify and rectify procedures or equipment problems that have led to atypical data | |
| | 2.6 Clean and store measuring equipment and dispose of any wastes according to environmental requirements | |
| 3. Obtain samples | 3.1 Collect samples ensuring that sample types and sampling conditions | |
| | are according to the sampling plan | |
| | 3.2 Place, preserve and store samples in labelled containers to maintain | |
| | security, integrity and traceability | |
| | 3.3 Recognise and record atypical observations made during sampling | |
| | 3.4 Clean and store sampling tools and dispose of any wastes according to | |
| | environmental requirements | |

| Elements | Performance Criteria |
|---|--|
| Elements describe the essential outcomes. | Performance criteria describe the performance needed to demonstrate achievement of the element. |
| 4. Report on data and samples | 4.1 Provide feedback to vessel crew at key stages of the data collection and sampling processes 4.2 Validate measurements, observations and samples for relevance and quality promptly after collection 4.3 Complete documentation of data and samples promptly, check for completeness and quality, and duplicate as required 4.4 Prepare end-of-cruise reports in the required format 4.5 Arrange transportation and storage of samples 4.6 Respect confidentiality of data collected from individual sources |

| Foundation Skills | | |
|----------------------|--|--|
| | e language, literacy, numeracy and employment skills that are essential for competency but are not explicit in the performance criteria. | |
| Skill | Description | |
| Numeracy | Prepare and measure samples according to sampling plans and conduct basic measurements, calculations and estimations to reflect fishing operations and environmental impacts | |
| Reading | Interpret sampling plans, procedures, scientific data and sampling information | |
| Interact with others | Select and use appropriate vocabulary, conventions and protocols, including technical language to communicate and engage with crew members | |

| Unit Mapping Information | | | |
|--|---|--|--------------------|
| Code and title current version | Code and title previous version | Comments | Equivalence status |
| SFIFSH302 Collect reliable scientific data and samples | SFIOBSV302B Collect reliable scientific data and samples | Updated to meet Standards for Training Packages. Change of unit sector coding. | Equivalent unit |

| Links | Companion Volumes, including Implementation Guides, are available at |
|-------|--|
| | VETNet: |
| | https://vetnet.education.gov.au/Pages/TrainingDocs.aspx?q=e31d8c6b- |
| | 1608-4d77-9f71-9ee749456273 |

| TITLE | Assessment requirements for SFIFSH302 Collect reliable |
|-------|--|
| | scientific data and samples |

Performance Evidence

A person demonstrating competency in this unit must satisfy all of the elements and performance criteria of this unit. There must be evidence that the individual has collected reliable scientific data and samples for fisheries management or scientific research purposes on at least one occasion including:

- · providing information to engage vessel crew in data collection and observation
- · identifying sampling plans, procedures and equipment
- applying measurements and quality data collection processes that yield outcomes that are valid and comparable to other data sources
- · completing data collection and sampling records
- preserving or protecting samples to minimise change or deterioration
- · identifying atypical measurements and samples and suggest possible causes and effects
- identifying samples to ensure a link to their origins
- · presenting data and information in formats suitable for use in fisheries research and management
- calibrating, operating, cleaning and maintaining equipment
- · applying health and safety and environmental requirements.

Knowledge Evidence

The individual must demonstrate knowledge of:

- environmental management procedures, regulations and codes of practice relevant to the specific sector within the seafood industry
- measurement techniques, including calibrating equipment
- principles of sampling including:
 - achieving consistency in sampling procedures
 - maintaining the identification or traceability of samples relative to their source, including labelling
 - obtaining representative or randomised samples
 - preserving the integrity of samples
 - · storing and transporting samples
- · fisheries and unique aspects relevant to the fishery, sector or geographic area
- · fisheries management methodologies and associated data requirements
- fisheries research methodologies and the application of scientific data to management processes
- · species, product, work regime and typical equipment used.

Assessment Conditions

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

- physical conditions:
 - skills must be demonstrated in a fishery workplace or an environment that accurately represents workplace conditions
- · resources, equipment and materials:
 - sampling equipment and materials
 - · recording media
- specifications:
 - workplace procedures for sampling and data collection that includes advice on health and safety and environmental requirements
 - sampling and data collection plans
 - manufacturer instructions for operating and maintaining equipment

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

| Links | Companion Volumes, including Implementation Guides, are available at VETNet: |
|-------|---|
| | https://vetnet.education.gov.au/Pages/TrainingDocs.aspx?q=e31d8c6b-1608-4d77- |
| | 9f71-9ee749456273 |