



**Australian Government**

# **MARN009 Perform seamanship operations on board a vessel up to 24 metres**

**Release: 1**

# **MARN009 Perform seamanship operations on board a vessel up to 24 metres**

## **Modification History**

Release 1. New unit of competency. Licensing/regulatory information has been incorporated in accordance with Regulatory requirements. Assessment Requirements have been strengthened in accordance with Regulatory requirements.

## **Application**

This unit involves the skills and knowledge required to apply practical seamanship skills and techniques as part of operations on board a vessel up to 24 m.

This unit applies to people working in the maritime industry in the capacity of:

- master on commercial vessels <24 m in length within the exclusive economic zone (EEZ) or
- chief mate or deck watchkeeper on vessels <35 m in length within the EEZ or
- chief mate or deck watchkeeper on vessels <80 m in length in inshore waters; and
- master on commercial vessels <24 m in length in inland waters.

## **Licensing/Regulatory Information**

Legislative and regulatory requirements are applicable to this unit. This unit is one of the requirements to obtain Australian Maritime Safety Authority (AMSA) certification as a Master (Inland waters) and Master <24m NC as defined in the National Standard for Commercial Vessels (NSCV) Part D. The AMSA mandated practical assessment (AMPA) is a requirement for AMSA certification. The Australian Maritime Safety Authority (AMSA) mandated practical assessment (AMPA) will cover a range, but not all, of the requirements identified in the Performance Evidence and Knowledge Evidence. The AMPA shall be undertaken in accordance with its instructions.

Assessors of AMPA must hold as a minimum:

- a current certificate of competency issued under Marine Safety (Domestic Commercial Vessel) National Law Act 2012 at the same level as the qualification being assessed with at least 12 months' relevant sea service, or
- a relevant seafarer certificate, as master or deck officer, issued under the Navigation Act 2012.

## **Pre-requisite Unit**

Not Applicable

## Competency Field

N – Seamanship

## Unit Sector

Not Applicable

## Elements and Performance Criteria

### ELEMENTS

Elements describe the essential outcomes.

### PERFORMANCE CRITERIA

Performance criteria describe the performance needed to demonstrate achievement of the element.

#### **1 Use and maintain ropes and wires**

- 1.1** Knots, hitches and bends using rope are correctly made and used in the course of operations on board a vessel
- 1.2** Ropes are spliced neatly and securely according to their correct application and rope ends are whipped, where appropriate, to maintain good condition
- 1.3** Breaking strain and safe working loads of rope and wire are determined and applied as load limits in the course of operations on board a vessel
- 1.4** Wear and damage to rope and wire are recognised
- 1.5** Rope and wire are maintained and stored according to organisational procedures

#### **2 Operate lifting gear**

- 2.1** Lifting gear is checked and prepared for operation prior to use
- 2.2** Defective lifting gear is isolated and reported according to organisational procedures
- 2.3** Loads are correctly attached using appropriate slings and rigging gear according to organisational procedures and safety requirements
- 2.4** Maximum and safe working load limits are determined and not exceeded
- 2.5** Lifting gear is safely operated to carry out operations

#### **3 Secure vessel at anchor**

- 3.1** Prior to letting go, anchor and equipment are prepared and crew is briefed

- 3.2** Quantity of anchor cable run out or recovered is appropriate to depth of water, weather and sea conditions, and tidal range in area of operation
  - 3.3** Control of cable is maintained within safe operating limits during anchoring operations
  - 3.4** Degree to which anchor and equipment are secured on completion of anchoring operations is appropriate to forecast conditions
  - 3.5** Anchoring area is kept free of loose ropes, wires and debris during all operations
- 4 Secure vessel at a berth**
  - 4.1** Mooring lines and associated equipment are handled safely at all times
  - 4.2** Mooring area is kept free of loose ropes, wires and debris throughout operations
  - 4.3** Tension on ropes is maintained at an appropriate level for stage and nature of the operation
  - 4.4** Tension on shore-power leads and other umbilicals is monitored
- 5 Check condition and seaworthiness of vessel**
  - 5.1** Coverage and frequency of checks and inspections on vessel seaworthiness are undertaken according to organisational procedures
  - 5.2** Watertight integrity is checked and appropriate action is taken to prepare for prevailing and forecast weather and sea conditions according to vessel seaworthiness plans and regulatory requirements
  - 5.3** Vessel is secured to degree which is appropriate to prevailing and forecast conditions
  - 5.4** Irregularities are identified and appropriate action is taken to rectify the situation
  - 5.5** Irregularities beyond ability to rectify are reported in time to enable remedial action to be taken
  - 5.6** Reports of vessel condition are completed according to organisational procedures
- 6 Check stability of vessel**
  - 6.1** Information from vessel stability data book is used to determine loading limits and displacement from draft

- 6.2** Stability conditions for proposed nature of voyage and operations are confirmed and required stress and stability criteria are met
- 7 Perform tasks aloft and over vessel side**
- 7.1** Area and equipment for working aloft or over the side are prepared according to organisational procedures
- 7.2** Required precautions are taken when working aloft or over the side
- 7.3** Chairs, safety harnesses and appropriate safety equipment are used according to organisational procedures
- 7.4** Portable ladders are used correctly to perform tasks
- 7.5** Tasks are completed safely according to instructions
- 7.6** Equipment is inspected, maintained and stored after use according to organisational procedures
- 8 Lash and secure stores, cargo and access ways**
- 8.1** Lashing equipment is inspected, maintained and correctly stored after use according to organisational procedures
- 8.2** Cargo is stowed according to recognised principles and organisational procedures relating to transport and handling of dangerous goods
- 8.3** Cargo is lashed and secured according to recognised principles and organisational procedures
- 8.4** Equipment and items on deck and in galley spaces are secured according to organisational procedures
- 8.5** Personnel access ways are rigged and secured according to organisational procedures
- 8.6** Accommodation spaces and personnel facilities on board vessel are checked and correctly secured for sea according to organisational procedures
- 9 Supervise refuelling operations**
- 9.1** Personal protective equipment (PPE) is accessed and used
- 9.2** Amount of fuel required is calculated
- 9.3** Instructions are provided to ensure safety boundary for refuelling process is established

- 9.4** Spill prevention systems are correctly deployed
- 9.5** Instructions are provided to ensure refuelling operations are performed safely
- 9.6** Notification of intention to refuel is made to authorities and other nearby operations

## **Foundation Skills**

Foundation skills essential to performance are explicit in the performance criteria of this unit of competency.

## **Range of Conditions**

Range is restricted to essential operating conditions and any other variables essential to the work environment.

## **Unit Mapping Information**

This unit replaces and is equivalent to MARN003 Perform seamanship operations on board a vessel up to 24 metres.

## **Links**

Companion Volume implementation guides are found in VETNet -

<https://vetnet.gov.au/Pages/TrainingDocs.aspx?q=772efb7b-4cce-47fe-9bbd-ee3b1d1eb4c2>