Overview

This standard covers the skills and knowledge required to operate communications equipment in a Vessel Traffic Services (VTS) role.

The Vessel Traffic Services Operator is required to communicate with all persons that may be undertaking or affected by vessel movement. The Vessel Traffic Services Operator must determine if communications equipment is operating correctly identifying faults and dealing with them effectively. The Vessel Traffic Services Operator should be able to use radiotelephone, Automatic Identification System (AIS) messaging, Digital Selective Calling (DSC), telephone, facsimile and electronic mail equipment and systems effectively. They should be able to employ approved phrases and procedures so that their verbal communications can be understood without ambiguity.

The Vessel Traffic Services Operator is required to use data recording, data management systems and data export equipment.

There are seven elements in this standard:

- Monitor the serviceability of the equipment
- Use radiotelephone equipment
- Use Automatic Identification System messaging equipment
- Use Digital Selective Calling equipment
- Use telephone equipment
- Use facsimile, and electronic messaging equipment
- Use data recording equipment

Target Group

This standard applies to an authorised and appropriately qualified Vessel Traffic Services Operator who has a duty to ensure the safety of navigation and protection of the environment within their area.
PSSVTS001
Operate communications equipment

<table>
<thead>
<tr>
<th>Performance criteria</th>
<th>\underline{Monitor the serviceability of the equipment}</th>
</tr>
</thead>
</table>
| You must be able to: | \begin{itemize}
| P1                   | meet the requirement to hold a valid Restricted Operator’s Certificate or acceptable equivalent approved by the Competent Authority |
| P2                   | check equipment alarms and indications whilst making and receiving transmissions |
| P3                   | check documentation relating to equipment status and take corrective action |
| P4                   | report observed defects and failures promptly |
| P5                   | follow-up equipment malfunction reports in accordance with organisational procedures |
| \end{itemize} |

Use radiotelephone equipment

| You must be able to: | \begin{itemize}
| P6                   | comply with operating and legal limitations of the Vessel Traffic Services radio station licence and operating criteria |
| P7                   | select transceiver and use the appropriate frequency/channel correctly |
| P8                   | use appropriate equipment to send messages correctly |
| P9                   | switch to standby channels and aerials |
| \end{itemize} |

Use Automatic Identification System equipment

| You must be able to: | \begin{itemize}
| P10                  | conduct pre-use checks on the Automatic Identification System equipment |
| P11                  | operate the Automatic Identification System equipment in accordance with operating procedure |
| \end{itemize} |

Use Digital Selective Calling equipment

| You must be able to: | \begin{itemize}
| P12                  | conduct pre-use checks on the equipment |
| P13                  | operate the Digital Selective Calling equipment in accordance with operating procedure |
| \end{itemize} |

Use telephone equipment

| You must be able to: | \begin{itemize}
| P14                  | select and use the appropriate telephone |
| P15                  | use the ancillary telephone equipment |
| \end{itemize} |
PSSVTS001
Operate communications equipment

Use facsimile and electronic messaging equipment

You must be able to:
- P16 operate facsimile equipment
- P17 use electronic messaging equipment

Use data recording equipment

You must be able to:
- P18 set up data recording equipment in accordance with organisation procedure
- P19 check the status of data recording equipment in accordance with organisation procedure
- P20 monitor the operational and functional integrity of the data recording equipment in accordance with organisation procedure
- P21 manage data storage equipment in accordance with organisation procedure
- P22 operate playback of Vessel Traffic Services data recording in accordance with organisation procedure
Operate communications equipment

Knowledge and understanding

You need to know and understand:

K1 the hazards and risks of the workplace that may affect people and the environment
K2 how to make and apply decisions based on the assessment of risk
K3 how to apply practices that maximise the health, safety and welfare of self and others in the workplace
K4 national and international regulations, statutory authority, codes of practice and industry good practice in relation to Vessel Traffic Services and the role of Vessel Traffic Services Operator
K5 own organisation’s policies, procedures and working practices relevant to Vessel Traffic Services operations
K6 the different roles within Vessel Traffic Service operations, their priorities and responsibilities
K7 lines and methods of communication/reporting in the workplace
K8 vessel movement and data recording systems, their operating principles and how they are maintained
K9 how to communicate clearly and effectively with the port stakeholders/allied services
K10 where the operational manuals for all communications equipment used are located
K11 the channels in the International Very High Frequency (VHF) Marine radio band
K12 simplex and duplex operation
K13 port operations and ship movements
K14 distress, safety and calling channels
K15 national and international regulations for radiotelephone operation
K16 distress, urgency, safety communications procedures
K17 International Aeronautical and Maritime Search and Rescue (IAMSAR) procedures
K18 principles of successful verbal and written communication
K19 principles and procedures for operation of data recording equipment
K20 International Marine Organisation (IMO) Standard Marine Communications Phrases (SMCP)
Additional Information

The important contribution of Vessel Traffic Services towards maintaining the safety of life at sea, safety and efficiency of navigation and the protection of the marine environment is recognised nationally and internationally. International Association of Marine Aids to Navigation & Lighthouse Authorities (IALA) guidelines on recruitment, qualification and training for Vessel Traffic Services Operators have been adopted and are regulated in the UK through the Maritime and Coastguard Agency. These Vessel Traffic Services National Occupational Standards take cognisance of and complement the IALA guidelines and model courses.

Scope

The different communication systems used within Vessel Traffic Service operations include:

1. Radio telephone equipment including Global Maritime Distress Safety Systems (GMDSS)
2. Facsimile
3. Automatic Identification System (AIS)
4. Digital Selective Calling equipment
5. Telephone equipment
6. Electronic messaging equipment

The different roles within Vessel Traffic Service operations include:

7. Vessel Traffic Service Operator
8. Vessel Traffic Service Supervisor
9. Vessel Traffic Service Manager
10. Harbour Master
11. Marine Pilot
12. Ship’s Master
13. Bridge Team
14. Other port stakeholders/allied services
PSSVTS001
Operate communications equipment

Developed by  Port Skills and Safety

Version number  Draft 6

Date approved  January 2013

Indicative review date  January 2016

Validity  Current

Status  Original

Originating organisation  Skills for Logistics

Original URN  PSSVTS101

Relevant occupations  Vessel Traffic Services; Harbour Masters; Marine Pilots;

Suite  Vessel Traffic Services Operations

Key words  Vessel Traffic Services; harbour; marine; port; safety of navigation;
Overview

This standard covers the competence required to control and monitor loading and storage operations. It is about allocating planned resources for loading/discharging operations and for storage operations and the actual control and monitoring of the operation itself. It includes knowing how to deal with contingencies, load and storage problems and accidents and emergencies.

Target Group

This standard applies to authorised Port Operations supervisors and line managers who have a responsibility to lead port teams.

There are 2 elements in this standard:

1. Control and monitor loading and discharge operations within a port
2. Control load storage operations within a port
PSSSPO102
Control and monitor loading and storage operations

**Performance criteria**

**You must be able to:**

- **P1** identify and plan for the resources required for loading and discharge operations, taking into account the nature of the load, the vessel and associated working areas, the resources available and safe working practices
- **P2** allocate work to individuals and/or teams fairly and in line with own plan, taking into account skills, knowledge, experience, capability and workloads
- **P3** brief individuals and/or teams fully and clearly regarding their responsibilities, ensuring that they understand relevant safe systems of work and procedures
- **P4** monitor and record the progress of operations, identifying and addressing deviances from the plan and/or causes for delay
- **P5** take relevant actions to ensure that health, safety, security and environmental requirements are met
- **P6** monitor the activities of individuals and/or teams against the standards of performance expected, and provide constructive feedback
- **P7** recognise the successful completion of key activities and operations by individuals and/or teams
- **P8** liaise with responsible person from ship’s crew to ensure the team’s actions maintain the stability of the vessel throughout the operation
- **P9** complete all required documentation, issuing this to the relevant person(s) promptly
- **P10** identify and report any delays and their causes to the relevant person
- **P11** ensure that defects to plant and equipment are addressed and reported
- **P12** prioritise work to make the best use of time and resources
- **P13** communicate clearly, precisely and unambiguously
- **P14** encourage questions and check understanding
- **P15** make information available to those who need it
- **P16** recognise changes in circumstances and adjust plans and activities accordingly
- **P17** seek opportunities to safely improve working procedures and practices
- **P18** take personal responsibility for making things happen

**Control load storage operations within a port**

**You must be able to:**

- **P19** identify the people, plant and equipment, and storage facilities required for the load storage plan
P20 manage the procedures for the effective running of the operation for: health, safety and security, materials, plant and equipment, handling goods, handling and loading cargo, loading cargo on to vehicles, storage

P21 manage the procedures for the effective maintenance of storage, cargo, plant and equipment

P22 support individuals and/or teams in identifying and dealing with problems and unforeseen events

P23 ensure where amendments to storage instructions are received, you acknowledge these and incorporate them correctly within the storage plan

P24 ensure that stock control measures are followed properly

P25 ensure that loads are secure during handling and storage

P26 identify promptly, and address correctly, any difficulties in load storage operations, reporting these, where required, accurately to the relevant person

P27 recognise the successful completion of work activities by individuals and/or teams

P28 maintain accurate and up to date documentation according to appropriate standards

P29 ensure plant and equipment is cleaned, maintained and stored, or reallocated correctly upon completion of the operation

P30 review the procedures used for the effective running of storage areas

P31 make recommendations to the procedures used to safely improve the running of storage areas
Knowledge and understanding

You need to know and understand:

K1 the legal responsibilities for maintaining own and others’ health and safety in your workplace
K2 the requirements placed upon the individual and the organisation by current legislation
K3 current industry guidance
K4 organisation policies, procedures and working practices
K5 the principle types of hazard and risk likely to be encountered
K6 the appropriate precautions for minimising risks
K7 how to correctly wear, use and maintain personal protective equipment
K8 how to locate, correctly use and maintain the principle types of safety and incident response equipment
K9 accident and emergency procedures
K10 own role, responsibilities and limits of authority
K11 the roles, responsibilities and limits of authority of others
K12 location of and how to operate alarm systems
K13 procedures for contacting the emergency services
K14 location of the approved escape routes and assembly points
K15 the responsibilities for reporting accidents and emergencies
K16 the organisation’s reporting structures
K17 the principal safe loading methods, and restrictions
K18 typical loading problems including those relating to stability
K19 the influence of weather and tidal conditions in loading operations
K20 the principal vessel types, terminology and characteristics
K21 how to identify and clarify customer and/or colleagues requirements
K22 the operating capabilities and limitations of plant and equipment used within the organisation and the associated checking and monitoring requirements
K23 the organisation’s environmental protection requirements including spillage and damage containment methods
K24 the principles of effective warehousing and storage and the impact of not using correct procedures on safety and efficiency
K25 the organisation’s working methods and systems for receiving, handling and despatching loads
K26 the organisation’s quality audit systems
K27 the organisation’s sanitisation methods and procedures
K28 typical cargo problems, including those relating to stability, relevant to own area of operations
K29 the principal vehicle loading methods and restrictions, including: axle weight, gross weight, tare weight, net weight
K30 the measurement systems typically used in own organisation, including: metric, imperial, volume, capacity, weight, TEU (twenty-foot equivalent
PSSPO102
Control and monitor loading and storage operations

K31 the methods of tallying/stock control used
K32 the impact of not using the correct procedures for the effective running of the operation
K33 the typical problems that may occur when managing warehouse and storage operations and the appropriate corrective actions to be taken
This standard is applicable to the control and monitoring of loading and discharge operations, and the control of load storage operations within a port.

The performance criteria, knowledge and understanding requirements are related to the individual's own organisation, job role and area of operations. This includes but is not limited to the individual's immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual's activity in the workplace.

The performance criteria, knowledge and understanding requirements are specific to the: regulations, industry and other guidance recognised by the individual's employer, employing organisation's objectives, policies, procedures, and working practices; that relate to the elements covered in this standard.

The performance criteria, knowledge and understanding requirements are specific to the individual's own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer's health and safety duties, are an essential part of this standard.
### PSSSPO102
Control and monitor loading and storage operations

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<thead>
<tr>
<th>Developed by</th>
<th>Port Skills and Safety</th>
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<td>Key words</td>
<td>Supervision of port operations; port security operations; port safety; ports; vessels</td>
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Overview

This standard covers the competence required to coordinate and control the use of port infrastructure and equipment. It is about ensuring that locks and bridges (including weighbridges) are used in a safe and cost effective manner, maintaining an awareness of changing circumstances at all times. It requires knowledge of relevant legislation and procedures and the ability to operate within these constraints.

Target Group

This standard applies to authorised Port Operations supervisors and line managers who have a responsibility to coordinate and control port marine operations.

There are 4 elements in this standard:

1. Coordinate and control lock and lock gate operations
2. Coordinate and control bridge operations
3. Coordinate and control the use of weighbridges
4. Plan and coordinate routine maintenance of port plant and equipment
PSS SPO103 - Coordinate and control the use of port infrastructure

**Performance criteria**

**You must be able to:**

- **P1** obtain all information relevant to determining the locking order, including details regarding the nature of vessels, loads, tide and weather conditions
- **P2** establish and agree locking requirements in discussion with relevant ship’s agents and vessels
- **P3** analyse the information correctly and determine the proper locking order
- **P4** inform relevant people promptly of probable traffic on the tide
- **P5** ensure water levels in the dock are maintained in a safe and cost effective manner, making optimum use of labour, power and equipment
- **P6** ensure that the quay area at the sides of the lock pit, and the water area within the lock, are clear of obstructions and hazards before a vessel is accepted into the lock
- **P7** confirm that winches, capstans and sluices are operating properly before a vessel is accepted into the lock
- **P8** ensure clear and constant contact with the relevant person on the vessel ahead of and during its passage through the lock is maintained
- **P9** ensure clear instructions are provided to vessels entering the lock as to where they must stop, and it is confirmed that these instructions are understood
- **P10** ensure mooring lines from the vessel are secured safely and securely at the correct locations, with proper allowance made for wind conditions and changes in water level
- **P11** ensure fenders are used effectively and safely
- **P12** identify and report promptly any risk to a vessel’s safe movement through the lock
- **P13** take relevant actions promptly to ensure that health, safety, security and environmental requirements are met
- **P14** wear, use and maintain correctly, personal protective equipment,
- **P15** ensure that all equipment is operated properly and carefully, minimising the likelihood of damage to equipment and vessels
- **P16** maintain all required records accurately
- **P17** prioritise work to make the best use of time and resources
- **P18** communicate clearly, precisely and unambiguously and check understanding
- **P19** make information available to those who need it
- **P20** recognise changes in circumstances and adjust plans and activities accordingly
- **P21** seek opportunities to safely improve working procedures and practices
Coordinate and control bridge operations

You must be able to:

P22 obtain all information relevant to determining bridge operations, including details of vessel movements, the nature of loads, tide and weather conditions
P23 establish and agree vessel movement requirements affecting bridge operations in discussion with relevant ship’s agents and vessels
P24 analyse the information correctly and determine a bridge operation plan
P25 ensure that the quay area at the sides of the bridge, and the water area under the bridge, are clear of obstructions and hazards before a vessel passes through
P26 confirm that bridge operating equipment is working correctly before a vessel is accepted to pass through
P27 ensure clear and constant contact is maintained with the relevant person on the vessel ahead of and during its passage through the water crossed by the bridge
P28 ensure clear instructions are provided to vessels approaching and passing through as to how to proceed and where they must go, and it is confirmed that these instructions are understood
P29 ensure bridges are clear of all pedestrians, traffic and any obstructions before commencing movement of the bridge
P30 ensure all equipment is operated safely and carefully, minimising the likelihood of damage to equipment and vessels

Coordinate and control the use of weighbridges

You must be able to:

P31 check the weighbridge(s) according to an agreed schedule and confirm that the weighbridge(s) are operating correctly
P32 identify and address any faults affecting a weighbridge’s operational effectiveness and safety
P33 establish usage requirements
P34 identify the resources necessary to meet usage requirements
P35 confirm that the resources are available and coordinate these
P36 provide clear instructions and information to relevant colleagues necessary to ensure the availability of the weighbridge(s) when required
P37 ensure that the weighbridge(s) are operated in line with organisational procedures
P38 identify maintenance requirements and arrange for these to be undertaken according to an agreed schedule
Plan and coordinate routine maintenance of port plant and equipment

You must be able to:

P39 identify the maintenance schedules for plant and equipment, and coordinate correctly the work to ensure that personnel, tools and any specialist equipment are available for the work

P40 identify in discussion with plant and equipment operators any defects that they have observed, and record these

P41 check plant and equipment for defects in line with manufacturers’ requirements

P42 identify any defects that prevent full and effective use of the plant or equipment

P43 undertake basic servicing and maintenance procedures, within own level of authority and responsibility

P44 coordinate routine maintenance according to the agreed schedules, and organise it to minimise disruption to operations

P45 confirm that the plant or equipment to be withdrawn for maintenance is not required for operational purposes throughout the proposed maintenance period

P46 identify the maintenance period and maintenance requirements of plant and equipment to be maintained, including any items to be replaced and tested, ahead of the work being started

P47 liaise and coordinate maintenance requirements with relevant specialists, ensuring that they understand the nature of any defects observed and the desired maintenance schedule

P48 return maintained plant and equipment back into service according to organisation procedure, including testing and issuing certification as appropriate

P49 inform the relevant persons were satisfactory maintenance of plant and equipment cannot be achieved, ensuring that the item cannot be returned to service unless or until it is fit for purpose

P50 return maintained and repaired plant and equipment to operations in a clean and tidy condition, and ensure that own work area is also maintained to the correct standards of cleanliness
PSS SPO103
Coordinate and control the use of port infrastructure

Knowledge and understanding

You need to know and understand:

K1 the legal responsibilities for maintaining own and others’ health and safety in your workplace
K2 the requirements placed upon the individual and the organisation by current legislation, directions and bye-laws
K3 current industry guidance
K4 own organisation’s policies, procedures and working practices
K5 the principle types of hazard and risk likely to encountered
K6 the precautions appropriate for minimising risks
K7 how to correctly wear, use and maintain personal protective equipment
K8 how to locate, correctly use and maintain the principle types of safety and incident response equipment
K9 the accident and emergency procedures of the organisation
K10 location of and how to operate alarm systems
K11 procedures for contacting the emergency services
K12 location of the approved escape routes and assembly points
K13 the responsibilities as set out by the organisation for reporting accidents and emergencies
K14 own role, responsibilities and limits of authority
K15 the roles, responsibilities and limits of authority of others
K16 how to read and use tidal and chart information
K17 the principal methods for communicating with vessels
K18 the impact of the motion of vessels and tidal range upon lock and bridge operations in ports
K19 the principal terminology and mechanical principles, relevant to: locks, bridges weighbridges and plant and equipment in ports
K20 the effects of squat, interaction and bank effect upon vessel manoeuvring
K21 the dimensions, limitations and maintenance requirements of docks, locks, approach channels and bridges
K22 the power sources and light characteristics of navigation marks
K23 the types, functions and adjustments of equipment, and regulations governing radio transmission in both normal and emergency situations, and also conditions likely to affect the transmission and reception of signals
K24 the importance of closing dock gates correctly and the impact of not doing so upon dock levels, and the procedures for addressing such an emergency should this occur
K25 local geography and water conditions, including navigable channels and tides, and their impact upon the passage of vessels through your lock
K26 the dimensions, limitations and maintenance requirements of:
PSSSPO103
Coordinate and control the use of port infrastructure

weighbridges, bridges and approach channels

K27 how to operate the principal types of plant and equipment found in own area of operations and what their limitations are
K28 the possible consequences of operating poorly serviced or unsafe plant or equipment
K29 how to conduct safe, routine maintenance of the plant and equipment, including pre-start maintenance requirements, operating procedures, defects and faults, and the correct use of lubricants and other fluids
PSSSPO103
Coordinate and control the use of port infrastructure

Additional Information

This standard is applicable to the coordination and control of lock, bridge and weighbridge operations and to the planning and coordination of routine maintenance of port plant and equipment.

The performance criteria, knowledge and understanding requirements are related to the individual's own organisation, job role and area of operations. This includes but is not limited to the individual's immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual's activity in the workplace.

The performance criteria, knowledge and understanding requirements are specific to the: regulations, industry and other guidance recognised by the individual's employer, employing organisation's objectives, policies, procedures, and working practices; that relate to the elements covered in this standard.

The performance criteria, knowledge and understanding requirements are specific to the individual's own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer's health and safety duties, are an essential part of this standard.
PSSSPO103
Coordinate and control the use of port infrastructure

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Overview

This standard covers the competence required to manage passenger and ferry terminal operations. It is about ensuring the operational readiness of the passenger, Ro/Ro, cargo and/or leisure craft terminal. It includes a number of activities, such as obtaining information about timing and the amount of traffic expected, as well as briefing staff on the tasks that they are required to carry out. It also includes liaison with other service providers to assess their needs, and to find out or pass on any information about anticipated changes to the services provided.

This standard is also concerned with those activities which relate to the terminal facilities, i.e. preparing the facilities and equipment for use and ensuring that company standards of safety and cleanliness are maintained.

This standard is also about the planning, organising and controlling movement of embarking or disembarking passengers through the terminal, together with the means by which information is passed to them. It also covers organising and planning the movement of baggage, including gathering information regarding the volume of passenger baggage requiring transfer, and ensuring that the correct equipment is available to transport it. It includes ensuring the availability of suitable staff to transfer baggage between passenger and ship in a safe and efficient manner.

Target Group

This standard applies to authorised Port Operations supervisors and line managers who have a responsibility to manage passenger and ferry terminal operations.

There are 3 elements in this standard:

1. Ensure the operational readiness of the port terminal
2. Manage the movement of passengers within a port terminal
3. Manage the movement of passengers’ baggage between vessels and terminals
### PSSSPO104
Manage passenger and ferry terminal operations

#### Performance criteria

<table>
<thead>
<tr>
<th>Performance criteria</th>
<th>Ensure the operational readiness of the port terminal</th>
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<tbody>
<tr>
<td><strong>You must be able to:</strong></td>
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</tr>
<tr>
<td>P1</td>
<td>obtain all required information regarding the throughput of port users and their requirements relevant to own area of operations, including where appropriate, the requirements of relevant service providers</td>
</tr>
<tr>
<td>P2</td>
<td>evaluate the information to determine activities and levels of service appropriate to ensuring the readiness of the terminal</td>
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<tr>
<td>P3</td>
<td>identify the resources, including staff, required to undertake the activities necessary to make ready the terminal on time, and confirm that these are available, referring any shortages to the relevant person</td>
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<tr>
<td>P4</td>
<td>ensure where non-permanent employees have been brought in, approved procedures are followed</td>
</tr>
<tr>
<td>P5</td>
<td>allocate work to individuals and/or teams fairly and in line with the plan, taking into account skills, knowledge, experience and workloads</td>
</tr>
<tr>
<td>P6</td>
<td>brief individuals and/or teams fully and clearly regarding their responsibilities</td>
</tr>
<tr>
<td>P7</td>
<td>monitor and record the progress of operations, identifying and addressing deviances from the plan and/or causes for delay</td>
</tr>
<tr>
<td>P8</td>
<td>take relevant actions to ensure that health, safety, security and environmental requirements are met</td>
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<tr>
<td>P9</td>
<td>wear, use and maintain personal protective equipment,</td>
</tr>
<tr>
<td>P10</td>
<td>make provision for the safe disposal of waste, in line with regulatory requirements</td>
</tr>
<tr>
<td>P11</td>
<td>monitor the activities of individuals and/or teams against the standards of performance expected, and provide constructive feedback</td>
</tr>
<tr>
<td>P12</td>
<td>recognise the successful completion of key activities and operations by individuals</td>
</tr>
<tr>
<td>P13</td>
<td>complete all required documentation accurately and issue this to the relevant individuals</td>
</tr>
<tr>
<td>P14</td>
<td>identify and report any delays and their causes to the relevant person</td>
</tr>
<tr>
<td>P15</td>
<td>ensure any defects to plant and equipment are addressed and reported</td>
</tr>
<tr>
<td>P16</td>
<td>prioritise work to make the best use of time and resources</td>
</tr>
<tr>
<td>P17</td>
<td>communicate clearly, precisely and unambiguously, checking understanding, showing respect for the views and actions of others and making information available to those who need it</td>
</tr>
<tr>
<td>P18</td>
<td>recognise changes in circumstances and adjust plans and activities accordingly</td>
</tr>
<tr>
<td>P19</td>
<td>seek opportunities to safely improve working procedures and practices</td>
</tr>
</tbody>
</table>
PSSSPO104
Manage passenger and ferry terminal operations

Manage the movement of passengers within a port terminal

You must be able to:

P20 obtain all relevant information required to plan for the efficient movement of passengers within own area of responsibility
P21 identify the resources required to manage the movement of passengers
P22 ensure that public and working areas are clean, tidy and free from obstructions and hazards ahead of the vessel’s arrival or departure
P23 ensure that signage provides accurate, relevant and up to date passenger information, and is positioned clearly
P24 ensure that support staff are briefed to offer assistance to passengers with relevant and up to date information
P25 monitor the progress of passengers, offering assistance to those embarking to ensure that they reach the correct vessel on time, and directing disembarking passengers to the relevant control points
P26 recognise the successful completion of key activities and operations by individuals and/or teams
P27 maintain personal appearance in line with organisation policy
P28 prioritise work to make the best use of time and resources

Manage the movement of passengers’ baggage between vessels and terminals

You must be able to:

P29 obtain all relevant information required to plan baggage movement, including vessel arrival and sailing times, the volume of baggage, the nature and relevant characteristics of loading areas, and any particular requirements of shipping companies
P30 evaluate the information to determine the activities and levels of service required to move passengers’ baggage
P31 identify correctly the staff and equipment required to achieve the activities on time
P32 brief individuals and/or teams fully and clearly regarding their responsibilities
P33 ensure that the required equipment is in good working order, and positioned properly in readiness for operations, with any faults addressed
P34 allocate staff to key points to ensure the efficient transfer of baggage
P35 ensure baggage is moved on time to the correct location using the most suited method of transport, and in line with the requirements of the shipping company
P36 ensure any damaged, unlabelled, unaccompanied, or suspect baggage is dealt with
P37 ensure any baggage requiring security assessment is referred to the
relevant authority
P38 ensure baggage is protected from inclement weather
P39 recognise the successful completion of work activities by individuals and/or teams
Knowledge and understanding

You need to know and understand:

K1  the legal responsibilities for maintaining own and others' health and safety in your workplace
K2  the requirements placed upon the individual and the organisation by current legislation, directions and bye-laws, relevant to own area of operations and related to passenger and ferry terminal operations
K3  current industry guidance, relevant to own area of operations, that relates to passenger and ferry terminal operations
K4  own organisation’s policies, procedures and working practices that relate to passenger and ferry terminal operations including those for: berthing vessels, transferring passengers, identifying sorting and moving baggage, storing unaccompanied baggage and dealing with awkward-shaped, damaged, unclaimed or suspect baggage
K5  the principle types of hazard and risk associated with passenger and ferry terminal operations
K6  the precautions appropriate for minimising the risks, associated with passenger and ferry terminal operations:
K7  how to correctly wear, use and maintain personal protective equipment
K8  how to locate, correctly use and maintain the principle types of safety and incident response equipment
K9  the accident and emergency procedures of the organisation and individual roles and responsibilities
K10 location of and how to operate alarm systems
K11 procedures for contacting the emergency services
K12 location of the approved escape routes and assembly points
K13 the responsibilities as set out by the organisation for reporting accidents and emergencies
K14 own role, responsibilities and limits of authority
K15 the roles, responsibilities and limits of authority of others
K16 the importance of interpersonal skills/techniques, and how to use them in supervising and motivating individuals and teams
K17 the staff planning/welfare issues, including hours of work, breaks, task allocation, ordering/contracting staff
K18 the methods of briefing staff
K19 how and when to liaise with shipping companies and other terminal operators, to establish their requirements
K20 the methods of using equipment and the need for safe working practices
K21 the importance of meeting quality and service level agreements by correcting adverse working procedures, and dealing with shortfalls in existing systems
K22 how to monitor whether required safety and cleanliness standards have been achieved
Manage passenger and ferry terminal operations

K23 the role of Customs and Excise/Immigration, and when to liaise with them
K24 passenger behaviour and how this can be influenced
K25 the implications of working with passengers with special needs
K26 how to apply the principal methods for communicating with vessels
K27 how to obtain up-to-date information about the number of passengers embarking or disembarking, and how to deal with difficulties resulting from vessel delays
K28 the information that is required by passengers and the methods of communicating it, including the use of equipment such as PA systems and information signs
K29 how to communicate with shipping companies and other terminal operators and the importance of doing so
K30 the types, functions and adjustments of communications equipment, and regulations governing radio transmission in both normal and emergency situations
K31 the conditions likely to affect the transmission and reception of communication equipment signals
K32 the importance of interpersonal skills/techniques, and how to use them in dealings with passengers, and in supervising and motivating individuals and teams
K33 how other port operations may impact upon the baggage handling process
K34 the duties and responsibilities of security staff, including their role in searching and screening of passengers and vehicles
K35 the correct use of screening procedures and equipment, including x-ray equipment and associated radiation protection measures
K36 the methods and channels of communication with other relevant bodies
This standard is applicable to ensuring the operational readiness of the port terminal, managing the movement of passengers within a port terminal and managing the movement of passengers' baggage between vessels and terminals.

The performance criteria, knowledge and understanding requirements are related to the individual’s own organisation, job role and area of operations. This includes but is not limited to the individual’s immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual’s activity in the workplace.

The performance criteria, knowledge and understanding requirements are specific to the: regulations, industry and other guidance recognised by the individual’s employer, employing organisation’s objectives, policies, procedures, and working practices; that relate to the elements covered in this standard.

The performance criteria, knowledge and understanding requirements are specific to the individual’s own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer’s health and safety duties, are an essential part of this standard.
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Overview

This standard covers the competence required to plan the transfer and storage of loads. It covers the planning and implementation of a lifting plan where there are large, awkwardly shaped, or very heavy loads which require specialised handling techniques. It is important that relevant sources of information are accessed in order to establish the load characteristics and that an operational plan is developed for loading and discharging in a port environment.

The standard also covers the planning of vessel loading and discharge as well as planning load storage within a port environment. It includes gathering information about the vessel and its resource requirements from various sources, and using this information to assist in developing an operational plan. It also includes gathering information regarding the load and storage operation from various sources. In both cases it includes the use of this information to present a comprehensive plan to those personnel and/or statutory bodies that must be advised.

Target Group

This standard applies to authorised Port Operations supervisors and line managers who have a responsibility to plan lifting and storing operations in ports.

There are 3 elements in this standard:

1. Plan and implement a lifting plan
2. Plan vessel loading and discharge within a port environment
3. Plan load storage within a port environment
Performance criteria

You must be able to:

P1 identify the load to be lifted, and the particular features that planning needs to address
P2 identify all relevant information, including the nature of the load, whether it is hazardous, its quantity, quality, dimensions and the way it is to be transported as well as any restrictions from labelling and other information provided regarding the load
P3 identify any gaps in the information required and address these, seeking advice and information from the relevant person(s)
P4 plan lifts, taking into consideration the nature of the load, safe working practice, the lifting gear required, the destination of the load and timescale
P5 ensure the method, materials and equipment selected for the lift are suitable for the nature of the load, the planned work areas, and the lifting operation
P6 anticipate where specialised services may be needed, or where circumstances may require contingencies to be planned, making the appropriate and reasoned recommendations for action to the relevant person
P7 make contact and work with relevant statutory bodies and other personnel, where required
P8 identify providers of specialist services, where necessary, and confirm that they can meet operational requirements
P9 confirm that all lifting equipment, materials and lifting points are safe and working properly before beginning the lift
P10 confirm that the load to be lifted is secure and will not shift during the lift
P11 report any difficulties, including defective materials and equipment, in line with organisational procedures
P12 communicate clearly, precisely and unambiguously, checking understanding and make information available to those who need it
P13 ensure all relevant communications systems are confirmed as working properly
P14 ensure any obstructions on the route of the lift are cleared in advance of lifting operations
P15 ensure lifts are undertaken correctly and safely
P16 prioritise work to make the best use of time and resources
P17 recognise changes in circumstances promptly and adjust plans and activities accordingly
P18 seek opportunities to safely improve working procedures and practices
P19 take personal responsibility for making things happen
Plan vessel loading and discharge within a port environment

You must be able to:

P20 obtain all relevant information required to establish the characteristics of the vessels to be loaded/discharged, including where applicable, any loading/discharge plans prepared by vessel staff
P21 address any problems in obtaining suitable and sufficient information
P22 assess the requirements for load handling and/or lifting equipment, as well as appropriate safety, anti-pollution and waste disposal equipment
P23 identify port and vessel berthing equipment, and appropriate method(s) of loading/discharging the vessel
P24 assess the load characteristics and determine correctly the nature of any specialist services that may be required
P25 identify and confirm the availability of all required facilities and resources, referring any difficulties to the relevant person
P26 prepare vessel loading/discharge plans, identifying potential areas of uncertainty and agreeing contingency plans designed to address these
P27 agree own plans with all relevant people, including appropriate vessel staff
P28 ensure that the plan sets out the systems for loading and discharging loads, taking into account the characteristics of the vessel and the load, including, where relevant, the presence of any dangerous goods, and the resources available
P29 communicate the plan to all relevant people, and in sufficient time to meet operational needs, agreeing individual actions and responsibilities with all relevant people

Plan load storage within a port environment

You must be able to:

P30 obtain all relevant information required to determine the amount and type of storage required for loads, including relevant details regarding the need for the load to be covered, any temperature and atmospheric controls, volume of space, height/weight restrictions, storage duration, proximity to transport, and security
P31 identify and assess service requirements, relating to the loads to be stored
P32 identify the characteristics of the required storage facility, and establish their availability
P33 prepare load storage plans setting out the actions to be undertaken, resources required, and identifying potential areas of uncertainty and the
contingencies designed to address these
P34 identify any difficulties in preparing plans and address these, referring them where necessary to the relevant person
P35 agree load storage plans with the appropriate person
P36 confirm the availability of the required facilities and resources, referring any difficulties to the relevant person
P37 document required information, legibly and accurately, including load/discharge, delivery/receipt details, work schedules, labour costs and port manifests
P38 communicate the agreed plan to all relevant parties, including statutory bodies where necessary, and in sufficient time to meet operational needs
P39 ensure cargo storage operations comply with safe working procedures and health and safety requirements
P40 prioritise work to make the best use of time and resources
P41 recognise changes in circumstances and adjust plans and activities accordingly
PSSSPO105
Plan lifting operations in ports

Knowledge and understanding

You need to know and understand:

K1 the legal responsibilities for maintaining own and others’ health and safety in your workplace
K2 the requirements placed upon the individual and the organisation by current legislation, directions and bye-laws related to lifting and storage operations in ports
K3 current industry guidance, relating to lifting operations in ports
K4 own organisation’s policies, procedures and working practices that relate to lifting and storage operations in ports including those relating to loading/unloading of: dangerous goods, vessels, vehicles and rail
K5 the principle types of hazard and risk associated with lifting and storage operations in ports
K6 the precautions appropriate for minimising the risks associated with lifting and storage operations in ports
K7 how to correctly wear, use and maintain personal protective equipment, relevant to lifting and storage operations in ports
K8 how to locate, correctly use and maintain the principle types of safety and incident response equipment relevant lifting and storage operations in ports
K9 the accident and emergency procedures of the organisation and individual roles and responsibilities, relevant to own area of operations, relating to lifting operations in ports
K10 location of and how to operate alarm systems
K11 procedures for contacting the emergency services
K12 location of the approved escape routes and assembly points
K13 own responsibilities for reporting accidents and emergencies
K14 the limits of own responsibilities when planning and managing lifting operations
K15 roles and responsibilities of others in own area of operations, relating to lifting operations in ports
K16 the operating procedures, capabilities and limitations, of the principal types of lifting plant found in ports, procedures for checking lubricants and other fluids, and the importance of reporting any faults and defects
K17 the principal characteristics of the main types of loads, including their nature and weight, and whether they are hazardous or non-hazardous
K18 the factors that can affect the stability and security of loads when being transferred, and how these can be affected by environmental conditions
K19 the capabilities, including capacity and strength of the principal types of slinging and lashing materials and the implications of using defective or faulty materials
K20 methods of safe slinging and unslinging loads, including angles of operations and what constitutes a safe working load
K21 signalling procedures and techniques, including the interpretation of hand signals in slinging operations
K22 how to interpret coding systems, relating to lifting equipment
K23 how to interpret the information found on load labels and documentation
K24 the typical cargo problems including those relating to stability
K25 the different classifications of dangerous goods
K26 the principles of effective warehousing and storage
K27 the measurement systems typically used in own organisation, including: metric, imperial, volume, capacity, weight, TEU (twenty-foot equivalent units)
K28 the roles and responsibilities of the relevant statutory authorities
K29 the organisation’s working methods and systems for receiving, handling and despatching cargo
K30 the sources of information and assistance on lifting operations and how to interpret and evaluate the information
K31 how to identify and clarify customer requirements
K32 the principal vessel types, terminology and characteristics
This standard is applicable to planning and implementing a lifting plan, planning vessel loading and discharge and planning load storage within a port environment.

The performance criteria, knowledge and understanding requirements are related to the individual’s own organisation, job role and area of operations. This includes but is not limited to the individual’s immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual’s activity in the workplace.

The performance criteria, knowledge and understanding requirements are specific to the: regulations, industry and other guidance recognised by the individual’s employer, employing organisation’s objectives, policies, procedures, and working practices; that relate to the elements covered in this standard.

The performance criteria, knowledge and understanding requirements are specific to the individual’s own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer’s health and safety duties, are an essential part of this standard.
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Overview

This standard covers the competence required to support marine safety, operations and safe navigation within port areas. It includes the safe controlling and navigating port craft. It also covers the provision and control of moorings and making the most efficient and effective use of available mooring space. It includes keeping navigational channels safe and clear of obstructions, and being aware of weather conditions.

This standard also covers the coordination and controlling of vessel berthing operations ensuring that an appropriate berth for a vessel is identified and safely managing the movement of the vessel into the berth.

The standard also includes the provision of information and provision of assistance for the planning of vessel movements within a port area.

Target Group

This standard applies to authorised Port Operations supervisors and first line managers who have a duty to perform to support safe navigation within port areas.

This standard applies to authorised Port Operations supervisors and line managers who have a responsibility to support port marine safety and safe navigation.

There are 5 elements in this standard:

1. Control and navigate port craft
2. Contribute to the provision and control of moorings
3. Coordinate and control vessel berthing operations
4. Provide information to assist the planning of vessel movements within a port area
5. Assist the planning of vessel movements
PSSSPO106
Support port marine operations

Performance criteria

Control and navigate port craft

You must be able to:

P1 check and confirm that operating systems are functioning properly before departing, including those controlling manoeuvring and navigation, addressing any faults
P2 determine work schedules for the crew, establishing that activities have the correct manning and skills levels
P3 allocate duties fairly and in line with own work schedules, taking into account skills, knowledge, experience and workloads
P4 establish that the correct equipment is available for the crew to enable the intended activities to be undertaken, confirming that it is in good working order, and certificated where necessary
P5 determine accurately the craft’s position, course and speed using the available navigation equipment
P6 ensure the craft’s course and speed are set accurately, using available equipment and taking into account the current and required position, weather conditions, water depth and currents, tides and the craft’s construction
P7 ensure that the navigation equipment is set up and used, in line with recommended practice and the manufacturers’ instructions, and the resultant information is interpreted correctly
P8 communicate the craft’s position, course, speed and destination, as required
P9 manoeuvre the craft, taking action to avoid collisions where necessary and in line with the requirements of regulations and bye-laws
P10 report any defective equipment to the relevant person or authority
P11 monitor navigational broadcasts and warnings, taking the appropriate actions in response where necessary
P12 ensure all records are maintained accurately

Contribute to the provision and control of moorings

You must be able to:

P13 plan mooring allocations with the relevant person(s), and take into account the available depth of water, any known obstructions on the seabed, the type, size and construction of vessels, and avoiding mixing of keel types within a mooring area
P14 identify particular requirements and resources within the plan and confirm their availability
P15 ensure that vessels allocated to moorings match the mooring requirements for the berth
## PSSSPO106
Support port marine operations

| P16 | ensure that plans make the optimum use of the port’s amenities, infrastructure and equipment |
| P17 | ensure plans are accurate, complete and legible, and are provided in a format that can be used readily |
| P18 | ensure that all necessary mooring equipment is obtained, prepared and assembled |
| P19 | verify mooring locations, ensuring that moorings are deployed and at designated points which take into account tidal and wind conditions |
| P20 | check the validity and reliability of information |
| P21 | prioritise work to make the best use of time and resources |

### Coordinate and control vessel berthing operations

You must be able to:

| P22 | identify the vessel’s intended berthing position, and confirm that the designated berth is available |
| P23 | check and confirm that that berth is safe and ready for use, identifying and addressing any remedial actions required |
| P24 | obtain all relevant information regarding the vessel to prepare for berthing, including its size, any particular requirements, the number, length and size of mooring lines and whether mooring boats or other equipment is required |
| P25 | determine the staffing and resource requirements necessary to berth the vessel, identifying the actions to be undertaken |
| P26 | agree berthing arrangements with all of those involved ahead of the operations |
| P27 | take relevant actions promptly to ensure that health, safety, security and environmental requirements are met |
| P28 | wear, use and maintain correctly, personal protective equipment, relevant to own area of operations |
| P29 | ensure that berthing materials and equipment are used safely, with vessels berthed in line with correct procedures |
| P30 | monitor the activities of individuals and/or teams against the standards of performance expected, and provide prompt and constructive feedback |
| P31 | recognise the successful completion of key activities and operations by individuals and/or teams |
| P32 | ensure that the quayside is left clean, tidy and free of obstructions upon completion of the berthing |
| P33 | address any difficulties or incidents, reporting these, as required |
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**Provide information to assist the planning of vessel movements within the port area**

**You must be able to:**

P34 obtain provisional arrival and sailing times and confirm these with the relevant vessels and their agents

P35 maintain contact with vessels throughout their movement within own port’s limits

P36 monitor other traffic within own port, and assess their potential effect upon vessel movement and berthing operations, taking the relevant actions accordingly

P37 use traffic monitoring equipment, in line with the manufacturer’s instructions

P38 obtain all relevant information regarding vessels being monitored, including appropriate details of their position, dimensions, loads, any defects, whether a pilot/tug is required, berth location and their time of arrival

P39 ensure where a pilot or tug is required for vessel movement and berthing that one is available and address any difficulties

P40 provide navigation warnings promptly at relevant locations and times

P41 assess all information received from relevant sources regarding a vessel and its movement, and act upon it

**Assist the planning vessel movements within the port area**

**You must be able to:**

P42 identify the information necessary to planning a vessel’s movements and obtain it from the appropriate sources, including navigation charts, tide gauge and tables, radar and weather instruments

P43 obtain all relevant details regarding the vessels, including their size and dimensions, draught, loading and unloading requirements, and the nature of any loads

P44 identify occasions where vessels are carrying dangerous goods, and take the relevant actions accordingly

P45 identify appropriate routes and berthing positions for vessels, taking into account their size and dimensions, any requirements relating to their loads, and other traffic in the port

P46 notify the relevant person(s) promptly of any special requirements relating to the movements of a vessel

P47 ensure that contributions to incident planning are correct, clear and prompt, with any recommendations being supported with a relevant rationale

P48 maintain all required records, ensuring that these are accurate, clear and complete
P49 make effective use of existing sources of information
P50 check the validity and reliability of information
# Knowledge and understanding

You need to know and understand:

- **K1** the legal responsibilities for maintaining own and others' health and safety in your workplace
- **K2** the requirements placed upon the individual and the organisation by current legislation, directions and bye-laws related to port marine operations
- **K3** current industry guidance, relating to port marine operations
- **K4** own organisation's policies, procedures and working practices that relate to port marine operations
- **K5** the principle types of hazard and risk associated with port marine operations
- **K6** the precautions appropriate for minimising the risks associated with port marine operations
- **K7** how to correctly wear, use and maintain personal protective equipment, relevant to port marine operations
- **K8** how to locate, correctly use and maintain the principle types of safety and incident response equipment relevant to port marine operations
- **K9** the accident and emergency procedures of the organisation and individual roles and responsibilities, relevant to port marine operations
- **K10** location of and how to operate alarm systems
- **K11** procedures for contacting the emergency services
- **K12** location of the approved escape routes and assembly points
- **K13** own responsibilities for reporting accidents and emergencies
- **K14** the limits of own responsibilities when involved in port marine operations
- **K15** roles and responsibilities of others in own area of operations, relating to port marine operations
- **K16** how to interpret organisational charts/plans and schedules for planned work
- **K17** how to use tidal stream atlases, tide tables, Nautical Almanacs and pilot/sailing directions
- **K18** how to plan, monitor and execute a passage plan and the impact of deviation and variation
- **K19** the different types of course, including: true, magnetic, compass and gyro
- **K20** how to use electronic navigation aids, as well as relevant non-electronic aids, and the limitations of navigation equipment
- **K21** the use of buoyage systems and navigation lights
- **K22** how to obtain and interpret weather information
- **K23** how different types of adverse weather can impact upon craft movements within port areas
- **K24** how to calculate tidal heights and ranges, and the local impact of tidal streams upon craft movements
- **K25** handling characteristics of port craft relevant to own area of operations
- **K26** how to determine the position of own craft, using navigation equipment relevant to own area of operations, in both good and restricted visibility
- **K27** how to operate equipment safely according to own organisation
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procedures, within own area of operations

K28 the roles and responsibilities of those involved in facilitating vessel movement and their lines of communication to people, within own area of operations

K29 the organisation’s requirements relating to recording the movements of craft within the port

K30 the effect of a craft’s speed in relation to its impact upon other vessels, property and persons

K31 the importance of reporting promptly any defects in the equipment, and the procedures for doing this

K32 the local port geography and water conditions and their impact upon port marine activity navigating craft within own port (including: navigable channels and tides)

K33 the types, functions and adjustments of communications equipment, and regulations governing radio transmission in both normal and emergency situations, and

K34 the conditions likely to affect the transmission and reception of signals, relevant to own area of operations

K35 how to read and understand tidal and chart information and schedules for planned work

K36 assembly and fixing methods for moorings, and the limitations of specific types of mooring

K37 the handling characteristics of craft relevant to own area of operations

K38 the implications of adverse weather and tidal conditions on the depth of available water, moorings, including requirements for additional moorings and the movement and handling of vessels, within own port area

K39 the organisation’s operating limits for each berth, and their implications when planning mooring allocations

K40 the importance of applying speed limits relating to berthing operations of larger vessels

K41 the correct words and phrases used in describing vessels and their movements within a port area

K42 hand signals for heave, slack, stop and secure

K43 the methods for safe handling of mooring ropes, including how to dip ropes and to heave lines

K44 the impact that motion and tidal range have upon berthing vessels, and where these apply within own area of operations

K45 the dimensions, limitations and maintenance requirements of docks and approach channels, within own area of operations

K46 how to obtain accurate information about a vessel and relate this to berthing availability within own area of operations

K47 the basic principles of vessel navigation, movement and manoeuvring

K48 the local marine environment, including the port area

K49 the types, functions and adjustment of communications equipment, and the regulations governing radio transmission in both normal and
emergency situations, and also the conditions likely to affect the transmission and reception of radio signals

K50 how to record messages (both transmitted and received) and the format to use, relevant to own area of operations

K51 the role and responsibilities of those involved in facilitating vessel movement and their lines of communication to people, relevant to own area of operations

K52 the different classifications of dangerous goods

K53 the local marine environment, including the port area relevant to own area of operations

K54 the role and responsibilities of those involved in facilitating vessel movement and their lines of communication to people, relevant to own area of operations

K55 The different types of assistance available to vessels mooring within the port area
This standard is applicable to controlling and navigating port craft, contributing to the provision and control of moorings, coordinating and controlling vessel berthing operations and assisting the planning of vessel movements within a port area.

The performance criteria, knowledge and understanding requirements are related to the individual’s own organisation, job role and area of operations. This includes but is not limited to the individual’s immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual’s activity in the workplace.

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The performance criteria, knowledge and understanding requirements are specific to the individual’s own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer’s health and safety duties, are an essential part of this standard.
# PSSSPO106
Support port marine operations

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Overview

This standard covers the competence required to take action to reduce risks to health safety and security within a port environment. It is about working effectively to maintain the health, safety and security of oneself and of others ensuring that health, safety and security systems are procedures are complied with:

Target Group

This standard applies to authorised Port Operations supervisors and first line managers.

There are 6 elements in this standard:

1. Take action to reduce risks to health, safety and security in ports
2. Conduct an assessment of risks in the workplace
3. Promote health, safety and security in ports
4. Develop procedures to control risks to health, safety and security in ports
5. Monitor procedures to control health, safety and security risks in ports
6. Undertake port health, safety and security inspections
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

Performance criteria

You must be able to:

- P1 implement own organisation’s policies, procedures and working practices relevant to own area of operations
- P2 identify the principle types of hazard and risk likely to be found in own area of operations
- P3 assess and prioritise levels of risk using a formal methodology
- P4 identify and implement the proper precautionary measures to address potential hazards in own area of operations
- P5 report those hazards representing a significant risk, or which are beyond own responsibility, to the appropriate person
- P6 wear, use and maintain personal protective equipment, relevant to own area of operations
- P7 identify your role(s) and responsibilities and those of others, relevant to own area of operations
- P8 locate, use and maintain the principle types of safety and incident response equipment relevant to own area of operations
- P9 implement the accident and emergency procedures relevant to own area of operations
- P10 locate and operate alarm systems correctly in own area of operations
- P11 locate and use the approved escape routes and assembly points, relevant to own area of operations
- P12 report accidents and emergencies, within own limits of responsibility
- P13 keep within the designated areas when walking and when operating plant and vehicles
- P14 establish and maintain contact with others involved in, or affected by, operations within own area of responsibility
- P15 communicate clearly, precisely and unambiguously and check understanding
- P16 work safely at all times, taking into account any changes to operational and environmental conditions
- P17 maintain work areas, ensuring that they are kept clean, tidy and free of obstructions
- P18 identify defective equipment and report it in line with the organisation’s policies and procedures
- P19 deal with waste materials and spillages, using specified equipment and materials
- P20 identify and respond to any breaches of health and safety regulations according to own organisation’s procedures
- P21 identify the implications or consequences of an action
- P22 take personal responsibility for making things happen
- P23 ensure that ID badges are displayed correctly and prominently in all required areas, including restricted zones
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

P24 address security risks, advising security personnel correctly of potential risks
P25 identify those individuals whose presence in the port area should be challenged, and where necessary, ask them to justify their presence and to explain their activities
P26 maintain accurate records of health, safety and security incidents, according to organisation procedures
P27 prioritise work to make the best use of time and resources
P28 make information available to those who need it
P29 recognise changes in circumstances and adjust plans and activities accordingly
P30 seek opportunities to safely improve working procedures and practices

Conduct an assessment of risks in the workplace

You must be able to:

P31 define clearly, why and where, the risk assessment will be carried out
P32 confirm that the information available on statutory health, safety and security regulations is up-to-date and from valid sources
P33 recognise limitations of own skills, knowledge and experience and seek expert advice and guidance on risk assessment when appropriate
P34 select a method of identifying hazards and risks appropriate to the workplace being assessed
P35 investigate fully to identify the significant hazards and risks in the workplace
P36 identify hazards which could result in serious harm to people at work or other persons including: plant and equipment, substances hazardous to health, workplace layout, working practices, job role, people with special needs and security
P37 record hazards and risks in a way which meets legal, good practice and workplace requirements
P38 report the results of the process to the responsible persons in an agreed format and timescale

Promote health, safety and security in ports

You must be able to:

P39 promote a safe working culture through own behaviour and supervision of others, responding quickly to problems with a proposed course of action
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

P40 ensure that the information is up to date and sets out clearly the benefits derived from supporting health safety and security procedures and is accessible to the appropriate people

P41 check that team members understand the importance of health, safety and security, and their statutory responsibilities, and address any gaps in understanding

P42 provide practical opportunities for regular communications on health safety and security issues, and ways for encouraging ideas regarding good practice

P43 identify and address any concerns regarding health safety and security procedures and the methods by which health and safety is communicated

P44 recognise and praise good practice in maintaining health safety and security

P45 review how health safety and security is promoted, and identify opportunities for enhancing the health safety and security culture within the workplace

P46 develop plans to promote health, safety and security, including performance measures, review dates and resources

P47 measure the effectiveness of health and safety plans against past and present performance

P48 prioritise work to make the best use of time and resources

Develop procedures to control risks to health, safety and security in ports

You must be able to:

P49 develop procedures designed to enhance health safety and security in the workplace, in line with legal and organisational requirements

P50 agree clear methods and measures for checking the effectiveness of workplace procedures

P51 agree the training requirements for individuals required to comply with health, safety and security procedures

P52 inform the relevant person(s) of training requirements and arrange training

P53 identify changes in the workplace affecting current workplace health, safety and safety procedures assess their implications and make reasoned suggestions for action

P54 review reports and data for opportunities to improve procedures

P55 contribute to reviewing working practices, identifying any health and safety hazards which could result in serious harm in the workplace

P56 prioritise health and safety regulation and procedure non-compliance, in
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

consultation with relevant person(s)
P57 make reasoned suggestions to control identified hazards, including actions for improving health and safety
P58 agree with the relevant person(s) a follow-up plan for monitoring implementation of agreed actions
P59 maintain accurate and up to date records of the outcomes of reviews and the workplace health and safety procedures
P60 provide health and safety information and advice, in line with legal requirements
P61 record the details of all formal health and safety reviews carried out

Monitor procedures to control health, safety and security risks in ports

You must be able to:
P62 conduct monitoring of the workplace at agreed intervals and in accordance with organisation requirements
P63 confirm that the information available on statutory health, safety and security regulations is up-to-date and from valid sources
P64 check routinely that other persons possess up-to-date information and instructions about hazards and how to deal with risks which may arise
P65 confirm that relevant individuals have received relevant training on how to deal with health safety and security
P66 report hazards representing a significant risk, or which are beyond own responsibility, to the appropriate person
P67 respond to any breaches of health, safety and security procedures in a way which meets workplace and legal requirements
P68 make recommendations for changes to workplace procedures, clearly, to the responsible person
P69 check that records relating to health, safety and security matters comply with legal and workplace requirements and are accessible to those who are authorised to use them
P70 keep accurate and legible records of identified or reported workplace risks
P71 confirm that appropriate precautions to control risks have been agreed with the persons responsible
P72 confirm that precautions are in accordance with legal and workplace requirements
P73 confirm that others are aware of the risks and understand the action to be taken to reduce the risks which can arise
P74 review precautions on a regular basis to ensure that risks are minimized to as low as reasonably practicable
P75 report promptly and accurately any conflicts which exist between
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

workplace and statutory requirements to the persons responsible
P76 ensure reports contain accurate details about the cause of hazards with high risks and make suitable recommendations to minimize their occurrence
P77 prioritise work to make the best use of time and resources
P78 make information available promptly to those who need it
P79 recognise changes in circumstances promptly and adjust plans and activities accordingly
P80 seek opportunities to safely improve working procedures and practices

Undertake port health, safety and security inspections

You must be able to:

P81 prepare and agree a work schedule for the inspection, correctly identifying methods and a prioritised schedule
P82 identify correctly the types of hazards likely to be encountered within the working area and the practices to be inspected
P83 review available records from previous inspections and identify correctly any actions agreed previously for assessment in the proposed review
P84 identify correctly any working practices that are likely to require detailed inspection
P85 obtain authorisation for the inspection correctly from the person responsible for the work area to be inspected
P86 obtain the agreed resources for the inspection
P87 brief all those involved regarding the purpose and process of the inspection
P88 inspect working practices and the workplace itself
P89 identify and address any areas of risk
P90 identify and address non-compliance with the requirements of the organisation and of legislation
P91 prioritise areas of risk or non-compliance
P92 present prioritised risks and non-compliances, with a clear rationale for their order of priority, to the person responsible for the work area
P93 agree recommendations and an action plan for controlling, and where possible removing identified risks
P94 agree with the person responsible for the area a plan for monitoring the implementation and outcomes of the recommendations
P95 ensure that the plan is progressed correctly
P96 record the outcome of the inspection correctly and accurately
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

Knowledge and understanding

You need to know and understand:

K1 the legal responsibilities for maintaining own and others’ health and safety in your workplace
K2 the requirements placed upon the individual and the organisation by current legislation, directions and bye-laws related to workplace health, safety and security
K3 current industry guidance, relating to workplace health, safety and security
K4 own organisation’s policies, procedures and working practices that relate to workplace health, safety and security
K5 the principle types of hazard and risk associated with ports
K6 the precautions appropriate for minimising the risks associated with ports
K7 how to correctly wear, use and maintain personal protective equipment, relevant to port operations
K8 how to locate, correctly use and maintain the principle types of safety and incident response equipment in the port
K9 the accident and emergency procedures of the organisation and individual roles and responsibilities, relevant to ports
K10 location of and how to operate alarm systems
K11 procedures for contacting the emergency services
K12 location of the approved escape routes and assembly points
K13 own responsibilities for reporting accidents and emergencies
K14 the limits of own responsibilities when involved in port operations
K15 roles and responsibilities of others in own area of operations, relating to port operations
K16 the person(s) to whom health safety and security matters should be referred
K17 the information needs of the people in own workplace
K18 why it is important to gain an appreciation of the level of understanding of health, safety and security within the workplace
K19 how to monitor and assess the level of understanding of workplace health, safety and security data
K20 the available sources of valid health, safety and security information relevant to own workplace
K21 how to interpret health, safety and security data kept in the workplace, including that concerning: risk assessments, incidents and complaints
K22 the workplace procedures for communicating with those involved in or affected by own area of operations
K23 the importance of keeping people regularly informed and discussing their involvement in maintaining health, safety and security
K24 how to prepare and write effective policies and procedures
PSSSPO107
Take action to reduce risks to health, safety and security within a port environment

K25  the appropriate measures for checking different types of health, safety and security procedures
K26  what would constitute a breach of health, safety or security regulations
K27  the different working practices present in own area of operations
K28  the work areas and people for whom you are responsible
K29  the appropriate circumstances for reviewing procedures, including: routinely and post incident
K30  the difference between a hazard and a risk
K31  how to maintain effective health, safety and security records
K32  how to communicate effectively
K33  the reasons for maintaining clean and tidy working environments
K34  the principal types and causes of accidents within ports
K35  the role of the health, safety and security enforcing bodies
K36  the principal types of security risk within ports and the potential threat to security which they create
K37  the reasons for maintaining confidentiality when dealing with security
K38  the reasons for wearing and displaying a security badge
K39  the reciprocal procedures required in maintaining security when boarding a vessel alongside
K40  the circumstances when it is appropriate to challenge individuals to justify their presence within the port
This standard is applicable to taking action to reduce risks to health, safety and security, conducting an assessment of workplace risks, promoting health, safety and security, developing procedures to control risks, monitoring procedures to control risks and undertaking health, safety and security inspections, in a port environment.

The performance criteria, knowledge and understanding requirements are related to the individual’s own organisation, job role and area of operations. This includes but is not limited to the individual’s immediate place of work. It extends to areas, operations and persons that may be impacted upon by the individual’s activity in the workplace.

The performance criteria, knowledge and understanding requirements are specific to the: regulations, industry and other guidance recognised by the individual’s employer, employing organisation’s objectives, policies, procedures, and working practices; that relate to the elements covered in this standard.

The performance criteria, knowledge and understanding requirements are specific to the individual’s own level of authority and responsibility.

Ports and the activities which take place there vary. Employers and any other duty holders must comply with the legal duties imposed on them by health and safety legislation, including the Health and Safety at Work Act 1974. This will also involve careful and continuing risk assessments to enable duty holders to plan, implement, manage and review policies and procedures which address the risks associated with the conduct of their business. The statutory duty of the employee to take reasonable care for the health and safety of themselves and other persons who may be affected by their acts or omissions at work and to cooperate with the employer with regard to the employer’s health and safety duties, are an essential part of this standard.
# PSSSPO107

**Take action to reduce risks to health, safety and security within a port environment**

<table>
<thead>
<tr>
<th>Developed by</th>
<th>Port Skills and Safety</th>
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<tbody>
<tr>
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<td><strong>Suite</strong></td>
<td>Supervision of Port Operations</td>
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<td><strong>Key words</strong></td>
<td>Supervision of port operations; port security operations; port safety; ports; vessels</td>
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This standard covers the skills and knowledge required to respond to emergency situations.

The Vessel Traffic Services Operator is required to comply with local, national and international regulations relevant to emergency situations in the Vessel Traffic Services area. The Vessel Traffic Services Operator must prioritise and respond promptly to both internal and external emergency situations, correctly selecting and using the appropriate contingency plan in the event of an emergency. The Vessel Traffic Services Operator must also be able to co-ordinate with and support allied services whilst also maintaining a safe waterway throughout emergency situations.

Additionally, Vessel Traffic Services Operators must be able to respond effectively to internal emergencies within the Vessel Traffic Services Centre. In particular, ensuring the continuity or resumption of services interrupted by incidents that impact the safety and security of the personnel and/or operation.

There are six elements in this standard:

- Comply with local, national and international regulations
- Prioritise and respond to incidents
- Use contingency plans
- Co-ordinate with and support stakeholders and allied services
- Maintain a safe waterway throughout emergency situations
- Respond effectively to internal emergencies within the Vessel Traffic Services Centre

**Target Group**

This standard applies to an authorised Vessel Traffic Services Operator who has a duty to ensure the safety of navigation and protection of the environment within their area.
### Performance criteria

**Comply with local, national and international regulations**

**You must be able to:**

| P1 | recognise the various types of emergencies that may arise in a Vessel Traffic Services area, including collision, grounding, environmental pollution, fire, emergency involving hazardous cargoes, sinking, capsize, man overboard search and rescue incidents |
| P2 | apply local, national and international regulations appropriate to emergency situations in a Vessel Traffic Services area |
| P3 | apply the regulations governing transit of vessels in special circumstances |
| P4 | discharge own responsibilities and within limits of own authority in an emergency situation |
| P5 | report to the appropriate person(s) in an emergency situation |
| P6 | contact supporting and allied services according to the local emergency plan |
| P7 | identify the assets that might be available for deployment |

**Prioritise and respond to incidents**

**You must be able to:**

| P8 | ascertain the nature of the incident using all available means to collect and evaluate essential and relevant data |
| P9 | commence alerting procedures |
| P10 | establish and maintain communications with concerned individuals or units if possible |
| P11 | broadcast navigational warnings |
| P12 | maintain a record of activities relating to emergency situations |
| P13 | identify the objective of recording activities during emergency situations |
| P14 | follow standard operating procedures to record essential and reliable data during emergency situations |
| P15 | keep the recorded information in a safe and secure environment in accordance with standard operating procedures |

**Use contingency plans**

**You must be able to:**

| P16 | identify individual(s) who have the authority to prepare, implement, issue and update checklists |
| P17 | select the correct contingency plan/checklist for the emergency |
| P18 | implement the contingency plan correctly |
| P19 | use checklists appropriately |
PSSVTS008
Respond to emergency situations

Co-ordinate with and support allied services

You must be able to:

P20 maintain communications with emergency response units during emergency situations
P21 maintain communications with vessel traffic during emergency situations
P22 maintain communications with allied services during emergency situations
P23 update situation reports as appropriate

Maintain a safe waterway throughout emergency situations

You must be able to:

P24 maintain a traffic image throughout the emergency situation
P25 maintain a safe waterway throughout the emergency situation in accordance with standard operating procedures and contingency plans
P26 maintain traffic management and monitoring procedures
P27 inform all appropriate authorities in accordance with standard operating procedures

Respond effectively to internal emergencies within the Vessel Traffic Services Centre

You must be able to:

P28 observe safety and security procedures and regulations
P29 relocate and resume operations with minimal loss of services and with as short an interruption as possible in response to events
Knowledge and understanding

You need to know and understand:

K1 the hazards and risks of the workplace that may affect people and the environment
K2 how to make and apply decisions based on the assessment of risk
K3 how to apply practices that maximise the health, safety and welfare of self and others in the workplace
K4 national and international regulations, statutory authority, codes of practice and industry good practice in relation to Vessel Traffic Services and the role of Vessel Traffic Services Officer
K5 own organisation’s policies, procedures and working practices relevant to Vessel Traffic Services operations
K6 the different roles within Vessel Traffic Service operations, their priorities and responsibilities
K7 vessel movement and data record systems, their operating principles and how they are maintained
K8 where to find sources of information relating to port marine and vessel traffic services
K9 lines and methods of communication/reporting in the workplace
K10 principles of effective communication
K11 how verbal and non-verbal communications work
K12 how to collect valid data
K13 how to evaluate data
K14 own organisation’s contingency plans
K15 how to operate equipment and systems in the Vessel Traffic Services area
K16 the assets that might be available for deployment in an emergency situation
The important contribution of Vessel Traffic Services towards maintaining the safety of life at sea, safety and efficiency of navigation and the protection of the marine environment is recognised nationally and internationally. International Association of Marine Aids to Navigation & Lighthouse Authorities (IALA) guidelines on recruitment, qualification and training for Vessel Traffic Services Operators have been adopted and are regulated in the UK through the Maritime and Coastguard Agency. These Vessel Traffic Services National Occupational Standards take cognisance of and complement the IALA guidelines and model courses.

Scope

Traffic management and monitoring procedures include:
1. alternative routing arrangements
2. diversionary procedures (traffic in immediate incident area)
3. anchorage areas
4. introduction of emergency speed restrictions
5. emergency alterations to VTS Sailing Plans and Passage Plans
6. exclusion zones
7. safety control zones

Emergency events to include:
8. terrorism threat
9. fire
10. building evacuation
11. flood
12. prolonged loss of power or other essential services
13. other emergency

Equipment in Vessel Traffic Services areas include:
15. Electronic Navigation Chart (ENC)
16. Geographic Information System (GIS)
17. Automatic Identification System (AIS)
18. shore-based radar + tracking system
19. ship-based radar
20. Automatic Radar Plotting Aid (ARPA)
21. gyro and magnetic compass
Respond to emergency situations

22. echo Sounder
23. speed Log
24. satellite and terrestrial position fixing systems (e.g. Global Positioning System, Long Range Aid to Navigation (LORAN))
25. Local Area Augmentation (e.g. Differential GPS)
26. Automatic Identification System (AIS)
27. Electronic Chart Display and Information System (ECDIS)
28. Integrated Bridge Systems (IBS)
29. Closed Circuit Television (CCTV)
30. Facsimile

The different roles within Vessel Traffic Service operations include:

31. Vessel Traffic Service Operator
32. Vessel Traffic Service Supervisor
33. Vessel Traffic Service Manager
34. Harbour Master
35. Marine Pilot
36. Ship’s Master
37. Bridge Team
38. Other port stakeholders/allied services
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Overview

This standard covers the skills and knowledge required to use radar and tracking systems safely.

The Vessel Traffic Services Operator is required to monitor the serviceability of radar and tracking equipment to determine if the equipment is operating correctly, identify any faults, and to deal with them. Of critical importance is the capability to use marine radar and automatic tracking systems at an operational level, to ensure safety.

There are two elements in this standard:

- Monitor the serviceability of shore-based radar equipment
- Use shore-based radar and tracking systems safely

Target Group

This standard applies to an authorised Vessel Traffic Services Operator who has a duty to ensure the safety of navigation and protection of the environment within their area.
PSSVTS009
Use shore-based radar and tracking systems safely

**Performance criteria**

<table>
<thead>
<tr>
<th>You must be able to:</th>
<th>Monitor the serviceability of shore-based radar equipment</th>
</tr>
</thead>
<tbody>
<tr>
<td>P1</td>
<td>check the alarms and indicators whilst using the equipment</td>
</tr>
<tr>
<td>P2</td>
<td>check and respond appropriately to documentation relating to equipment status</td>
</tr>
<tr>
<td>P3</td>
<td>monitor the operational and functional integrity of the equipment</td>
</tr>
<tr>
<td>P4</td>
<td>take prompt and appropriate reporting action with respect to observed defects and failures</td>
</tr>
<tr>
<td>P5</td>
<td>follow-up reports to ensure equipment is returned to service</td>
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**Use shore-based radar and tracking systems safely**

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<thead>
<tr>
<th>You must be able to:</th>
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<tbody>
<tr>
<td>P6</td>
<td>hold the appropriate qualification approved by the Competent Authority</td>
</tr>
<tr>
<td>P7</td>
<td>conduct a visual safety check of the scanner prior to powering on radar</td>
</tr>
<tr>
<td>P8</td>
<td>ensure no personnel are working in the vicinity of the radar system before powering on radar</td>
</tr>
<tr>
<td>P9</td>
<td>ensure that no permit to work is issued in the vicinity of the radar system before powering on radar</td>
</tr>
<tr>
<td>P10</td>
<td>switch radar components “on” and “off”</td>
</tr>
<tr>
<td>P11</td>
<td>set brilliance control for optimum performance by taking account of the ambient light conditions</td>
</tr>
<tr>
<td>P12</td>
<td>set gain control for optimum performance</td>
</tr>
<tr>
<td>P13</td>
<td>set tuning to peak performance for maximum traffic image</td>
</tr>
<tr>
<td>P14</td>
<td>set ‘anti sea clutter’ control to suit prevailing circumstances</td>
</tr>
<tr>
<td>P15</td>
<td>set ‘anti-rain clutter’ control to suit prevailing circumstances</td>
</tr>
<tr>
<td>P16</td>
<td>carry out radar performance monitoring in accordance with operational procedure</td>
</tr>
<tr>
<td>P17</td>
<td>account for the limitations and anomalies of the equipment when using radar</td>
</tr>
<tr>
<td>P18</td>
<td>select an appropriate radar range scale</td>
</tr>
<tr>
<td>P19</td>
<td>confirm error of variable range marker, take account of the error and obtain target range</td>
</tr>
<tr>
<td>P20</td>
<td>confirm error of the electronic bearing line, take account of the error and obtain target bearing</td>
</tr>
<tr>
<td>P21</td>
<td>confirm blind sectors and anomalies of radar set in use</td>
</tr>
<tr>
<td>P22</td>
<td>consider the effect of correlation/interference rejection systems on radar detection</td>
</tr>
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</table>
PSSVTS009
Use shore-based radar and tracking systems safely

- P23  take account of the limitations of the automatic tracking system in use
- P24  use a shore-based radar and tracking system to manually acquire a target
- P25  enable automatic target acquisition by shore-based radar and tracking system
- P26  interpret shore-based radar and tracking system information
- P27  interpret target vectors and target history (trail)
- P28  set up a guard zone
- P29  take account of the operational limitations of the Vessel Traffic Services shore-based radar and tracking system
- P30  set brilliance control for optimum performance by taking account of the ambient light conditions
- P31  monitor equipment performance according to operational procedures
- P32  tag all participating and relevant traffic in the Vessel Traffic Services area correctly
- P33  acquire all new traffic within and entering the Vessel Traffic Services area promptly
- P34  identify and correct target swaps promptly
- P35  obtain target data and marker data and use it appropriately
- P36  activate and correctly use the tracking system tools/aids including automatic detection and alerting systems
**Knowledge and understanding**

**You need to know and understand:**

| K1 | the hazards and risks of the workplace that may affect people and the environment |
| K2 | how to make and apply decisions based on the assessment of risk |
| K3 | how to apply practices that maximise the health, safety and welfare of self and others in the workplace |
| K4 | national and international regulations, statutory authority, codes of practice and industry good practice in relation to Vessel Traffic Services and the role of Vessel Traffic Services Operator |
| K5 | your own organisation’s policies, procedures and working practices relevant to Vessel Traffic Services operations |
| K6 | the different roles within Vessel Traffic Service operations, their priorities and responsibilities |
| K7 | lines and methods of communication/reporting in the workplace |
| K8 | vessel movement and data recording equipment, their operating principles and how they are maintained |
| K9 | how to communicate clearly and effectively with the range of people involved |
| K10 | principles of effective communication |
| K11 | how verbal and non-verbal communications work |
| K12 | how to collect valid data |
| K13 | how to evaluate data |
| K14 | own organisation’s contingency plans |
| K15 | operating theory and limitations of shore-based radar and tracking systems |
| K16 | how to operate shore-based radar and tracking systems |
| K17 | factors affecting radar detection and interpretation |
| K18 | theory, limitations and use of manual plotting, manual tracking and Automatic Identification Systems (AIS) for tracking |
The important contribution of Vessel Traffic Services towards maintaining the safety of life at sea, safety and efficiency of navigation and the protection of the marine environment is recognised nationally and internationally. International Association of Marine Aids to Navigation & Lighthouse Authorities (IALA) guidelines on recruitment, qualification and training for Vessel Traffic Services Operators have been adopted and are regulated in the UK through the Maritime and Coastguard Agency. These Vessel Traffic Services National Occupational Standards take cognisance of and complement the IALA guidelines and model courses.

**Scope**

The different roles within Vessel Traffic Service operations include:

1. Vessel Traffic Service Operator
2. Vessel Traffic Service Supervisor
3. Vessel Traffic Service Manager
4. Harbour Master
5. Marine Pilot
6. Ship’s Master
7. Bridge Team
8. Other port stakeholders/allied services
## PSSVTS009

**Use shore-based radar and tracking systems safely**

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Overview

This standard covers the skills and knowledge required to provide a vessel traffic service.

The core purpose of the Vessel Traffic Services Operator is to improve the safety and efficiency of navigation, safety of life at sea and the protection of the marine environment.

A Vessel Traffic Services Operator can contribute to this through the provision of information, advice or instructions, dependent on the level of service provided.

There are three elements in this standard:
- Provide an Information Service (INS)
- Provide Traffic Organisation Service (TOS)
- Provide Navigational Assistance Service (NAS)

Target Group

This standard applies to an authorised Vessel Traffic Services Operator who has a duty to ensure the safety of navigation and protection of the environment within their area.
Provide Vessel Traffic Service

**Performance criteria**

**Provide an Information Service (INS)**

**You must be able to:**

P1 follow the specified watch handover procedures on taking over the watch

P2 develop and maintain a traffic image using all available aids and resources

P3 meet authorisation requirements from the Vessel Traffic Services Authority to provide an Information Service

P4 provide each vessel with a traffic image applicable to it

P5 provide the service as broadcasts of information as appropriate including: at fixed times, when deemed necessary by the Vessel Traffic Services Authority and at the request of a vessel

P6 use all available means to ensure that essential and relevant information becomes available to participating vessels in time for on-board navigational decision-making

P7 recognise developing dangerous situations promptly and take appropriate action

**Provide Traffic Organisation Service (TOS)**

**You must be able to:**

P8 obtain briefing on significant vessel traffic in the Vessel Traffic Services area before taking over watch

P9 develop and maintain a traffic image using all available aids and resources

P10 meet authorisation requirements from the Vessel Traffic Services Authority before providing a Traffic Organisation Service

P11 provide a Traffic Organisation Service to prevent the development of dangerous maritime traffic situations and to improve the safe and efficient movement of vessel traffic within the Vessel Traffic Services area

P12 use all available means to provide all significant vessel traffic in the Vessel Traffic Services area with a domain of safety, including rules and regulations, geographical division and time and distance separation

P13 operate a system of traffic clearances for vessels that are required to participate

P14 ensure that instructions and advice you give as part of a Traffic Organisation Service are result orientated, leaving the details of the execution to the vessel

P15 monitor the traffic and enforce adherence to governing rules and regulations and action traffic infringements in compliance with operating procedures

P16 identify developing dangerous situations and take early and effective
action in accordance with standard operating procedures

P17 take early and effective action to facilitate the safe and efficient movement of vessel traffic within the Vessel Traffic Services area in support of commercial operations in accordance with standard operating procedures

Provide Navigational Assistance Service (NAS)

You must be able to:

P18 obtain a briefing on significant vessel traffic in the Vessel Traffic Services area before taking over watch

P19 develop and maintain a traffic image using all available aids and resources

P20 meet authorisation requirements from the Vessel Traffic Services Authority to provide a Navigational Assistance Service at the request of a vessel (Requested) and also when deemed necessary by VTS (Observed)

P21 distinguish the difference between a Observed and Requested Navigational Assistance Service

P22 elect to use a dedicated frequency as required by operating procedures or the special circumstances of the case

P23 use an alternative frequency and ‘lost communications’ procedure when providing a Navigational Assistance Service

P24 impose traffic restrictions ensuring that the type, beginning and end of the Navigational Assistance Service is clearly stated and agreed with the vessel

P25 warn vessel traffic promptly of developing dangerous situations

P26 warn vessel traffic promptly of grave or imminent danger

P27 provide a Navigational Assistance Service including information on courses and speeds, positions relative to fairway axis and waypoints, positions, identities and intentions of surrounding traffic and warnings of dangers

P28 take own workload into account during provision of a Navigational Assistance Service including number of vessels being monitored or advised and other responsibilities and activities

P29 ensure that any advice or recommendation given when providing a Navigational Assistance Service is result orientated
Knowledge and understanding

You need to know and understand:

K1  the hazards and risks of the workplace that may affect people and the environment
K2  how to make and apply decisions based on the assessment of risk
K3  how to apply practices that maximise the health, safety and welfare of self and others in the workplace
K4  national and international regulations, statutory authority, codes of practice and industry good practice relation to Vessel Traffic Services and the role of Vessel Traffic Services Operator
K5  own organisation’s policies, procedures and working practices relevant to Vessel Traffic Services operations
K6  the different roles within Vessel Traffic Service operations, their priorities and responsibilities
K7  lines and methods of communication/reporting in the workplace
K8  vessel movement and data recording equipment, their operating principles and how they are maintained
K9  how to communicate clearly and effectively with the range of people involved
K10 Vessel Traffic Services record systems and their use
K11  how to provide an Information Service, including reports on the position, identity and intentions of other traffic, waterway conditions, weather, navigational hazards and any other factors that may influence the vessel’s transit
K12  how to provide Traffic Organisation Service including the forward planning of vessel movements, congestion and dangerous situations, the movement of special cargo or vessel, traffic clearance systems, sailing plans, routes to be followed and adherence to governing rules and regulations
K13  how to provide a Navigational Assistance Service to assist in the navigational decision making process on board and to monitor its effects
K14  that a Navigational Assistance Service is particularly relevant to difficult navigational circumstances, difficult meteorological condition and vessel defects or deficiencies
K15  that a Navigational Assistance Service involves the Vessel Traffic Services Operator providing navigational advice to the bridge team and that they can become involved in the on-board decision making process ensuring a course of action is agreed
K16  how to use message markers when providing a vessel traffic service
The important contribution of Vessel Traffic Services towards maintaining the safety of life at sea, safety and efficiency of navigation and the protection of the marine environment is recognised nationally and internationally. International Association of Marine Aids to Navigation & Lighthouse Authorities (IALA) guidelines on recruitment, qualification and training for Vessel Traffic Services Operators have been adopted and are regulated in the UK through the Maritime and Coastguard Agency. These Vessel Traffic Services National Occupational Standards take cognisance of and complement the IALA guidelines and model courses.

**Scope**

The different roles within Vessel Traffic Service operations include:

1. Vessel Traffic Service Operator
2. Vessel Traffic Service Supervisor
3. Vessel Traffic Service Manager
4. Harbour Master
5. Marine Pilot
6. Ship’s Master
7. Bridge Team
8. Other port stakeholders/allied services
# PSSVTS010
## Provide Vessel Traffic Service

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