



Government of **Western Australia**
Department of **Mines, Industry Regulation and Safety**

GUIDE

Development and submission of a diving safety management system

as required under *Petroleum (Submerged Lands) Act 1982* and
Petroleum (Submerged Lands)(Diving Safety) Regulations 2007





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Guides

A guide is an explanatory document that provides more information on the requirements of legislation, details good practice and may explain means of compliance with standards prescribed in the legislation. The government, unions or employer groups may issue guidance material.

Compliance with guides is not mandatory. However, guides could have legal standing if it were demonstrated that the guide is the industry norm.

This Guide has an operations focus and is set out in the context of risk assessment and legislative requirements of all responsible persons. Consequently, each operation needs to understand its limitations and skills base.

The Guide is based on current experience and is not claimed to be complete.

Who should use this Guide?

You should use this Guide if:

- you are a diving contractor operating in Western Australian waters
- you are required to develop and maintain a diving safety management system (DSMS) and diving project plan required under the Petroleum (Submerged Lands) (Diving Safety) Regulations 2007.

Acknowledgement

A DSMS must meet the minimum standards set out in the document initially published by the Department of Industry, Tourism and Resources (Commonwealth) and known as *Guidelines for complying with the Petroleum (Submerged Lands) (Diving Safety) Regulations 2002* as that document is in effect from time to time [r. 7].

The Act

The Petroleum (Submerged Lands) Act 1982 (the Act) sets objectives to operators of offshore facilities for the safe operation of those facilities and for diving operations being undertaken by contractors.

The Act sets out broad duties, and is supported by regulations, together with codes of practice and guides.

Regulations

Petroleum (Submerged Lands) (Diving Safety) Regulations 2007 (the Regulations) provide more specific requirements for a range of activities.

The Regulations are subsidiary legislation enabled by the Act and are enforceable and breaches may result in prosecution, fines, or directions to cease operations and undertake remedial action.

Application

This Guide is a non-statutory document provided by the Department to assist persons subject to duties under the Act and/or required to develop and/or comply with a safety case as prescribed by the Regulations.

Other legislation

It should be noted that this Guide only covers the Act and the Regulations. Separate guides are available for the development of safety cases, pipeline management plans and safety management systems for the following legislation:

- *Petroleum (Submerged Lands) Act 1982*
- Petroleum (Submerged Lands) (Management of Safety on Offshore Facilities) Regulations 2007
- Petroleum (Submerged Lands) (Pipelines) Regulations 2007
- *Petroleum Pipelines Act 1969*
- Petroleum Pipelines (Management of Safety of Pipeline Operations) Regulations 2010
- *Petroleum and Geothermal Energy Resources Act 1967*
- Petroleum and Geothermal Energy Resources (Management of Safety) Regulations 2010

For facilities, pipelines, operations and other activities outside the Western Australian State Waters, the Act does not apply. Guidance should be sought from the National Offshore Petroleum Safety and Environmental Management Authority (NOPSEMA) or other relevant State or Territory authority.



Foreword

A key area of responsibility for the personnel at Department of Mines, Industry Regulations and Safety (the Department) is the ongoing administration of risk management and safety requirements for the offshore facilities, submerged pipelines and diving activities within Western Australia waters. To this end a series of guides has been developed to provide support and assist licensees, operators and diving contractors to meet their commitments under the requirements of the *Petroleum (Submerged Lands) Act 1982* and regulations.

This guide relates to the requirement for diving contractors to develop and submit a DSMS for review and acceptance by Department assessors. It provides the opportunity to put forward their case for safety in their various diving activities and to demonstrate the systems, capabilities, leadership and workforce involvement as well as continual improvement of existing systems.

It is important that both industry and the Department follow a path of continual improvement by demonstrating quality in safety and risk management and ensuring the workforce is given a leading role in their own safety.

Steve Emery

Acting Director Dangerous Goods and Petroleum Safety

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Foreword	IV
1 Introduction	2
1.1 Structure and scope	2
1.2 Concordance tables	2
2 Preparation of a diving safety management system	3
2.1 Planning and liaising with Department inspectors	3
2.2 Content of DSMS	3
2.3 No diving without current accepted DSMS	4
2.4 No diving without approved or accepted diving project plan	4
2.5 Projects where no operator is in place	4
2.6 Referencing and hyperlinking within diving safety management system or diving project plan	4
2.7 Involvement of members of the workforce	4
3 Diving safety management system	5
3.1 Introduction	5
3.2 Leadership and commitment	6
3.3 Planning	7
4 Submission and assessment of the DSMS	14
4.1 Acceptance of a new DSMS	14
4.2 Revision of DSMS	14
4.3 Grounds for rejecting diving safety management system	14
4.4 DSMS register	14
4.5 Revision after five years	14
5 Diving project plans	17
5.1 Diving project plans	17
5.2 Appointment of diving supervisors	18
5.3 Approval of diving project plan by operator	18
Appendix 1 Legislative provisions	20
Appendix 2 Glossary	21
Appendix 3 Concordance table	22
Appendix 4 Further information	26



1 Introduction

This document provides guidance to diving contractors for the development of a DSMS, under the Act.

Each DSMS must be submitted for acceptance by the Minister for Mines and Petroleum through his delegate in the Department of Mines, Industry, Regulations and Safety (the Department).

Regulation 7(1) states:

A DSMS must meet the minimum standards set out in the document initially published by the Department of Industry, Tourism and Resources (Commonwealth) and known as *Guidelines for complying with the Petroleum (Submerged Lands) (Diving Safety) Regulations 2002* as that document is in effect from time to time.

This Guide provides a high level concept of how the diving contractor should approach the development of their DSMS. The guidelines referenced above provide a detailed description of the content requirements which the DSMS must meet.

As NOPSEMA reference the 2002 guidelines, where a diving contractor has developed a DSMS that has been formally accepted in writing by NOPSEMA, then that DSMS may be used to form the basis of a DSMS for diving operations within the WA waters. The WA version of the DSMS should be submitted to the Department for review together with a copy of the formal letter of acceptance from NOPSEMA.

1.1 Structure and scope

This document is set out to reflect the areas of a DSMS and diving project plan and provide an overview of the required contents to comply with the Act and regulations.

The following appendices are included:

- Appendix 1 Legislative provisions
- Appendix 2 Glossary of terms
- Appendix 3 Concordance table
- Appendix 4 Further information.

1.2 Concordance tables

In order to assist diving contractors preparing the DSMS documentation, a concordance table has been developed to support this Guide. It is suggested that the diving contractor include a concordance table in an appendix to the DSMS and the diving project plan listing the regulations and the corresponding section of the DSMS or diving project plan.

Completion of the concordance table during the development and internal review of the DSMS or diving project plan by the diving contractor should verify that sufficient information has been included and each element of the legislation has been covered effectively. The concordance table for the DSMS or diving project plan can act as a self-assessment tool for the diving contractor and avoid possible delays in the acceptance of the DSMS by the Department.

In order to assist diving contractors preparing DSMS and diving project plan documentation, two concordance tables have been developed, one for the DSMS and another table for the required diving project plan.



2 Preparation of a diving safety management system

The DSMS outlines how the diving contractor will undertake diving projects and the systems in place to manage health and safety of personnel, hazard identification and risk management.

The document should emphasise consultation, workforce participation and a continual improvement approach to safety and risk management.

The diving contractor must ensure the document is updated regularly, as required, for any significant changes for new or increased risks, equipment or operational changes and at five yearly intervals after the DSMS was first accepted by the Minister (Section 3.1.5).

2.1 Planning and liaising with Department inspectors

Diving contractors should ensure that appropriate planning is in place for the development of the DSMS.

It is strongly recommended that diving contractors meet with Department inspectors prior to the commencement of a new DSMS or a five yearly update of a DSMS. The process for reviewing and gaining approval of DSMS documents is extensive and cannot be completed quickly. By meeting with Department personnel, diving contractors will be able to review and discuss the proposed diving activities to be conducted as well as the contractor's approach to managing those activities. The Department does not provide a consultancy service to review drafts of DSMS documents.

Developing this interaction with Department inspectors early in the process provides the basis of a good working relationship and an understanding of requirements between the diving contractor and the Department. This will identify and eliminate possible adverse effects on such things as the calculation of the safety levy applicable to the diving activities, and any inconsistencies arising throughout the DSMS that could be addressed prior to completion and submission for review and acceptance by the Department.

2.2 Content of DSMS

Fundamentally, the DSMS should demonstrate two key points.

First it should describe the systems used by the operator to define:

- how hazards are identified and risk assessed
- how the risk is managed to ALARP, verified, validated and kept up to date.

Second, it should show the outcomes from applying those systems to define:

- what hazards are on site
- what is the risk associated with the hazard
- results of the ALARP verification and validation.

The DSMS may be described as a detailed and documented commitment from the diving contractor to the WA State Government outlining:

- all types of diving activities to be undertaken
- an overview of equipment type, any relevant certification required and used as well as sufficient backup and support resources
- the identification of hazards and risk management associated with those hazards
- the safety management arrangements to address the findings of those risk management studies
- emergency management plans and resources for the project.

The DSMS should emphasise consultation, workforce participation and a continual improvement approach to safety and risk management.

It is the responsibility of the contractor, not the Department, to itemise what is required for safety and/or legislative compliance. The contractor must:

- define the diving activity
- identify the process of how the diving activity will be conducted safely
- show ALARP justification
- summarise the activity for inclusion in the DSMS.

The DSMS content is the basis of inspections against which Department inspectors will conduct periodic inspections and assessments of the contractor's diving activities. It should cover all diving activities likely to take place, including those of contractors and subcontractors (Section 3).



2.3 No diving without current accepted DSMS

A diving contractor must not carry out any part of a diving operation that is part of a diving project unless the diving contractor has a current accepted DSMS for the project [r. 6].

The Minister must within 60 days of receiving a DSMS, notify the diving contractor if the DSMS is accepted or rejected and of any conditions on acceptance [r. 8]. The Regulations do not specify a provision for additional information prior to acceptance of a submitted DSMS, as this requirement should normally be included in the written request for such information by the Department. If a DSMS does not adequately comply with rr. 7 or 21, this may result in the submitted DSMS being rejected [r. 10].

2.4 No diving without approved or accepted diving project plan

A diving contractor must not conduct diving operations without an approved or accepted diving project plan [r. 15]. The diving project plan is developed by the diving contractor in consultation with and for the approval of the operator of the facility from which the diving activities are to be conducted.

A copy of the diving project plan must be provided to the Department if requested.

2.5 Projects where no operator is in place

Where a diving project plan is required for a diving project where no operator has been appointed, the diving contractor must liaise directly with the owner/ licensee of the assets involved in the diving project for the development of the diving project plan.

Where no operator has been appointed it is the responsibility of the diving contractor to liaise directly with the Department with regard to acceptance of the DSMS and the diving project plan.

2.6 Referencing and hyperlinking within diving safety management system or diving project plan

There are many requirements to reference the diving contractor's procedures and other documentation summarised within the DSMS/diving project plan.

As many operators now maintain their documentation within online databases, it is preferred that, where possible, these referenced documents are hyperlinked to provide ease of access.

If a contractor wishes to refer to another document from within the DSMS/diving project plan then this subordinate document needs to be:

- identified in the DSMS/diving project plan
- available to the Department for review as part of the overall review and assessment of the DSMS/diving project plan
- able to be used as the basis for inspection by the Department both confirming that the document complies with legislation and that the contractor is conforming with the document
- identified in some manner as being linked to the DSMS or diving project plan
- maintained under document control to ensure that only the current version is available to personnel and previous versions have been archived
- a controlled document that is subject to the same change controls as the parent DSMS or diving project plan and all changes are recorded and available for review
- subject to the same internal quality assurance and quality control compliance as the parent DSMS or diving project plan to ensure that referenced documents meet the legislation and are being complied with.

The DSMS should include an overview of the content of the referenced document provided with the hyperlink. A single sentence under the heading of a regulatory requirement that includes the hyperlinked document is not sufficient content for the DSMS.

2.7 Involvement of members of the workforce

The diving contractor should ensure that divers, subject matter experts and other relevant members of the workforce are involved in the development or revision of the DSMS or diving project plan [rr. 16, 21] (Section 3.2.5).

Involvement of members of the workforce guide assists with this requirement.



3 Diving safety management system

The required contents of a DSMS are outlined in the regulations [r. 7(2)-(4)].

3.1 Introduction

This section of a DSMS should cover the administrative requirements for the DSMS.

A general overview should include details of the corporate structure of the diving contractor's legal entity including:

- the full name of the organisation
- address and contact details for any communications
- a brief overview of capabilities and experience of the diving contractor
- the meaning of diving [r. 4]
- duration of diving operations [r. 5].

3.1.1 Scope and objectives

Briefly outline the scope and objectives of the DSMS demonstrating that the diving contractor has a management system capable of systematically and continuously identifying, assessing and eliminating/minimising the hazards/risks to personnel in relation to diving operations.

Provide an overview of the management of the DSMS taking into account effective start and stop dates of when the DSMS is active and how this will be tracked and communicated to the Department. Include details of this in the management system section of the DSMS which should be cross-referenced in this section. For the DSMS to be classed as inactive, there must not be any activities taking place. Effective management of this process is critical to accurate calculation of the safety levy applicable for the DSMS.

Summarise how interaction with other facilities, vessels and projects will be managed, including the possible need to develop bridging documentation and simultaneous operation requirements. Cross-reference to the management system section providing more detail of this requirement.

3.1.2 Legislation, codes and standards

Include a list of legislative and statutory requirements applicable to the DSMS and the proposed activities.

List the principal Australian and international standards and codes of practice together with industry guidance used during the preparation of the DSMS, or will be part of the operational requirements under which diving activities will be conducted.

It is recommended that these are clearly set out in table format for ease of reference (Section 3.3.4).

Any changes should then be reviewed by the relevant subject matter experts, and procedures and processes updated through the management of change process (Section 3.3.9).

3.1.3 Definitions and abbreviations

Definitions and abbreviations need to be included for all acronyms or terms used throughout the DSMS. Depending on the preferred structure of the document, the list may be included under the Introduction section or in an appendix to the DSMS. If included in an appendix then this should be referenced within this area of the introduction.

For accuracy and consistency the diving contractor should use the definitions within the Act and Regulations in the DSMS [s. 4 and sch.5 the Act and r. 3 of the Regulations].

3.1.4 Acceptance details of DSMS

For ease of reference regarding the currency of the DSMS, it is suggested that details of the date of acceptance of the DSMS, together with details of the regulatory authority and the legislation under which it has been accepted be included at the beginning of the DSMS.

The officer approving the DSMS must have the power to impose the requirements of the DSMS on all personnel including joint venture partners and contractors.

3.1.5 DSMS lifecycle requirements

The DSMS should be monitored and updated as and when the diving contractor identifies the need to do so – either to incorporate significant changes in the way safety is being managed for diving, new or increased risks identified, or when there is a requirement for simultaneous operations and bridging documentation to include activities not already covered in the DSMS.

It is important that the diving contractor ensures that any proposed revisions are done taking into account the timescales set out in the Regulations and that the revised DSMS can be reviewed and accepted by the Department prior to conducting any diving operation and/or activity.

This section should reflect the requirements of the revision of DSMS depending on whether the revision is due to a change in circumstances [r. 13] or requested by the Minister [r. 14].

It is important that the contractor establishes a method of tracking the required revisions of the DSMS. Regardless of the number of revisions made to the DSMS under r. 13(1) there is a requirement to complete a revision five years after the day of the initial acceptance of the DSMS by the Minister, and every



subsequent five yearly period after acceptance by the Minister [r. 13(2)].

Further explanatory details for submission, review and acceptance of a DSMS are included in Section 4 of this Guide.

3.1.6 Start-up notices

Start-up notices should be submitted to the Department by the operator at least 14 days before the day on which the first diving operation under the project is expected to take place [r. 30].

The contractor should include a section in the DSMS covering this requirement and detail how it will be monitored to ensure compliance within the specified timescale for each submission of a required start-up notice.

If there is no operator in relation to a diving project then the diving contractor responsible for the diving project must not allow the first diving operation to commence if a start-up notice has not been submitted within the required timeframe [r. 30(3)].

3.2 Leadership and commitment

3.2.1 Policy and leadership

This section should include an overarching statement relating to the policy and leadership of the diving contractor and reference a current occupational safety and health policy, a signed copy of which should be an appendix to the DSMS.

Outline the leadership commitment to occupational safety and health requirements and the provision of adequate resources to ensure compliance with the contractor's DSMS and provide a safe work environment.

3.2.2 Compliance

Include a statement to the effect that all personnel are required to comply with and enforce the provisions of the relevant legislation, including Schedule 5 of the Act describing duties of operators, employers and employees.

All personnel involved in diving operations are required to comply with the contents of the DSMS and diving project plan [r. 22].

This should be supported by a statement that these details are included in the occupational safety and health induction and training required to be completed by all personnel.

3.2.3 Diving safety management system overview

The contractor's DSMS should provide details of:

- how the system is integrated
- any certification over the system (e.g. AS/ANZ ISO 9001 *Quality management systems*, AS/NZS ISO 14001 *Environmental management systems* and AS/NZS ISO 45001 *Occupational health and safety management systems*)
- how the documentation is available to all personnel as and when required.

3.2.4 Organisation and responsibility

This should include organisation charts to demonstrate the command structure in place for the DSMS, using position titles to maintain the currency of the chart in the event of staff changes. Include details of key occupational safety and health responsibilities for identified management positions. Include a reference to internal documentation that may include full details of accountability and responsibility.

3.2.5 Workforce involvement and communication

The contractor should outline how they maintain effective workforce participation and consultative mechanisms of safety, the control of workplace hazards and risks and the development of the DSMS and diving project plan (Section 2.7).

Detail in this area the methods of communication including pre-start and toolbox meetings, minutes and notice boards. Any relevant internal documents covering these activities should be listed as referenced documents under this section.

Involvement of members of the workforce guide assists with this requirement.

3.2.6 Employee selection, competency and training

Describe in this section the process used by the diving contractor for employee selection and who is responsible for this process. Include referenced documents covering the contractor's recruitment process, training and competency reviews.

Include reference to the need for industrial certificates and high risk licenses to be held by members of the workforce required to perform these tasks and how these are monitored to stay current.

The diving contractor should have a process in place for inductions of all members of the workforce whether employees, contractors or sub-contractors. Demonstrate how all members of the workforce, including contractors and sub-contractors comply with the DSMS, diving project plans [r. 31].



Describe the ongoing process for continual training requirements for the workforce covering how these requirements are identified, reviewed and managed. Include requirements for specialist training requirements and how any additional training is identified when personnel move to new positions.

A list of the contractor's internal referenced procedures and processes should be included and where possible hyperlinks to the documents should be used within the DSMS.

3.2.7 Resources

Include details of how the contractor manages resources for the effective and safe operation of the diving activities. The contractor should demonstrate sufficient resources (financial, human, including specialists advisers) are available to implement the health and safety policy and maintain and improve the DSMS. List referenced internal documents to support this requirement.

3.3 Planning

3.3.1 Diving project plan

The diving contractor must develop diving project plans in conjunction with the operator, or, where there is no operator, with the Department. The diving project plans are detailed plans developed to undertake specific diving projects. The plans must take into account the specific requirements of the particular diving activities and dive site and must form a bridging document between the operator's safety case and the diving contractor's DSMS.

The diving project plan must cover the general principles of the diving techniques to be used as well as the needs of the particular operation. It must outline contingency procedures for any foreseeable emergency, including retrieving injured and unconscious divers from the water.

3.3.2 Hazard identification and risk management

The DSMS should demonstrate the key methods of hazard identification and risk management. It should be robust and fully detail the characteristics of the risk management system in place including the:

- organisation
- people
- processes
- data
- tools
- quality assurance and improvement.

The diving contractor should outline the policies, standards and procedures that are in place for the systematic identification, assessment and control of hazards and risk associated with the design,

development, operation and abandonment of the diving project. This should include:

1. The contractor's risk acceptance criteria and basis for selection:
 - qualitative and/or quantitative organisational objective
 - regulatory requirements
 - current codes of practice and industry standards.
2. Scope, methods and timings for undertaking periodic formal and informal task level identification of hazards and assessment of risk to health and safety associated with the diving system and technology and work activities at each stage of the diving project.
3. Hierarchy of risk reduction measures used for the control of risk in order of preference:
 - elimination
 - substitution
 - engineering
 - procedures
 - training
 - PPErelating to control, mitigation, and recovery.
4. Methods used to ensure that risk levels are systematically reduced to ALARP.
5. Methods of ensuring appropriate and competent personnel (including diving project personnel, where appropriate) are involved in the identification of hazards and selection of risk reduction measures.
6. Methods used to document, review and keep current information obtained during the formal hazard identification and assessment process and the selected control measures.
7. Methods for ensuring risk reduction measures are implemented and maintained for ongoing control and where identified as necessary, improvement of those controls.
8. Method used to review the overall effectiveness of the risk management system. Events that may prompt a review of hazards information include:
 - a planned major change by the operator or the diving contractor
 - a major incident (for the operator, diving contractor or in the industry generally)
 - industry experience
 - a scheduled hazard review.
9. General approach used for hazard identification and risk management.
10. Measures of risk reduction used.



Communication of hazards and risk management with personnel is critical and the diving contractor should identify arrangements for:

1. Informing personnel of the risk management system and their role in identifying and controlling hazards and risk at the diving project.
2. Communication to personnel of day to day changes in the existing and newly identified hazards on the diving project.
3. Communication to personnel of day to day changes in the status of control measures at a diving project.

The diving contractor should identify any specific requirements that need to be considered in the hazard identification and risk management process, namely:

1. Initiating events and possible escalation factors are considered in the risk assessment for identified hazards.
2. Physical and human factor hazards and risk associated with safety critical tasks (including maintenance tasks) are identified and assessed.
3. How results are used in establishing organisational and diving project objectives.

It is expected that there will be numerous internal contractor documents that relate to hazard identification and risk assessment and these should be listed and hyperlinked as reference documents under the relevant section showing both the document number and title of the document.

The *Hazard identification and risk assessment and management including operational risk assessment* guides assist with these requirements.

3.3.3 Objectives, plans and performance targets

This section should cover objectives and plans for satisfying legislative compliance and quality system management. Provide evidence with statistical data demonstrating how these requirements and responsibilities for all aspects of occupational safety and health management will be met.

The data should include details of positive performance indicators (PPIs) as well as other key performance indicators (KPIs) covering data on lag statistics.

Plans should be developed showing measurable and achievable health and safety objectives implemented for relevant function and levels within the organisation and for the facilities including diving operations and connected activities. Include details on how achievements against these targets and objectives are to be routinely reviewed.

Plan implementation is monitored and performance against standards is appraised. Include details of how various management levels of the organisation are held accountable for meeting safety and health performance standards.

Plans should be updated regularly to reflect changes in performance standards, or outcomes of appraisals of system effectiveness.

Include a reference to the communication methods used for personnel to be kept aware of the safety objectives, plans and performance standards and the subsequent level of achievement against the targets and objectives.

3.3.4 Sources of information

The contractor needs to identify how they maintain regulatory compliance management for the DSMS. This should cover an overview of the various areas:

- monitoring for changes in legislation
- monitoring for changes to any of the Australian or international standards used in the diving activities
- reviewing relevant equipment/product information
- reviewing safety bulletins issued by regulators and industry bodies (e.g. Health and Safety Executive (UK) and International Marine Contractors Association (IMCA))
- monitoring of the relevant chemical database websites for changes in safety data sheet (SDS) content for chemicals used.

This should be monitored by ongoing internal audits to ensure current information is available and used as appropriate.

In the event that change to the contractor's DSMS or diving project plan and supporting procedures and processes is required, this should be managed through the management of change process (Section 3.3.9).

3.3.5 Management system documentation

The DSMS should describe records management and document control of all records and documents developed in the course of diving activities.

A concise overview of the methods used should be included in the DSMS with reference to the contractor's internal processes and procedures for management of the key elements of the DSMS. Include details of development, review and authorisation of procedures and that records are retained in accordance with an approved retention schedule.

The section should include details of where documents are located and that they are readily available to personnel as and when required.



3.3.6 Records

Apart from the normal requirement of any business to retain records covering inspection, testing and monitoring of equipment, the Regulations require diving records to be retained by the diving supervisor and the individual divers [r. 33 and 34].

The diving supervisor records and the diver logbooks must be retained for a period of at least seven years after the date of the last entry in either of these records.

The contractor must detail their procedures and processes in place for the management of these records, that they are easily accessible if and when required and a retention schedule is in place to manage archiving and destruction of old records no longer required.

3.3.7 Design, construction and commissioning

A diving contractor should demonstrate that hazards and risk associated with the development, construction and commissioning of a diving project and its plant, equipment and systems are eliminated, or reduced to as low as reasonably practicable.

This should cover details for design input and output, design review and validation and handover from the design project group to the operational diving personnel.

3.3.8 Simultaneous operations

A diving contractor should consider there may be times when there will be simultaneous operations taking place around facilities, vessels, pipelines and other diving operations as well as connected vessels which may be operating under separate safety cases. In these circumstances, the diving contractor should demonstrate that there is provision for the development and acceptance of appropriate bridging documentation between their DSMS and the relevant safety cases or pipeline management plans in place for these simultaneous operations [r. 16(1)(j)].

Bridging documents and simultaneous operations (SIMOPS) guide assists with this requirement.

3.3.9 Management of change

The DSMS should include a section detailing the management of change to all areas of the diving operation or its management. This section should include an overview of all areas of the operation that may be impacted by changes, such as, changes to:

- engineering
- procedures and processes
- standards
- diving equipment
- components
- tools/equipment
- organisational changes.

The management of change section of the DSMS must outline the methodology for the communication of any changes put in place by any of the above examples and any other areas of change not already identified above. The DSMS must outline the requirements used to effect the change, its authorisation and implementation as well as risk assessment of any possible effects the change may have on other areas of the diving activities [r. 7(4)(b)].

All relevant internal documents covering any aspect of change on the DSMS should be listed as a referenced document in this section.

3.3.10 Purchasing and control of materials and services

Under the DSMS the diving contractor should have in place purchasing procedures and processes for procurement of goods and services for diving activities. The procedures for procurement should contain a requirement for assessment of fit for purpose requirements of any products being purchased and that contractors and sub-contractors have suitable processes in place to ensure their products or services meet the health and safety criteria [r. 7]. The contractor should have in place a list of approved suppliers who have been assessed as meeting these requirements.

The DSMS should outline the contractor's non-compliance procedure for identifying and checking incoming goods that do not meet the requirement of the purchase order raised. For example, demonstrating if goods are returned to the supplier or managed in some other way through the purchasing process.

Relevant procedures and processes that manage procurement should be referenced in this section to avoid inclusion of too much detail.

3.3.11 Safe operating procedures

The DSMS must include a section on safe operating procedures for the diving project that effectively manage risk arising from operations. The contractor should demonstrate that standard operational procedures are in place for both routine and non-routine work activities.

Safe operating procedures should include:

- permit to work – this procedure should include:
 - authorisation and issuing permits
 - distribution and display of permits
 - isolation procedures
 - hazard identification and risk management
 - simultaneous operations
 - change in operating status
 - close out of permits



- simultaneous and non-routine activities – including:
 - the control of safety critical, simultaneous and non-routine activities
 - restrictions on activities when all or parts of key safety systems are unavailable
- maintenance operations – including:
 - operation of plant and equipment, auxiliary equipment and utilities
 - planned maintenance activities
 - breakdown and emergency maintenance activities
- safe work – including:
 - working at heights
 - working over the side
 - confined space entry
 - pressure testing.

A list of the contractor's referenced internal documents should be included.

3.3.12 Safety before and during diving operations

Regulation 23(1) outlines the need for the diving contractor to make available for inspection of all persons taking part in the diving operation a copy of:

- the instrument by which the diving supervisor was appointed
- the accepted DSMS for the project
- the applicable diving project plan.

The contractor should include a section within the DSMS on how this will be achieved and if appropriate, what evidence is retained that these documents have been viewed and understood by the persons involved (Section 3.2.2).

3.3.13 Diving depths

The contractor should ensure that there is provision under the safe operating procedures to demonstrate their compliance with r. 24.

The DSMS should include a description of the procedures in place to ensure compliance with this regulation and how this is monitored to ensure adherence to required diving depths.

3.3.14 Diving operations not at facilities

Regulation 25 sets out requirements for safe operating procedures and processes for any diving operations that are not conducted from a facility.

This area of the DSMS should give an overview of the procedures and processes in place to ensure that all reasonably practicable steps have been taken to:

- ensure that the physical environment at the place where diving operations are carried out is safe and without risk to health
- ensure that any plant, equipment, materials and substances used in connection with the diving operation are safe and without risk to health
- implement and maintain systems of work for carrying out the diving operation that are safe and without risk to health
- ensure that there is provided a means of access to, and egress from, the place where the diving operation is carried out that is safe and without risk to health
- provide all the persons taking part in the diving operation with the information, instruction, training and supervision necessary for them to carry out their work in a manner that is safe and without risk to health.

3.3.15 Persons taking part in diving operations

Regulation 31 sets out some specific requirements relating to the competency and safety of persons taking part in diving operations.

The contractor should include information within the DSMS on the procedures and processes in place to ensure compliance with the regulatory requirements and the standard AS/NZS 2299 *Occupational diving operations*.

3.3.16 Medical certificates

The section of the DSMS should include the contractor's procedure and process in place for the monitoring of medical certificates to ensure no diver is taking part in a diving project without a valid and current medical certificate [r. 32].



3.3.17 Materials handling and storage

The contractor should have in place a process and procedures for managing materials handling and storage which should cover:

- handling and storage of equipment
- handling and storage of hazardous material with regard to the nature of the hazards and the need for segregation
- packaging and preservation of materials where required
- delivery of equipment
- stock take of spare parts and consumables
- loss, damage or deterioration of goods.

Evidence should be included that registers are maintained. For example, for all slings and chains used for manual handling, and that the equipment is tagged with load weighting and checked regularly by trained personnel to identify any repairs or maintenance that may be required.

A list of the contractor's referenced internal documents should be included to avoid inclusion of too much detail for each of these activities.

3.3.18 Maintenance and repair

This area should describe the contractor's maintenance management system that is in place to ensure the integrity and reliability of the plant, equipment and facilities used during diving projects.

The contractor description should:

- indicate how safety critical items are determined
- detail what maintenance procedures are validated
- establish the contractor's maintenance regimen
- detail responsibilities for authorising conducting and supervising maintenance activities
- indicate how routine maintenance frequencies are determined consistent with relevant codes and standards and manufacturer's recommendations, reference the asset or tag number of each item and reference the database or register where test and inspection certificates are contained.

The contractor should demonstrate that:

- inspections, maintenance, repair and plant alteration records are established and maintained. This should be in accordance with the contractor's records management procedures
- procedures are in place for the review of hazards and risk associated with maintenance activities and tasks prior to undertaking these activities
- plant and equipment requiring registration with external authorities is identified and procedures are in place to ensure that registration is maintained. These registration details should be retained in accordance with the contractor's records management procedure

- procedures are in place for the periodic review of action against maintenance schedules to verify critical plant maintenance is being undertaken and equipment is safe before being returned to service. Verification of the critical plant maintenance should form part of the contractor's audit plan
- procedures are established for the reporting, isolation and withdrawal of unsafe plant and equipment from service
- procedures are in place for the periodic review and improvement of maintenance procedures.

The contractor should include details of how the maintenance personnel and any other key stakeholders are involved in the review of the procedures and maintenance planning schedules as part of the requirement for workforce involvement.

3.3.19 Inspection, testing and monitoring

The DSMS should demonstrate the contractor has effective systems are in place for inspection, testing and monitoring to ensure technical integrity of the diving project.

This demonstration should include:

- appropriate condition monitoring programs exist
- regular inspections of workplace and facilities are carried out
- informal hazard inspections take place
- inspection and tests of safety critical risk control and mitigation devices are regularly conducted including electrical and control loop integrity, emergency power, lifting and rigging equipment. These inspections and tests should be conducted by competent persons designated by the operator and demonstration should indicate how:
 - inspection and test frequencies are determined
 - completion of test schedules is verified
- procedures exist for the safe execution of inspection and test activities. Inspection processes should seek input from personnel required to undertake the tasks being inspected
- inspection, test and monitoring equipment is maintained, stored and calibrated to an appropriate standard
- inspection reports contain recommendations for the prioritisation and implementation of corrective actions
- responsibility for implementing corrective actions arising from inspection report is assigned to specified personnel
- arrangements exist for verifying that corrective actions have been completed
- workplace environmental monitoring is conducted (where appropriate) and records of the results are maintained
- inspection and testing results are periodically reviewed and used in assessment of the work priorities of the diving project.



3.3.20 Incident/hazard reporting and investigation

The contractor should have in place a system for incident and hazard reporting and investigation [r. 7]. This section should include a concise overview of the system in place including reference to the internal procedures and processes used to manage this requirement.

Details should be included of the management of incident reporting for those significant occurrences that result in a regulatory reportable incident that needs to be submitted to the Department, the investigation of those incidents and the management of actions generated from the investigations through to effective closeout.

All personnel including supervisors, safety and health representatives and managers involved in incident and hazard investigation and reporting should be trained and competent in this area.

The overview of the system should reference the communication of the results of the investigation to the workforce and the corrective actions generated to prevent a recurrence of the incident.

Reporting of accidents, incidents and dangerous occurrences guide assists with this requirement.

3.3.21 Workplace environment

This section should describe the processes the contractor has in place to ensure the maintenance of a safe and healthy working environment [sch. 5 Div 2, cl. 8 - 10 of the Act] by maintaining:

- high standards of housekeeping cleanliness, hygiene and ergonomics
- procedures for fatigue management and outlines of maximum hours to be worked under normal conditions
- monitoring of exposure to noise, vibration, fumes and odours
- limited exposure to hazardous substances
- the contractor's smoking policy.

3.3.22 Health monitoring systems

This section of the DSMS should include the contractor's health monitoring procedures and processes in place for the workforce, and detail any pre-employment health assessments and subsequent health surveillance programs [sch. 5 div 2, cl. 8 of the Act].

The contractor's drug and alcohol policy should be referenced in this area and the tolerance level for substance abuse. If the contractor has a separate policy covering fitness for work and drug and alcohol then this should be referenced and a copy of the policy included as an appendix to the DSMS.

Diving contractors who are in charge of diving personnel and subcontractors should include details of medical and health assistance including first aid and medical evacuation.

Include the contractor's policy with regards to medication being taken by a member of the workforce including who is responsible for this medication, the need for the member of the workforce to notify their immediate supervisor when they are taking medication which may impact their performance at work.

3.3.23 Emergency response

The DSMS must include a description and implementation of the emergency response plan (ERP).

The contractor should demonstrate within this section that:

- emergency response roles and responsibilities have been documented within the ERP and there is a description of the chain of command for emergencies
- emergency response training is conducted for all personnel
- emergency response drills and exercises are scheduled, conducted and reports generated on the results
- emergency response equipment is readily available and fit for purpose, a schedule for inspection and testing of emergency equipment is in force, there is a suitable redundancy of equipment for backup purposes in the event of equipment failure.

The contractor should list all internal referenced documents where critical information is contained rather than include large sections of the ERP to cover these requirements.

Emergency planning guide assists with this requirement.

3.3.24 DSMS audits

This is a key element of the DSMS and operators should have an audit system in place that is clear, objective and evidence based to show outsiders that the operator conforms to the DSMS. It is one of the main focus areas for the Department.

The contractor should demonstrate that they have ensured the implementation of the DSMS and there is a continual and systematic identification of deficiencies in, and improvement of the system [r. 7(4)(a)]. Details should be included of the audit process including the existence of an audit plan outlining the methodology by which the contractor will conduct internal or external audits. This requirement should include details of auditor independence requirements for the areas being audited and the qualifications of the auditor.



Details should be included of the management of non-compliance areas identified during the audit, how actions are generated to address the non-compliance and the monitoring of the actions through to effective closure.

Audits, review and continual improvement guide assists with this requirement.

3.3.25 Review and continual improvement

The contractor should include details of systems and processes that will be reviewed, how and when the review will take place and the results [r. 7(2)(i)].

The results of the review should be documented and be formally communicated to management for consideration and identification of actions to be taken to provide continual improvement to the DSMS. The actions arising from the reviews should include identification of new objectives and targets, ongoing audits and the closeout of actions generated from audit reports and incident investigations and generated actions.

The areas of audit and review/continual improvement are critical items within the DSMS with the focus of these two areas by:

- ensuring compliance with the DSMS
- identification and management of continual improvement.

It is expected that these areas of the DSMS will be robust, comprehensive and continuous. As a guide to assist development of the DSMS, diving contractors should take into account that the Department will be inspecting against the DSMS to ensure compliance and improvement. A principle means of achieving this will be to ask the contractor how they ensure they are doing what they said they would do in the DSMS. It is important details in the DSMS are comprehensive and concise.

Contractors should ensure that they have a process in place to regularly verify that their audit and review/continual improvement requirements are managed effectively. Where the Department inspection findings identify issues with the contractor's systems, questions may be raised as to why these issues were not already identified and corrected by the contractor's audits and review/continual improvement requirements.

Audits, review and continual improvement guide assists with this requirement.



4 Submission and assessment of the DSMS

4.1 Acceptance of a new DSMS

The Minister normally delegates their powers to receive and accept the contractor's DSMS submission to an officer of the Department, currently the Director Dangerous Goods and Petroleum Safety.

Acceptance of a DSMS means that the Department considers that it demonstrates the contractor's commitment to conduct diving operations in a manner that satisfies their legislative duties and/or other legislative requirements. It does not mean:

- that it is safe to follow the DSMS irrespective of the circumstances around the diving activity that may indicate further risk assessment is necessary
- the WA government indemnifies the contractor for any incident or liability or breach of the legislation.

The DSMS is the diving contractor's document that reflects the contractor's commitment to comply with the legislation. The contractor remains responsible for all risks. The Minister is required to accept or reject the DSMS within 60 days [r. 8].

If the Minister is unable to meet the time requirements for acceptance of a DSMS or a revised DSMS then notification must be sent to the diving contractor providing another period for acceptance as agreed between the Minister and the diving contractor.

4.2 Revision of DSMS

A diving contractor must review a DSMS if any significant changes have taken place as defined in r. 13(1).

The Minister may request that the contractor for operations for which a DSMS is in force submit a revised DSMS [r. 14]. The request by the Minister must be in writing and provide details of the matters to be revised, the time in which the contractor must complete the revision, and the Minister's reasons for the request.

On receipt of the notice the contractor may submit an opinion in writing within 21 days (or longer at the Minister's discretion) why the revision is unnecessary, and/or to vary the date or terms proposed by the Minister. The contractor must provide reasons for their opinion [r. 14].

The Minister will provide written notice of, and reasons for, their decision on the contractor's submission within 28 days. The contractor must revise their safety case in accordance with the revision notice as originally received or as varied by the Minister [r. 9].

4.3 Grounds for rejecting diving safety management system

The Minister must reject a DSMS [r. 10] if it does not adequately comply with r. 7 or, the Minister is not satisfied that there was effective consultation with divers and other members of the workforce in the preparation of the DSMS [r. 21] (Section 3.2.4).

The grounds for rejecting a DSMS must be given to the diving contractor in writing. If the Minister decides to impose conditions on the acceptance of a DSMS these must be in writing together with the reasons for imposing the conditions [rr. 8(3) and 9(2)].

4.4 DSMS register

The Minister must keep a register of each DSMS and revised DSMS received, in a form that allows public access. This register is currently available through the Department website [r. 12].

This requirement applies to any diving project plans accepted by the Minister in the absence of an operator (Section 5).

4.5 Revision after five years

The operator must revise and resubmit their DSMS every five years [r. 13(2)] after the initial acceptance, regardless of any other revisions and acceptances because of significant operation modifications and/or at the Minister's request under r. 14.

Diving contractors should have in place a process to track this five yearly requirement as there will be no reminders sent from the Department. Specific timelines for the submission of five yearly revisions are in place.

Figure 2 depicts the required intervals for five yearly submissions (regardless of the number of times the DSMS may have been updated to reflect significant changes to operations) [rr. 9(2)(a)(b) and 13(1)].



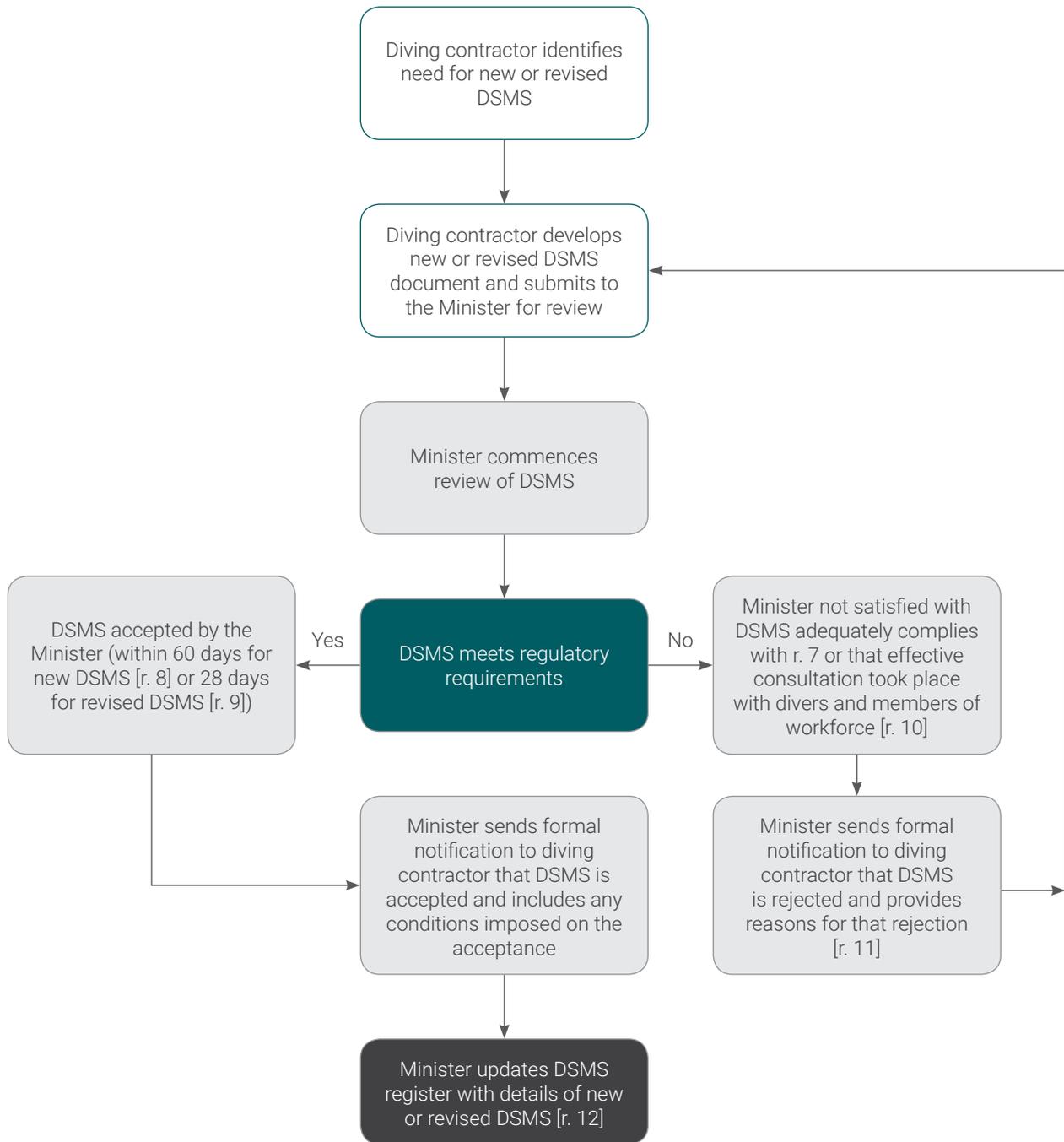


Figure 1 Diving safety management system submission flow chart



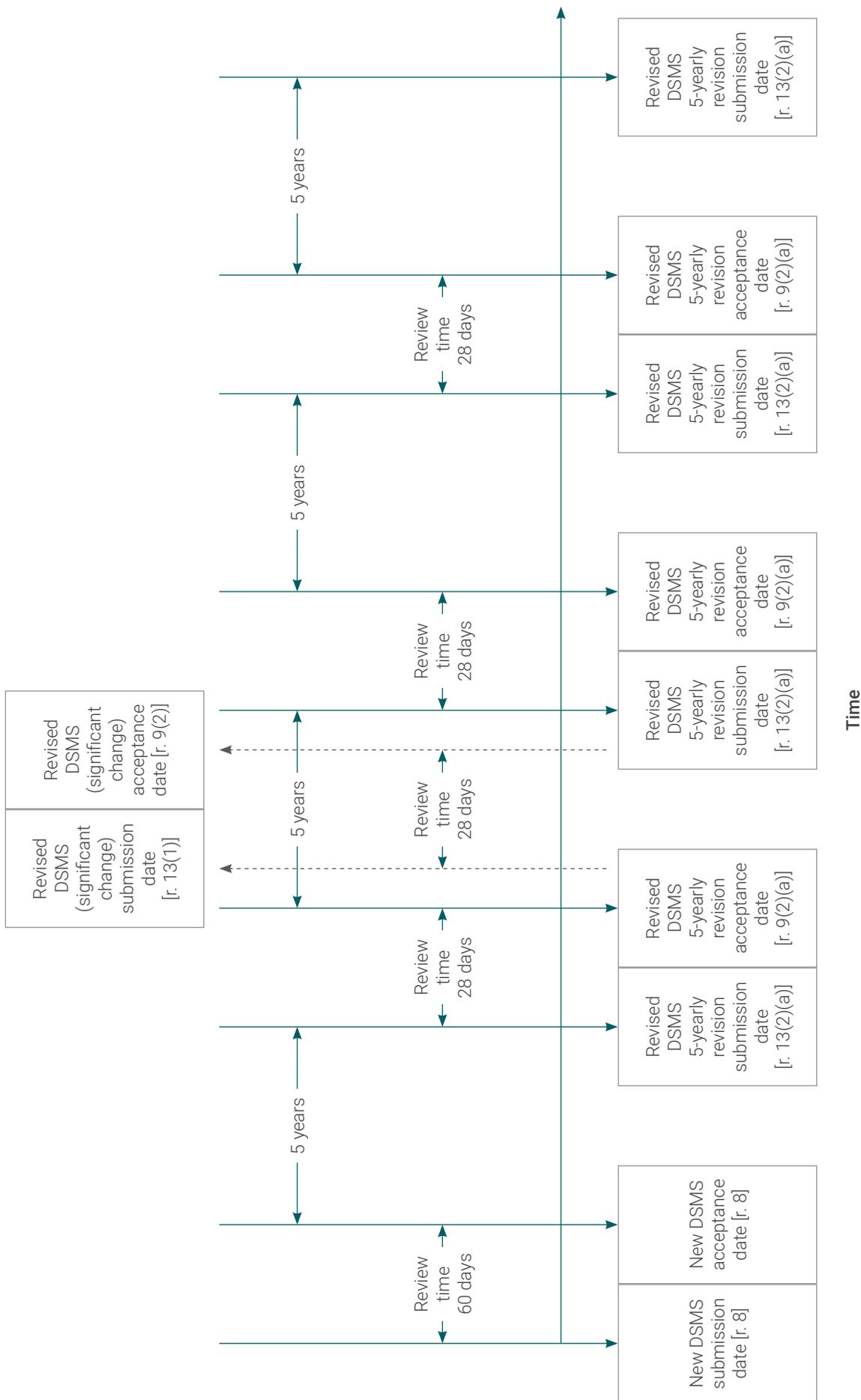


Figure 2 New and revised timelines

5 Diving project plans

5.1 Diving project plans

No diving is permitted until there is an approved or accepted diving project plan in place. A diving project plan for a diving project is to limit each diving operation that is part of the project to a size and nature that can be safely supervised by one diving supervisor at any given time during the operation (Section 5.2).

The diving project plan must describe each diving operation that is part of the diving project. If necessary a separate diving project plan for each start-up notice may be required if significant changes to the diving work scope, location, equipment or procedures are applicable.

The diving project plan must not specify as a diving operation a task that is too complex or too big to be supervised safely by one diving supervisor and should commit to the appointment of enough supervisors to cover the entire diving project. In the event that more than one diving supervisor is appointed under a diving project plan then the diving project plan should clearly state the areas and duration of the project that are controlled by each diving supervisor.

5.1.1 Contents of a diving project plan

Regulation 16(1) identifies what should be included in a diving project plan. Where these requirements have been covered elsewhere, a reference to the relevant section of this document is included.

- (a) A description of the project.
- (b) A description of each diving operation that is part of the project.
- (c) A list of the Commonwealth and State legislation that would apply to the project – this has been covered in Section 3.1.2 and the contractor and operator should ensure that legislation relating only to the individual diving project plan is listed.
- (d) A list of standards and codes of practice that would be applied in carrying out the project - this has been covered in Section 3.1.2 and the contractor and operator should ensure that standards and codes of practice relating only to the individual diving project plan are listed.
- (e) The identification of the hazards associated with the diving operations that are part of the project. Similar requirements to those outlined in Section 3.3.2 of this guideline but should only relate to the diving project plan specific diving operations and the hazards associated with those operations.

- (f) A risk assessment in relation to the identified hazards associated with the diving operations that are part of the project. Similar requirements to those outlined in Section 3.3.2 of this Guide but should only relate to the diving project plan specific diving operations and the management of risks associated with those operations.
- (g) Job hazard analyses for the diving operations that are part of the project. Safe operating procedures covered in Sections 3.3.11 to 3.3.15 should be taken into account in this area.
- (h) A plan for managing the safety and health of persons taking part in the project. Safe operating procedures covered in Sections 3.3.11 to 3.3.15 should be taken into account in this area as well as Section 3.3.21.
- (i) An ERP specific to the diving operations being undertaken under the diving project plan must be developed [r. 16 (1)(i)]. The ERP should include a list of the possible scenarios that could occur as a result of the activities being undertaken, their management and the roles and responsibilities of the personnel involved in the emergency. This should cover both the onshore base and offshore base emergency facilities available.
- (j) The provisions of the DSMS for the project and either the safety case in force or the components of the pipeline management plan in force relevant to the diving project that provide for the safety and health of persons, in particular the arrangements in the DSMS and the safety case or the pipeline management plan for simultaneous operations and emergency response, including any third parties that may be working in the vicinity.
- (k) Details of consultation with divers and other members of the workforce taking part in the project (Section 2.7 and 3.2.5).

5.1.2 Communication requirements under a diving project plan

This section should outline the diving project plan provisions for adequate communication between persons taking part in the project and any relevant contractor, facility, vessel or aircraft and any on-shore installation. The various methods of communication with the workforce should be covered in this area including toolbox or pre-start meetings and notice boards (Section 3.2.5).



5.2 Appointment of diving supervisors

The contractor should include a section in the DSMS on the procedure and process undertaken for the appointment of diving supervisors to ensure adherence to the requirements of r. 26. This should also include the methodology in place for ongoing training of diving supervisors and monitoring of qualifications for currency when moving supervisors from one diving project to another.

5.2.1 Duties of diving supervisors

A diving supervisor must not engage in diving while on duty as a diving supervisor.

The duties and responsibilities of a diving supervisor are outlined in detail in rr. 27 and 28.

This includes:

- the ability to ensure the diving operations are carried out in accordance with an accepted DSMS and the applicable diving project plan
- the authority to countersign entries in the divers' logbooks
- reporting to the operator during the operation if there are any significant incidents or occurrences in connection with the diving operation
- giving each person that is part of a diving project instructions [r. 27(4)] or directions [r. 28].

The contractor should ensure that each of the above requirements is covered in the DSMS with reference to supporting procedures and processes in place that document how this is established and monitored to ensure compliance.

5.2.2 Duties of a diving supervisor for diving operations not at facilities

The contractor should describe the steps to be taken by supervisors to ensure that the work environment for diving operations not conducted at a facility can be carried out in a manner that is safe and without risk to health.

Regulation 29(2) provides details of the types of reasonably practicable steps to be taken in this regard:

- ensure that the working environment at the place where the diving operation is carried out is safe and without risk to health
- ensure that any plant, equipment, materials and substances used in connection with the diving operations are safe and without risk to health
- implement and maintain systems of work for carrying out the diving operation that are safe and without risk to health

- ensure that there is provided a means of access to, and egress from, the place where the diving operation is carried out that is safe and without risk to health
- provide all the persons taking part in the diving operation with the information, instruction, training and supervision necessary for them to carry out their work in a manner that is safe and without risk to health.

5.3 Approval of diving project plan by operator

It is recommended that the approval of the diving project plan is included in the introduction of the diving project plan so that it is evident to all concerned that the diving project plan has been either approved by the relevant operator, or accepted by the Minister in the absence of an operator [r. 18(1)].

If there is no operator in relation to the diving project, the diving contractor must submit the diving project plan to the Department. The Minister must reject the diving project plan [r. 18] if the Minister is satisfied it does not comply with r. 16 or there has not been consultation in the preparation of the plan as required by r. 21.

If requested to do so, the operator in relation to a diving project, must give a copy of an approved diving plan to the Minister.

5.3.1 Updating a diving project plan

A diving contractor conducting a diving project must describe the measures in place that ensure that the diving project plan for the project is up to date.

These updates may be required because:

- there have been modifications to the project which has resulted in a significant increase in the overall level of risk
- a significant change in the type of risk to a person taking part in a diving operation that is part of the project has been identified
- the operator in relation to the project proposes to undertake or permit a modification of the project that is likely to significantly affect the level of risks.

If there is no operator in relation to a diving project and the diving project plan has been updated, the diving contractor must give a copy of the updated plan to the Minister.



APPENDICES

Appendix 1 Legislative provisions

The sections of the *Petroleum (Submerged Lands) Act 1982* and *Petroleum (Submerged Lands)(Diving Safety) Regulations 2007* referenced in this Guide are listed below.

Petroleum (Submerged Lands) Act 1982

Schedule 5 Division 2 – Occupational health and safety

Petroleum (Submerged Lands)(Diving Safety) Regulations 2007

Part 1 – Preliminary

- r. 3 Terms used
- r. 4 Meaning of diving
- r. 5 When diving operation begins and ends

Part 2 – Diving safety management systems

- r. 6 No diving without current accepted DSMS
- r. 7 Contents of DSMS
- r. 8 Acceptance of new DSMS
- r. 13 Revision of DSMS
- r. 14 Notice requiring revision of DSMS

Part 3 – Diving project plans

- r. 15 No diving without approved or accepted project plan
- r. 16 Contents of diving project plan
- r. 17 Approval of diving project plan by operator
- r. 20 Updating diving project plan

Part 4 – Involvement of divers and other members of the workforce

- r. 21 Involvement of divers and other members of workforce in DSMS and diving project plan

Part 5 – Safety responsibilities

- r. 22 Compliance with DSMS, diving project plan
- r. 23 Safety before and during diving operations
- r. 24 Diving depths
- r. 25 Duties of diving contractors for diving operations not at facilities

Part 6 Diving supervisors

- r. 26 Appointment of diving supervisors
- r. 27 Duties of diving supervisors
- r. 28 Diving supervisors may give directions
- r. 29 Duties of diving supervisors for diving operations not at facilities

Part 7 – Start up notices

- r. 30 Start-up notice

Part 8 – Diving operations

- r. 31 Persons taking part in diving operations
- r. 32 Medical certificates

Part 9 – Records

- r. 33 Diving operations record
- r. 34 Divers' log books

Note: The only authorised versions of the Act and Regulations are those available from the Parliamentary Counsel's Office (www.legislation.wa.gov.au), the official publisher of Western Australian legislation and statutory information.



Appendix 2 Glossary

The following terms are defined for the purposes of this guide.

ALARP	As low as reasonably practicable
Diving	Has the meaning given in r. 4
Diving contractor	The person contracted to conduct the diving project
Diving operation	An offshore petroleum operation comprising one or more dives
Diving project	An activity consisting of one or more diving operations
Diving supervisor	Person appointed by diving contractor to supervise diving operations. Must be qualified as a diving supervisor under the Australian Diver Accreditation Scheme
DSMS	Diving safety management system
ERP	Emergency response plan
Facility	A vessel or structure used for the recovery, processing, storage or offloading of petroleum. Includes mobile offshore drilling units and pipe lay barges
IMCA	International Marine Contractors Association
KPI	Key performance indicators
PIC	Person-in-charge
Pipeline	A pipeline licensed under the Act
PPI	Positive performance indicators
SDS	Safety data sheet
Start-up notice	As defined by r. 30



Appendix 3 Concordance table

Petroleum (Submerged Lands) Act 1982

Petroleum (Submerged Lands)(Diving Safety) Regulations 2007

Concordance table for diving safety management system

Note: This table may also be utilised as a self-assessment tool by diving contractors to verify that their diving safety management system document has addressed all the required elements of the legislation.

Reference	Guide section	Topic	DSMS section and page no.
Petroleum (Submerged Lands) (Diving Safety) Regulations 2007			
r. 4	3.1	Meaning of diving	
r. 5	3.1	When diving operation begins and ends	
r. 6(1)-(3)	2.3	No diving without current accepted DSMS	
r. 7(2)(a)	3.0	DSMS contents – provide for all activities connected with the diving project.	
r. 7(2)(b)	3.3.1	Preparation of a diving project plan	
r. 7(2)(c)	3.3.2	Continual and systematic identification of hazards associated with diving project	
rr. 7(2)(d)-(e)	3.3.2, 3.3.11	Continual and systematic of assessment of risks reduced to as low as reasonably practicable	
r. 7(2)(f)	3.3.18, 3.3.19	Inspection, maintenance and testing programs	
r. 7(2)(i)	3.2.5, 5.1.2	Communications between persons involved in diving project	
r. 7(2)(h)	3.3.3	Performance standards that apply to DSMS	
r. 7(2)(i)	3.3.25	Continual improvement	
r. 7(3)(a)-(b)	3.1.2	Specify standards and codes of practice applicable to DSMS	



Reference	Guide section	Topic	DSMS section and page no.
r. 7(4)(a)	3.1.3	Definitions and abbreviations	
	3.1.4	Approval of DSMS by diving contractor representative	
	3.2.1	Policy and leadership	
	3.2.3	DSMS overview	
	3.2.4	Organisation and responsibility	
	3.2.6	Employee selection, competency and training	
	3.2.7	Resources	
	3.3.4	Sources of Information	
	3.3.5	Management system documentation	
	3.3.7	Design, construction, commissioning	
	3.3.8	Simultaneous operations (SIMOPS)	
	3.3.10	Purchasing and control of materials and services	
	3.3.11	Safe operating procedures	
	r. 7(4)(a)	3.3.17	Materials handling and storage
3.3.20		Incident/hazard reporting and investigation	
3.3.24		DSMS audits	
r. 7(4)(b)	3.3.9	Management of change	
r. 8	4.1, 4.2	Acceptance of DSMS by Minister	
rr. 13, 14	3.1.5	Revision of DSMS – triggers that identify a need for a revision	
r. 15	2.4	No diving without an approved or accepted diving project plan	
r. 16(1)	5.1.1	Contents of a diving project plan	
r. 16(1)(a)	5.1.1	Description of the project	
r. 16(1)(b)	5.1.1	Description of the diving operation	
r. 16(1)(c)	5.1.1	Applicable legislation for the DPP	
r. 16(1)(d)	5.1.1	Applicable standards and codes of practice for the DPP	
r. 16.(1)(e)	5.1.1	Identification of hazards associated with diving operations	
r. 16(1)(f)	5.1.1	Risk assessment in relation to identified hazards	
r. 16(1)(g)	5.1.1	Job hazard analyses and safe operating procedures for DPP	
r. 16(1)(h)	5.1.1	Managing safety and health of personnel operating within the DPP	
r. 16(1)(i)	5.1.1	Emergency response plan for DPP activities	
r. 16(1)(j)	5.1.1	Simultaneous operations in relation to existing safety case or pipeline management plan	
r. 16(3)	5.1.1	Diving project plan to be limited in size to be safely supervised by one diving supervisor	



Reference	Guide section	Topic	DSMS section and page no.
r. 16(4)	5.1.2	Diving project plan to include details of adequate communication between parties involved in diving project	
r. 17	5.3	Approval of diving project plan by operator	
r. 20 (1)-(3)	5.3.1	Updating a diving project plan	
r. 21(1)-(2)	2.4 and 3.2.5	Involvement of divers and members of the workforce in DSMS and diving project plan development and revision	
r. 22	3.2.2	Compliance with DSMS and diving project plan	
r. 23(1)-(2)	3.3.12	Safety before and during diving operations	
r. 24(1)-(4)	3.3.13	Safety responsibilities - diving depths	
r. 25(1)-(2)	3.3.14	Duties of diving contractors for diving operations not at facilities	
r. 26	5.2	Appointment of diving supervisors	
r. 27(1)-(4)	5.2.1	Duties of diving supervisors	
r. 28	5.2.1	Diving supervisor may give directions	
r. 29	5.2.2	Duties of diving supervisors for diving operations not at facilities	
r. 30(1)-(3)	3.1.6	Start-up notices	
r. 31 (1)-(7)	3.3.15	Persons taking part in diving operations	
r. 32(1)-(3)	3.3.16	Medical certificates	
r. 33(1)-(6)	3.3.6	Records	
r. 34(1)-(3)	3.3.6	Divers' log books	
<i>Petroleum (Submerged Lands) Act 1982 Schedule 5 Division 2</i>			
cl. 8(1)	3.3.21	Operator to ensure facility safe and without risk to the health of any person	
cl. 8(2)(a)-(d)	3.3.21	Operator to ensure physical environment at the facility is safe and provide adequate amenities for workforce	
cl. 8(2)(e)	3.3.23	Operator to implement procedures for control and response to emergencies	
cl. 8(2)(f)	3.2.6	Operator to provide workforce with appropriate information, training and supervision to safely perform activities	
cl. 8(2)(g)	3.3.22	Operator to monitor OSH of all members of workforce and maintain records of that monitoring	
cl. 8(2)(h)	3.3.22	Operator to provide medical and first aid services at the facility	
cl. 9(2)(a)	3.3.21	Persons in control of parts of facility or particular work must ensure that the physical environment at that part of the facility or at the place where the work is carried out, is safe and without risk to health	



Reference	Guide section	Topic	DSMS section and page no.
cl. 9(2)(b)	3.3.21	Persons in control of parts of facility or particular work must ensure that any plant, equipment, materials and substances at or near that part of the facility or that place, or used in that work, are safe and without risk to health	
cl. 9(2)(c)	3.3.21	Persons in control of parts of facility or particular work must implement and maintain systems of work at that part of the facility, or in carrying out work at that place, that are safe and without risk to health	
cl. 9(2)(d)	3.3.23	Persons in control of parts of facility or particular work must ensure a means of access to, and egress from, that part of the facility or that place that is safe and without risk of health	
cl. 9(2)(e)	3.2.6	Persons in control of parts of facility or particular work must provide all members of the workforce located at that part of the facility or engaged on that work, in appropriate languages, with the information, instruction, training and supervision necessary for them to carry out their work in a manner that is safe and without risk to health	
cl. 10(1)	3.3.21	Employer to take all reasonably practical steps to protect the safety and health of employees at facility	
cl. 10(2)(a)-(c)	3.3.21	Employer must provide and maintain safe working environment	
cl. 10(2)(d)	3.3.21 and 3.3.23	Employer must provide safe means of access and egress from employees work location	
cl. 10(2)(e)	3.2.6	Employer must provide training, information and supervision to perform work safely and without risk to health	



Appendix 4 Further information

Other guides available:

- *ALARP demonstration*
- *Audits, review and continual improvement*
- *Bridging documents and simultaneous operations (SIMOPS)*
- *Diving safety management system*
- *Emergency planning*
- *Hazard identification*
- *Involvement of members of the workforce*
- *Major accident events, control measures and performance standards*
- *Management of change*
- *Offshore facility safety case*
- *Pipeline management plan*
- *Pipeline operation safety case*
- *Records management including document control*
- *Reporting of accidents, incidents and dangerous occurrences*
- *Risk assessment and management including operational risk assessment*
- *Safety management system*





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