

Safety case concordance for major hazard facilities

Health and Safety at Work (Major Hazard Facilities) Regulations 2016

When submitting a safety case, use this document to indicate where the relevant information is located. This concordance document is suitable for all types of safety case submission. Only complete the relevant sections. You may save this document for future use. Please complete this form and include it when submitting the safety case.

Email: hhu.mhf@worksafe.govt.nz **Post:** Major Hazard Facilities, High Hazards Unit, WorkSafe New Zealand, PO Box 105146, Auckland 1143, NZ

1. Operator details

Full legal name: (limited liability company/partnership, individual person, or other)

Trading name: (if different to legal name)

Other information:

Facility to which safety case refers: (address: street number, street name, suburb, town/city, postcode)

Nominated contact

Give details of the person, with whom WorkSafe may communicate in relation to the information that is, or must be, contained in this form.

Name: (title, first names, surname)

Position:

Work phone:

Mobile phone:

Email:

Preferred contact method: Email Post

Postal address: Same as above facility
(street number, street name, suburb, town/city, postcode)

2. Safety case identification

Safety case identification:

Type of safety case:

New safety case

Amended safety case

Revised safety case

Criteria for acceptance of safety case

In accordance with regulation 49 of the Health and Safety at Work (Major Hazard Facilities) Regulations 2016, WorkSafe must accept a safety case for the operation of an upper tier major hazard facility if satisfied that:

(a) the safety case contains all the information required under Schedule 7; and Yes No

(See **Information required in safety case for upper tier major hazard facility.**)

(b) when preparing the safety case, the operator has engaged with workers of the upper tier major hazard facility, in accordance with regulation 65; and Yes No

(c) based on the information included in the safety case, compliance with the safety case is likely to constitute compliance with the requirements of these regulations; and (This is an assessment test based on the information contained in the schedule 7 topics. For this reason these regulations should be addressed by the safety case making the safety cases broader than the schedule 7 topics. See **Regulations against which WorkSafe will assess a safety case related to schedule 7 topics.**)

(d) there is no reason to believe that the operator will not comply with the safety case; and

(e) the safety case is appropriate for the upper tier major hazard facility and for the activities to be conducted at that facility.

Regulation References

The following regulations indicate the requirements that must be addressed in the safety case and those that WorkSafe New Zealand will have regard to, when assessing the safety case.

Safety case concordance for major hazard facilities

Information required in safety case for upper tier major hazard facility

Indicate the location of the information required under schedule 7 of the Health and Safety at Work (Major Hazard Facilities) Regulations 2016. The information provided in the safety case must be suitable and sufficient to allow WorkSafe to be satisfied of all matters relating to regulation 49 'Criteria for acceptance of safety case'. Also refer to WorkSafe guidance on safety cases about summary information.

REGULATION	REGULATION DESCRIPTION	SAFETY CASE REFERENCE
Summary Information		
Schedule 7 Clause 1(a)	A summary of the safety assessment, including: (a) the methodology used in the safety assessment	
Schedule 7 Clause 1(b)	A summary of the safety assessment, including: (b) a list of the major incidents identified in the safety assessment.	
Schedule 7 Clause 2	A summary of the safety management system.	
Schedule 7 Clause 3	A summary of the emergency plan.	
Descriptive information		
Schedule 7 Clause 4	A description of the engagement carried out with workers in the preparation of the safety case.	
Schedule 7 Clause 5	A description of the nature of the facility and its operation, including a description of on-site activities and processes that involve specified hazardous substances.	
Schedule 7 Clause 6	The particulars of all relevant New Zealand and international standards that have been applied, or will be applied, in relation to the facility or the plant used on or in connection with the facility.	
Schedule 7 Clause 7	A description of the specified hazardous substances and any other hazardous substances that are expected to be present at the facility, including: (a) their identification by name and by any other means necessary for clear identification; and (b) their quantity; and (c) their physical, chemical, and toxicological characteristics (and any other hazardous characteristics); and (d) their physical and chemical behaviour under normal conditions of use or under foreseeable abnormal conditions.	
Schedule 7 Clause 8	A description of the physical and chemical processes associated with the specified hazardous substances that are present at the facility.	

Safety case concordance for major hazard facilities

REGULATION	REGULATION DESCRIPTION	SAFETY CASE REFERENCE
Diagram of facility		
Schedule 7 Clause 9	A diagram of the facility's general layout, showing: <ul style="list-style-type: none"> (a) the main process units; and (b) the main storage areas; and (c) the control rooms; and (d) the administrative buildings. 	
Pipelines		
Schedule 7 Clause 10	A description of any pipeline connected to the facility that has the potential to cause or contribute to a major incident, including details of: <ul style="list-style-type: none"> (a) the substances that it conveys; and (b) its dimensions and layout; and (c) its contained volume at declared maximum allowable operating pressure; and (d) any equipment intended to ensure safety; and (e) the design pressure (maximum allowable operating pressure) and temperature of its contents. 	
Scale plans		
Schedule 7 Clause 11	A detailed scale plan of the facility and its surrounding area that shows: <ul style="list-style-type: none"> (a) topographical information; and (b) land use, occupancy, and activities, and other major hazard facilities and hazardous substance storage sites that are known to the operator, within a 2 km radius of any point on the perimeter of the upper tier major hazard facility; and (c) the location of any identified external conditions that could affect the safety of the major hazard facility. 	
Operating and environmental conditions		
Schedule 7 Clause 12	The particulars of the design or operational limits associated with environmental conditions in which the facility has been designed to operate.	
Demographic information		
Schedule 7 Clause 13	Demographic information about the local community, including surrounding land uses, within a 2 km radius of any point on the perimeter of the upper tier major hazard facility, that are permitted by the local authority.	
Meteorological data		
Schedule 7 Clause 14	Meteorological data relevant to the estimation of the effects of any major incident.	

Safety case concordance for major hazard facilities

REGULATION	REGULATION DESCRIPTION	SAFETY CASE REFERENCE
Control and verification measures		
Schedule 7 Clause 15	A detailed description of the equipment, processes, and procedures that are the major incident control measures and the performance standards for the major incident control measures.	
Schedule 7 Clause 16	A list of roles, responsibilities, and any resources (internal and external) able to intervene in the event of any failure of a control measure.	
Schedule 7 Clause 17	<p>A detailed description of the arrangements in place for independent and competent persons to verify that safety-critical elements are or will be suitable and will remain in good repair and condition throughout the life cycle of the facility, including a description of:</p> <ul style="list-style-type: none"> (a) the nature and frequency of examination and testing; and (b) review and revision arrangements; and (c) arrangements for the making and preservation of records. 	
Proposed facilities		
Schedule 7 Clause 18	In relation to a proposed facility, a description of the steps that have been taken to ensure that safety has been incorporated into the design and construction of the upper tier major hazard facility.	
Officer's statement		
Schedule 7 Clause 19	<p>A statement signed by the officer of the operator (in the case of an operator who is an individual), or the most senior officer of the operator in New Zealand (in the case of any other operator), that:</p> <ul style="list-style-type: none"> (a) the information provided under this schedule is accurate and up to date; and (b) all persons to be involved in the implementation of the safety management system have the knowledge and skills necessary to enable them to carry out their role safely and competently; and (c) the control measures to be implemented by the operator will: <ul style="list-style-type: none"> (i) eliminate the risk of a major incident occurring, to the extent that is reasonably practicable; or (ii) if it is not reasonably practicable to eliminate the risk of a major incident occurring, minimise the risk to the extent that is reasonably practicable; and (d) in the event of a major incident occurring, the control measures to be implemented by the operator will minimise the incident's magnitude and the severity of health and safety consequences to the extent that is reasonably practicable. 	

Safety case concordance for major hazard facilities

Regulations against which WorkSafe will assess a safety case related to schedule 7 topics

WorkSafe strongly advises that the safety case includes evidence of the following regulatory requirements to assist assessment and acceptance of the safety case. This information will inform what is required according to Schedule 7.

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
-	46(4)	If WorkSafe requires the co-ordinated preparation of safety cases, each operator must provide the other operators with information concerning any circumstances at the operator's facility that could cause or contribute to a major incident hazard in relation to any of the other upper tier major hazard facilities.	Co-ordination of safety cases for multiple facilities	
Safety Assessment				
Schedule 7 Clause 1	38(1)	The operator of an upper tier major hazard facility must conduct a safety assessment in relation to the operation of the facility.	Safety assessment	
Schedule 7 Clause 1	38(2)	A safety assessment must involve a comprehensive and systematic investigation and analysis of all aspects of risks to health and safety associated with all major incidents that could occur in the course of the operation of the facility, including the following: (a) the identification of hazards and conditions that could lead to a major incident	Safety assessment	
		A safety assessment must involve a comprehensive and systematic investigation and analysis of all aspects of risks to health and safety associated with all major incidents that could occur in the course of the operation of the facility, including the following: (b) the nature of each hazard and potential major incident		
		A safety assessment must involve a comprehensive and systematic investigation and analysis of all aspects of risks to health and safety associated with all major incidents that could occur in the course of the operation of the facility, including the following: (c) the risk associated with each of those hazards, including the likelihood and consequences (including the potential magnitude and the severity of the potential health and safety consequences) of each potential major incident		
		A safety assessment must involve a comprehensive and systematic investigation and analysis of all aspects of risks to health and safety associated with all major incidents that could occur in the course of the operation of the facility, including the following: (d) the range of control measures considered		
		A safety assessment must involve a comprehensive and systematic investigation and analysis of all aspects of risks to health and safety associated with all major incidents that could occur in the course of the operation of the facility, including the following: (e) the control measures that the operator decides to implement (see regulation 30).		

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Schedule 7 Clauses 1 and 4	38(3)	In conducting a safety assessment, the operator must: (a) consider major incident hazards and potential major incidents cumulatively as well as individually	Safety assessment	
		In conducting a safety assessment, the operator must: (b) use assessment methods (including quantitative or qualitative methods, or both) that are suitable for assessing the major incident hazards and potential major incidents being considered		
		In conducting a safety assessment, the operator must: (c) engage with, and have regard to any advice and recommendations given by, workers at the facility, in accordance with regulation 65		
		In conducting a safety assessment, the operator must: (d) consult with, and have regard to any advice and recommendations given by: (i) the emergency services organisations that have responsibility for the area in which the facility is located		
		In conducting a safety assessment, the operator must: (d) consult with, and have regard to any advice and recommendations given by: (ii) WorkSafe or any government department or agency with a regulatory role under these regulations.		
Schedule 7 Clause 1	38(4)	The operator must document all aspects of the safety assessment, including: (a) the methods used in the investigation and analysis; and (b) all identified major incident hazards and potential major incidents; and (c) the criteria and methods used in identifying the major incident hazards and potential major incidents; and (d) any conditions, including conditions external to the facility (for example, natural events occurring anywhere, or other events occurring in an area outside the facility), under which the hazards might give rise to major incidents; and (e) the reasons for deciding which control measures to implement; and (f) the other control measures that were considered but not implemented; and (g) the reasons for not implementing the other control measures that were considered.	Safety assessment	
Schedule 7 Clause 1	30(1)	The operator of a major hazard facility must implement control measures that: (a) eliminate, so far as is reasonably practicable, the risk of a major incident occurring; or (b) if it is not reasonably practicable to eliminate the risk of a major incident occurring, must minimise that risk so far as is reasonably practicable.	Control measures	
Schedule 7 Clauses 2 and 4	30(2)	In the event of a major incident occurring at the facility, the control measures to be implemented by the operator must minimise its magnitude and the severity of its health and safety consequences so far as is reasonably practicable.	Control measures	

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Schedule 7 Clause 1	30(4)	The operator of a major hazard facility must implement control measures that are designed to minimise, in the event that a major incident occurs, its magnitude and the severity of its consequences to persons both on site and off site.	Control measures	
Safety management system				
Schedule 7 Clause 2	39(1)	The operator of an upper tier major hazard facility must establish and implement a safety management system for the operation of the facility in accordance with these regulations.	Safety management system	
Schedule 7 Clause 2	39(2)	The safety management system must: (a) provide a comprehensive and integrated system for the safe operation of the facility	Safety management system	
		The safety management system must: (b) provide a comprehensive and integrated system for the management of all aspects of risk control in relation to the occurrence and potential occurrence of major incidents at the facility		
		The safety management system must: (c) be used by the operator as the primary means of ensuring the safe operation of the facility; and		
		The safety management system must: (d) state the operator's specific safety objectives and describe the systems and procedures that will be used to achieve those objectives		
Schedule 7 Clauses 2 and 4	39(3)	The operator must engage with workers at the facility during the design and implementation of the safety management system, in accordance with regulation 65.	Safety management system	
Schedule 7 Clause 2	Schedule 5 Clause 1	A safety management system must: (a) be proportionate to the major incident hazards, activities, and complexity of the organisation of the major hazard facility; and (b) be based on the assessment of risks associated with each major incident hazard.	General	
Schedule 7 Clause 2	Schedule 5 Clause 2	As a part of the safety management system, the operator must develop a safety policy that: (a) includes a statement of the operator's commitment, intentions, and principles in relation to the facility's overall health and safety performance; and (b) provides a framework for action and for setting the facility's health and safety objectives and targets.	Safety policy and specific safety objectives	
Schedule 7 Clause 2	Schedule 5 Clause 3	The safety management system must include a description of the means by which the operator's safety policy and specific safety objectives will be communicated to all persons who will participate in the implementation of the safety management system.	Safety policy and specific safety objectives	

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Schedule 7 Clause 2	Schedule 5 Clause 4	The safety management system must identify the personnel involved in the implementation of the safety management system, including: (a) the position description and location of those personnel; and (b) the roles and responsibilities of those personnel.	Organisation and personnel	
Schedule 7 Clause 2	Schedule 5 Clause 5	The safety management system must describe the means of ensuring that those personnel: (a) have the necessary knowledge and skills to enable them to undertake their allocated tasks and discharge their allocated responsibilities; and (b) retain that knowledge and those skills.	Organisation and personnel	
Schedule 7 Clause 2	Schedule 5 Clause 6	The safety management system must include the arrangements for ensuring contractors and subcontractors are aware of their roles and responsibilities under the safety management system.	Organisation and personnel	
Schedule 7 Clause 2	Schedule 5 Clause 7	The safety management system must include the arrangements for the adoption and implementation of procedures for: (a) systematically identifying major incident hazards arising from normal and abnormal operations at the facility; and (b) assessing the likelihood and severity of major incidents occurring.	Identification and evaluation of major incident hazards	
Schedule 7 Clause 2	Schedule 5 Clauses 8(a) and (d)	The safety management system must include the arrangements for the adoption and implementation of procedures and instructions for: (a) the safe operation and maintenance of plant; and (d) maintaining equipment	Operational Control	
Schedule 7 Clause 2	Schedule 5 Clause 8(b)	The safety management system must include the arrangements for the adoption and implementation of procedures and instructions for: (b) plant processes	Operational Control	
Schedule 7 Clause 2	Schedule 5 Clause 8(c)	The safety management system must include the arrangements for the adoption and implementation of procedures and instructions for: (c) permit-to-work systems	Operational Control	
Schedule 7 Clause 2	Schedule 5 Clause 8(e)	The safety management system must include the arrangements for the adoption and implementation of procedures and instructions for: (e) temporary stoppages (for example, start-ups and shutdowns).	Operational Control	
Schedule 7 Clause 2	Schedule 5 Clause 9	The safety management system must include the arrangements for independent and competent persons to verify that safety-critical elements are or will be suitable and will remain in good repair and condition throughout the life cycle of the facility.	Operational Control	

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Schedule 7 Clause 2	Schedule 5 Clause 10	The safety management system must include the arrangements for the development and implementation of procedures for ensuring that changes in organisation, personnel, procedures, practices, plant, and equipment are analysed to identify: <ul style="list-style-type: none"> (a) any new major incident hazards; or (b) the impact of the changes on: <ul style="list-style-type: none"> (i) control practices; or (ii) safety-critical elements; or (iii) previously identified major incident hazards. 	Operational Control	
Schedule 7 Clause 2	Schedule 5 Clause 11	The safety management system must include the arrangements for the adoption and implementation of procedures: <ul style="list-style-type: none"> (a) to identify foreseeable emergencies by systematic analysis; and (b) to prepare, test, and review emergency plans to respond to emergencies. 	Planning for emergencies	
Schedule 7 Clause 2	Schedule 5 Clause 12(a)	The safety management system must include the arrangements for the adoption and implementation of procedures for: <ul style="list-style-type: none"> (a) routinely checking that activities under the safety management system are being conducted to a suitable standard 	Monitoring and performance	
Schedule 7 Clause 2	Schedule 5 Clause 12(b)	The safety management system must include the arrangements for the adoption and implementation of procedures for: <ul style="list-style-type: none"> (b) investigating and taking corrective action in the case of non-compliance 	Monitoring and performance	
Schedule 7 Clause 2	Schedule 5 Clause 12(c)	The safety management system must include the arrangements for the adoption and implementation of procedures for: <ul style="list-style-type: none"> (c) monitoring the performance of control measures designed to minimise risks from major incidents. 	Monitoring and performance	
Schedule 7 Clause 2	Schedule 5 Clause 13	The safety management system must include a system for reporting: <ul style="list-style-type: none"> (a) major incidents and near misses; and (b) failure of protective measures; and (c) investigations and follow-up actions on the basis of lessons learnt. 	Monitoring and performance	
Schedule 7 Clause 2	Schedule 5 Clause 14	The safety management system must include the arrangements for the adoption and implementation of procedures for: <ul style="list-style-type: none"> (a) checking that the safety management system is understood and is being complied with; and (b) ensuring that the safety management system (in particular, the control measures and ongoing review) is being implemented and maintained in an effective state. 	Audit and review	
Schedule 7 Clause 2	Schedule 5 Clause 15	The safety management system must include provisions for: <ul style="list-style-type: none"> (a) the documented review of performance of the safety management system; and (b) the updating of the safety management system by senior management following the review. 	Audit and review	

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Emergency plans				
Schedule 7 Clause 3	31(1)	The operator of a major hazard facility must prepare an emergency plan for the facility that: (a) effectively addresses all potential health and safety consequences of a major incident	Emergency plan	
		The operator of a major hazard facility must prepare an emergency plan for the facility that: (b) is specific to the facility and the major incident hazards identified in the safety assessment		
		The operator of a major hazard facility must prepare an emergency plan for the facility that: (c) is integrated into the facility's safety management system		
		The operator of a major hazard facility must prepare an emergency plan for the facility that: (d) is understandable by workers, visitors, and other people who are likely to be affected (to the extent necessary for them to fulfil their roles)		
		The operator of a major hazard facility must prepare an emergency plan for the facility that: (e) provides for the testing, review, and updating of emergency procedures, including the frequency of any testing, review, and updating		
Schedule 7 Clause 3	31(3)	The operator must, when developing and revising the emergency plan: (a) engage with workers at the major hazard facility, in accordance with regulation 65; and (b) consult: (i) the emergency services organisations that have responsibility for the area in which the facility is located; and (ii) the local authority within whose district the facility is located, in relation to the potential off-site health and safety consequences of a major incident; and (iii) the operators of any other nearby major hazard facilities.	Emergency plan	
Schedule 7 Clause 3	31(4)	The operator must ensure that the emergency plan addresses, to the extent that is reasonably practicable, the recommendations of the emergency services organisations consulted under subclause (3)(b), if the recommendations relate to: (a) the content and effectiveness of the emergency plan; or (b) the testing proposed in the emergency plan.	Emergency plan	
Schedule 7 Clause 3	31(5)	The operator must have regard to any recommendations made by the local authority and any other person engaged with, or consulted, under subclause (3) in developing and revising the emergency plan.	Emergency plan	
Schedule 7 Clause 3	31(6)	The operator must: (a) keep a copy of the emergency plan at the facility and ensure that the plan is readily accessible to persons who are required to use it; and (b) ensure that the emergency services organisations consulted under subclause (3)(b) have access to the emergency plan.	Emergency plan	

Safety case concordance for major hazard facilities

RELATED SCHEDULE 7 ITEM	REGULATION REQUIREMENT	DESCRIPTION OF REGULATORY REQUIREMENT	TOPIC	SAFETY CASE REFERENCE
Schedule 7 Clause 3	32(1)	An operator of a major hazard facility must test an emergency plan in accordance with the testing and review provisions of the emergency plan.	Emergency plan	
Schedule 7 Clause 3	32(2)	The operator must: (a) document the carrying out and the results of every test; and (b) retain the documentation for at least 2 years.	Emergency plan	
Schedule 7 Clause 3	Schedule 3 Clause 5	The maximum number of persons, including workers, likely to be present at the facility on a normal working day (including a day involving planned maintenance).	Site and hazard detail	
Schedule 7 Clause 3	Schedule 3 Clause 7	The protective resources available to control a major incident.	Site and hazard detail	
Schedule 7 Clause 3	Schedule 3 Clause 8	The emergency procedures.	Site and hazard detail	
Schedule 7 Clause 3	Schedule 3 Clause 9	The infrastructure (on site and off site) that may be affected by a major incident.	Site and hazard detail	
Schedule 7 Clause 3	Schedule 3 Clause 10	The command philosophy and structure to be activated in an emergency, so that it is clear what actions will be taken, who will take the actions, and how, when, and where they will be taken.	Command structure and site personnel	
Schedule 7 Clause 3	Schedule 3 Clause 14	Arrangements for assisting emergency services organisations and nearby facilities with control actions taken in the surrounding area.	Command structure and site personnel	
Schedule 7 Clause 3	Schedule 3 Clause 15	In the event of a major incident or an event that could reasonably be expected to lead to a major incident, procedures for notifying the emergency services organisations.	Notifications	
Schedule 7 Clause 3	Schedule 3 Clause 16	While a major incident is occurring, and after it has occurred, procedures for providing the local community and the local authority (for the area in which the facility and its surroundings are located) with information about the major incident.	Notifications	
Schedule 7 Clause 3	Schedule 3 Clause 22	Procedures for the safe evacuation of, and accounting for, all people who are on site.	Procedures	
Schedule 7 Clause 3	Schedule 3 Clause 24	Procedures for the control of any incident involving hazardous substances.	Procedures	
Schedule 7 Clause 3	Schedule 3 Clause 25	Procedures for decontamination following an incident involving hazardous substances.	Procedures	