

INC_142

+ Create | (index.php?module=zip_ZIPIncident&action=EditView&return_module=zip_ZIPIncident&return_action=DetailView)

Edit ▾

Incident Information

Incident Type: Plant / Property
Category: Service Strike - Other
Sub Category: Redundant
Date Completed: 31/08/2022

Status: Completed
Incident / Accident Classification: Class 3
High Potential Incident: No

Preliminary Incident Details

Date/Time: 26/07/2022 11:00 am

Person Involved Type: Contractor

Person Involved: David McKewen
Company Name: Australian Civil Solutions
Occupation: Plant operator

Project: 141-4248 - BRISBANE METRO-TRIP FAC PHASE2 (index.php?module=BMD_Jobs&action=DetailView&record=321222aa-6412-2642-0dd1b-62aab95c185f)
Project Manager: Vaughan Aujardi
Reported By: Madeline Walkington

Shift Type: Day Shift
Shift %: 50

Immediate Action Taken: Topsoil strip works ceased. Ground Disturbance Permit and DBYO reviewed to re-confirm that no known services are in the work area. SCEE Electricians notified to come out and test conduit.

Preliminary Incident/Accident Description: At 11am, during topsoil stripping activities at approximately 300mm below existing surface level the excavator bucket exposed a 60mm black and blue striped poly pipe and 45mm orange PVC conduit. The excavator operator immediately alerted the Supervisor (Sid) and works were ceased. The Ground Disturbance Permit was reviewed to re-confirm that no known services were in the work area. The Ground Disturbance Permit and DBYO attachments confirms that no known services are located within the work area. The electrical contractor were then contacted to come out and investigate the conduit. There was no water leaking out of the black and blue pipe and it appeared as if the orange PVC conduit was already damaged prior to exposing by topsoil stripping activities - during trenching of the black and blue poly pipe install possibly. No service marker tape was encountered above the services during the topsoil strip activity. Ground Penetrating Radar scans did not identify any buried services in the work area during the Ground Disturbance Permit process (which was completed before the works started).

Is this record Confidential: No

Attachment:  TimePhoto_20220726_122542.jpg (index.php?entryPoint=FileDownload&id=680e3efe-ebc7-b2a4-8a69-62df7904c738)
^GDP169 - Dutton Park excavation works - GIS markup.pdf (index.php?entryPoint=FileDownload&id=a7d86b38-fab4-f10d-5441-62df7b1c80fc)

Users:

Notification

Statutory Notification Required: No
OFSC Notification Required: No
Other External Parties to be Notified: Acciona
Emergency Response Plan Activated: No

Flash Report Required: No
Additional Recipients 1:
Additional Recipients 2:
Additional Recipients 3:

Investigations

Investigation Type: Basic Investigation

Lead /Team Member: Jason Dolan

Events Leading up to the Incident: Prestart, Plant check and review of JHA card prior to shift commencing

Topsoil stripping work

Incident Description (Who, What, Where, When): At 11am, during topsoil stripping activities at approximately 300mm below existing surface level the excavator bucket exposed a 60mm black and blue striped poly pipe and 45mm orange PVC conduit. The excavator operator immediately alerted the Supervisor (Sid) and works were ceased. The Ground Disturbance Permit was reviewed to re-confirm that no known services were in the work area. The Ground Disturbance Permit and DBYO attachments confirms that no known services are located within the work area. The electrical contractor were then contacted to come out and investigate the conduit. There was no water leaking out of the black and blue pipe and it appeared as if the orange PVC conduit was already damaged prior to exposing by topsoil stripping activities - during trenching of the black and blue poly pipe install possibly. No service marker tape was encountered above the services during the topsoil strip activity. Ground Penetrating Radar scan did not identify any buried services in the work area during the Ground Disturbance Permit process (which was completed before the works started).

Events Post Incident: The Ground Disturbance Permit and the DBYO were reviewed to confirm that there were no known services in the work area. The electrical sub-contractor (SCEE) were contacted to come to site and test the discovered unknown service. SCEE confirmed that the service was not live.

Documents Reviewed for Investigation:

- BMD Permits

All Tasks Other

Root Causes and Contributing Factors

Create											« < (1 - 2 of 2) > »
DATE	TYPE	SYSTEM/PROCEDURAL	PLANT/EQUIPMENT	ASBESTHATED DEFENCES	ORGANISATIONAL FACTORS	ENVIRONMENT	HUMAN FACTORS	CRITICAL CONTROLS	ADDITIONAL INFORMATION	STATUS	
31/08/2022	Root Causes							• Management of Change	Old redundant services not noted or known. Good reporting c	Completed	edit ▾
31/08/2022	Root Causes							• Management of Change	Old redundant services not noted or known.	Completed	edit ▾

Corrective and Preventive Actions

Create											« < (1 - 1 of 1) > »
RECORD NUMBER	CATEGORY	TYPE	DESCRIPTION OF AREA OF IMPROVEMENT	ASSIGNED TO	DUE DATE	DATE RAISED	RAISED BY	STATUS			
Q (index.php?module=Tasks&action=DetailView&record=c7a90716-703e-17af-b4c9-62b6517903b)	TASK_489	Observation	HSE Q Combination At 11am, during topsoil stripping activities at approximat	Jason Dolan (index.php?module=User&action=DetailView&record=2b11dbfc-e7fe-3d0c-401b-62a5b88c941)	16/08/2022	16/08/2022	Rod MacCluskey (index.php?module=User&action=DetailView&record=54a63081-d06e-dec4-ba10-62a5b85988a)	Completed	edit (index.php?module=Tasks&action=EditView&record=c7a90716-703e-17af-b4c9-62b6517903b&parent_module=zip_ZIPIncident&return_action=DetailView)		

Work Method Statement (WMS) Subcontractor Checklist

Project: Throsby Access Road Stage 1&2 **Date Received:** 21/03/2022
Subcontractor: Downer **Est. Start Date:** 30/03/2022
Activity/Task: Asphalt Works SWMS **Revision/Version:** 1

Elements Required as a Minimum	Yes / No	Comments / Suggestions
Does it include the name, site address and contact numbers for the subcontractor company doing the work?	No	All SWMS are required to include Site Address: Horse Park Drive, Throsby
Does it include the Company ABN number?	Yes	
Is it signed by the authorised delegate?	Yes	Supervisor to sign WHS 007 Traffic Control
Does it include the current date?	No	Current Date/Expected Commencement date to be revised
Is the WMS intended for the State/Territory you are in?	Yes	Legislation not current: Environmental Protection Regulation 1995 superseded (see Environmental Protection Regulation 2005)
Does it include the name of the Principal Contractor and, the Project Name?	Yes	
Does it identify the relevant site specific hazards/aspects? e.g.: Protected Vegetation, School Driveway next to Project Over-Head Power Lines etc.	Yes	
Do the risks and control measures align to those identified in the Project Risk Register?	Yes	Site Specific - Please include in site Access/Egress step : <u>No right turn into site off Horsepark Dr, north bound lane. No right turn exit from site outside 9am-4pm. All workers to sign in & out at BMDs site office when arriving/leaving site.</u>
Does it detail the task / activity they are undertaking?	Yes	
Does it include ALL the Plant to be used?	Yes	
Does it include any Hazardous Substances to be used & include Safety Data Sheets (SDS's) no more than 5 years old?	No	Please include MSDS for all identified hazardous substances
Does it include ALL the hazards associated with the task? i.e.: Electrical, Mobile Plant, Fall from Heights, UV Confined Space etc.	Yes	
Does it identify the risks associated with the hazards? i.e.: Electrical = Electrocution, UV = Skin Cancer etc.	Yes	
Do the control measures eliminate or reduce the risk to an acceptable level?	No	PPE must meet BMD's safety requirements. Hard Hats, Safety Glasses and long sleeved shirts/pants required on ALL BMD sites.
Does the WMS give step by step instructions on how the task will be preformed?	Yes	
How will the control measures be reviewed and monitored and who is responsible to record this?	No	Please include how WMS are monitored and who is responsible
Does it identify High Risk Work Liencing and Certificates of Competancy?		
Is it signed and dated by all the Subcontractor's Employees?	Yes	

Date Reviewed: 21/03/2022 **Reviewed By:** Madeline Walkington **Position:** Project Engineer

☐ Accepted as satisfactory ☒ Accepted subject to comments (revise and resubmit) ☐ Not Accepted (refer to comments and resubmit)

Comments:

Please see above comments regarding amendments required for WHS 001-023.

Signed: _____ **Date:** _____

Date of Second Review: _____ **Reviewed By:** _____



DETAILED INCIDENT INVESTIGATION REPORT

(Incident Title)

(Incident Number)

Detailed Incident Investigation Report

(Incident Number)

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Investigation Report

Note: This report to be written, upon completion of the Investigation which may be either ICAM or Detailed process used with detailed information and corrective action pertaining to incident. The ICAM terminology is to be used in the investigation process only, this report is to be written in a manner to enable all personal understand and only contains information which has been factually verified. This Investigation Report section and ICAM Investigation Tools (when required) are to be uploaded separately

Executive Summary

(Provide a brief summary)

Incident Details

1.1. Incident

Location: (Insert Text)

Date: (Insert Text)

Time: (Insert Text)

Investigation Team: (Insert Text)

Investigation Date and Timeframe: (Insert Text)

1.2. Details of Injured

Injuries sustained: (Insert Text)

Medical Treatment: (Insert Text)

1.3. Details of Damage / Impact

Impact on Project / Operations: (Insert Text)

Damage to Equipment: (Insert Text)

Environmental Impact: (Insert Text)

1.4. Events leading up to the incident

(Insert Text)

1.5. Incident Description

(Insert Text)

1.6. Events Post Incident

(Insert Text)

1.7. Photographs & Other Information

(Insert Images)

Key Findings

The key findings outline why the incident occurred and the contributing factors deduced from the investigation Root Cause

(Insert Text – ICAM terminology is not to be used in this section)

1.8. Contributing Factors

(Insert Text – ICAM terminology is not to be used in this section)

[illegible]

Significant Learnings

The investigation has raised several key learnings, which are covered in the body of the report and to be included in the development of HSE Alerts for further circulation across the BMD Group. The significant learnings for BMD are:

(Insert Text)

Management Review

Senior Management are required to conduct a Boardroom Debrief of this report, the findings, conclusions and corrective actions. Key details and corrective actions identified in this report are to be entered into the BMD Incident and Accident Database with a copy of this report. Any associated information is also to be uploaded into the Incident Records as attachments.

Report Sign-Off

The completion of corrective actions is managed through the BMD Corrective Action Database and signing off this incident record is managed through the BMD Incident and Accident Database. Where Corrective Actions have not been fully implemented, ongoing monitoring should be maintained until implementation is complete.

ICAM Investigation Tools

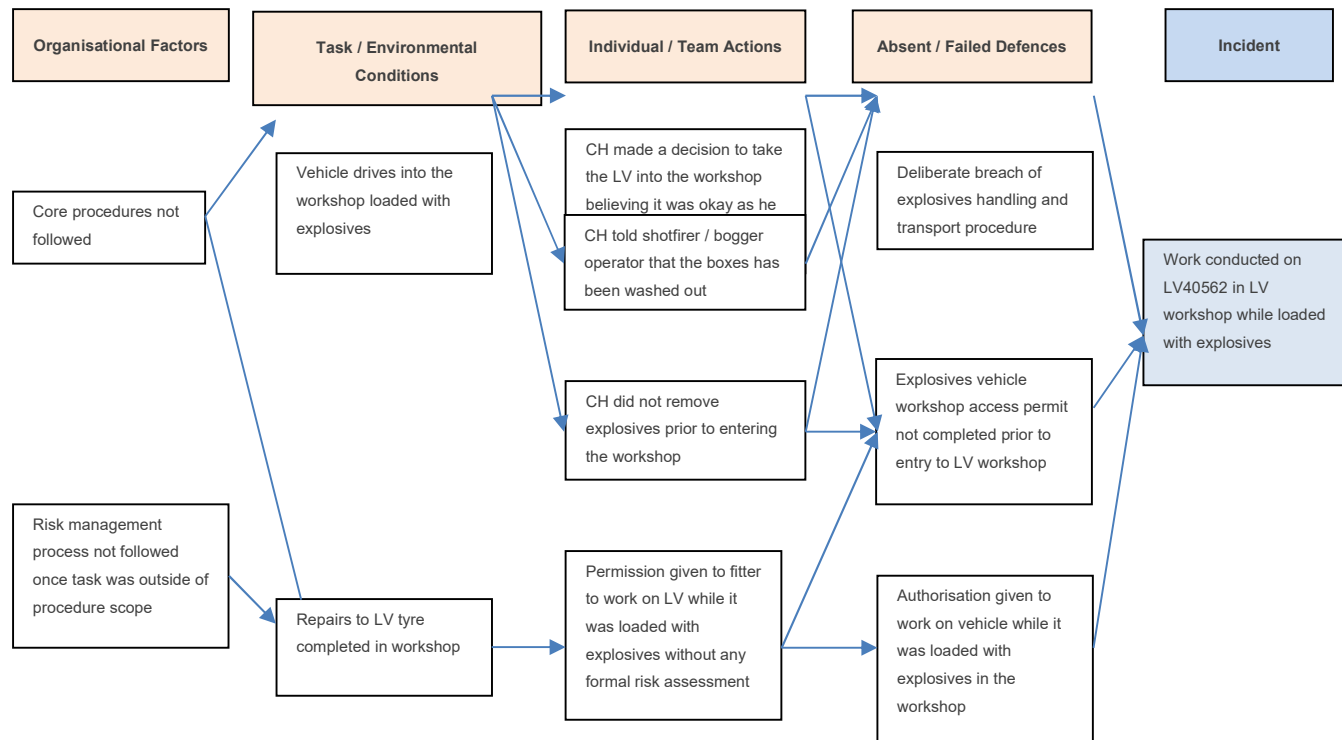
The section is to be completed as part of the ICAM Investigation process (when required), with the information used to develop the report. The ICAM terminology is to be used for the investigation process only, the report is to be written in a manner to enable all personal understand and only contains information which has been factually verified.

A. Documentation / Evidence Summary

REF.	DOCUMENT REFERENCE / EVIDENCE
001	Time Line & '5Whys'
002	Data Collection - PEEPO
003	
004	
005	
006	
007	
008	
009	
010	
011	
012	
013	
014	

B. Event Analysis

Event Analysis (Example Completed – Please delete). Has been developed from 5Whys/PEEPO (See Section D)



C. Timeline & '5Whys' Analysis

	Date / Time	Event	Why	Why	Why	Why
Events Leading up to Incident	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)

Prepared by (Insert Business Unit) for (Insert Issuing Parties) for the purpose of obtaining Legal Advice

	Date / Time	Event	Why	Why	Why	Why
Incident	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
			(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
Post Incident Events (If Applicable)	Date / Time	Event	Why	Why	Why	Why
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)
	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)	(Insert Text)

D. Data Collection PEEPO

People	Environment	Equipment	Procedures	Organisation

E. Data Analysis

Organisation Factors	Task / Environmental Conditions	Individual / Team Actions	Absent or Failed Defence	Incident

F. Key Findings

The key findings outline why the incident occurred and the contributing factors deduced from the investigation have been categorised using the Incident Cause Analysis Method (ICAM). The ICAM analysis chart is shown at the end of this section.

a) Root Cause

(Insert Text)

b) Contributing Factors

The contributing factors of this incident were analysed using the Incident Cause Analysis Method (ICAM) process, an industrial safety initiative used to analyse serious incidents. ICAM is an analysis tool that sorts the findings of an investigation into a structured framework.

The Areas of Improvement in Defences (System) identified in this incident included:

(Insert Text)

The Individual or Team Actions identified in this incident included:

(Insert Text)

The Task or Environmental Conditions identified at the time of the incident included:

(Insert Text)

The organisational Factors identified to contribute to this incident included:

(Insert Text)



Witness Statement Form

INCIDENT DETAILS

Incident: _____ Incident No: _____
 Project: _____ Interview Date: _____

WITNESS / INVOLVED PERSONS DETAILS

Name: _____ Position: _____
 Contact Details: _____ Company: _____
 Shift / Crew: _____ Supervisor: _____

STATEMENT

Please fully describe the work and conditions in progress leading up to the incident.

	GUIDANCE ONLY Briefly describe what experience and training you have for performing the task
	Explain what information you were given about the job, when and by who
	Was there a job safety analysis and/or permit had you read and signed onto them?
	Briefly describe what you were doing before the incident occurred.
	Was the work area checked by a supervisor foreman before the incident. Who?

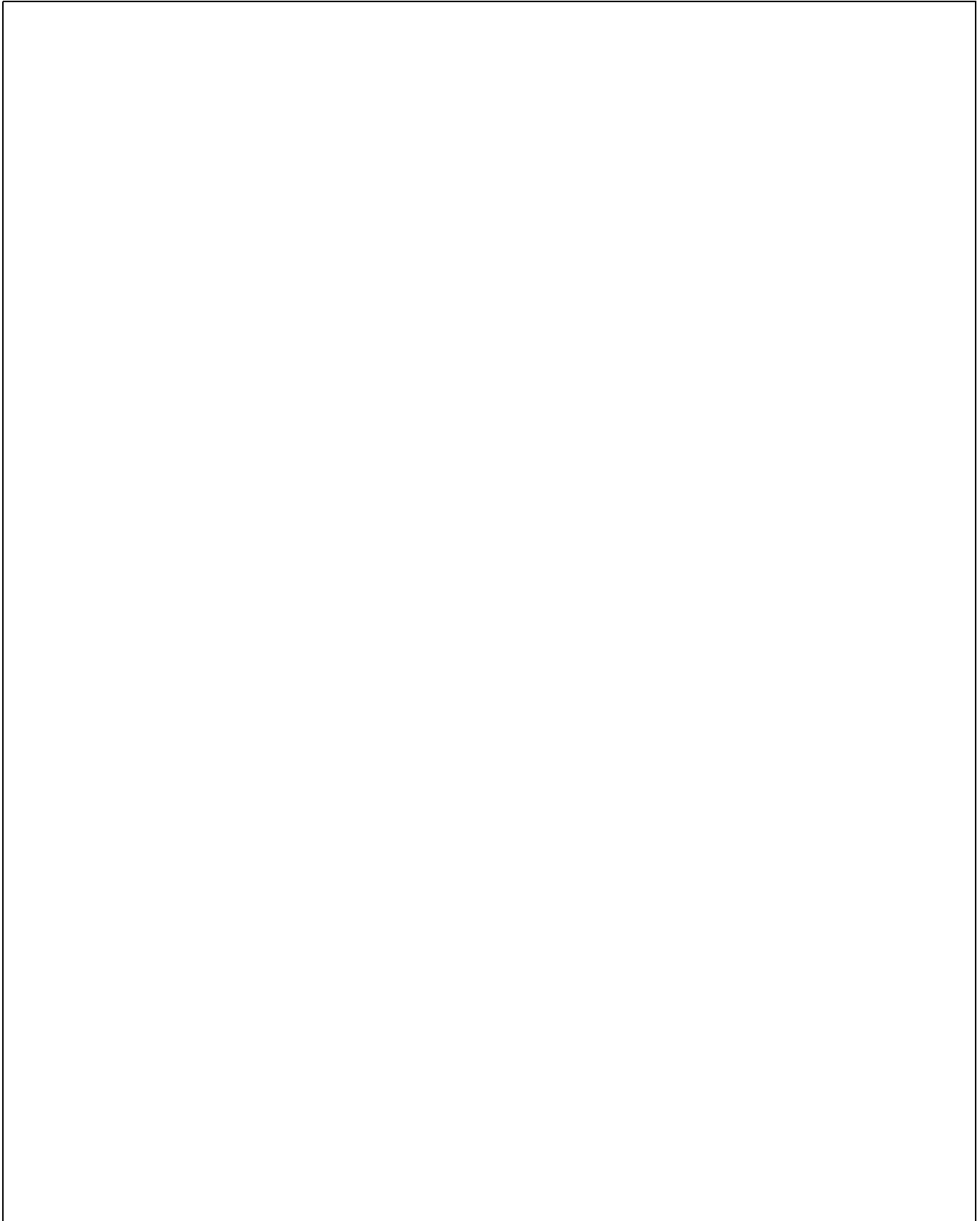
Please fully describe the incident sequence from start to finish.

	GUIDANCE ONLY <i>What happened, where and what time.</i> <i>Was anybody else working with you. What were they doing at the time of the incident?</i> <i>What did you do when the incident happened?</i>

Please summarise the incident sequence from start to finish: (Start from when you started work i.e. Pre-start, first job, smoko, etc)

Time	Event

Draw a diagram of the incident (provide approximate measurements)

A large, empty rectangular box with a thin black border, intended for drawing a diagram of an incident. It occupies the majority of the page area below the instruction.

Did you notice anything unusual prior to or during the incident (People, plant operation, sights, sounds, smells etc):

What was your role in the incident sequence?

What conditions were at the time of the incident (weather, time of day, equipment malfunctions, etc)?

What was the immediate response or actions taken (actions, emergency response, etc)?

Please list other possible witnesses:

Additional comments/observations:

To the best of my knowledge I declare that the above statement is true and accurate.

Witness Name: _____

Signature: _____

Interviewer: _____

Signature: _____

Date: _____



RISK MANAGEMENT

Standard

Business Management Systems (BMS) Group

Document No.: HEQ-STD-00005





Document Version Control

Revision No.	Revision Date	Details of Revision	Approved By
30	26/06/2023	Update sections 8, 8.1, 9.1, 11.1, 12., 12.1.1, 18 for inclusion of psychosocial hazards and risk	Brain Olsen
29	15/12/2020	Update to reflect ISO 45001	Brian Olsen
28	28/05/2020	Addition of COVID-19 to the table in Section 7.1. Addition of Section 11.9 Infectious Disease (COVID-19)	Brian Olsen
27	12/02/2020	Update to Risk Register link in Sections 11.4 and 11.5	Louis Palm
26	17/01/2019	Inclusion of 11.8 Holiday Period Operations	Michael Dixon
25	24/08/2018	Inclusion of 11.7 Risk Based Departure	Michael Dixon
24	12/06/2018	Updates to Sections 11	Michael Dixon
23	17/10/2017	Updates to sections 6, 7, 12.1, 13.1, and 15.	Michael Dixon
22	17/10/2016	Amendments to Table in Section 7 to include Soil Movement Management and Vegetation Clearing.	Michael Dixon
21	29/01/2016	Amends to the following Sections: Section 7.1 Key Hazards and Core Operating Procedures Section 7.5 Delivery / Haulage / Cartage Vehicles Section 11.5.1 Construction Method Statement 11.5.2 Work Method Statement	Michael Dixon
20	20/05/2015	Amendments to Table in Section 7 and Document Owner	Michael Dixon
19	02/04/2015	Changes to Document Permissions	Laureen Constable
18	07/05/2014	Amendment to the wording of Section 11.5.2 Work Method Statement	Laureen Constable
17	26/02/2013	Minor wording corrections to Section 7.3.1	Laureen Constable
16	12/02/2013	Added Appendix 3 Group Risk Register and Feedback process	Laureen Constable
15	12/02/2013	Correction to Section 12	Laureen Constable
14	11/02/2013	Correction to Sections 9.1, 10.2 and 12	Laureen Constable
13	02/10/2012	Minor changes to hyperlinks	Laureen Constable
12	02/08/2012	Minor changes to the order of the reference	Laureen Constable
11	22/07/2012	Metadata amendment	Laureen Constable
10	20/06/2012	Inserted hyperlinks into the Association Documents area	Laureen Constable
9	01/06/2012	Minor changes to the Step 4	Laureen Constable
8	30/04/2012	Minor changes to the references	Laureen Constable
7	26/04/2012	Minor content amendment: Amended last bullet point ('Driving' to 'Diving') in Section 7.1 Key Hazards	Laureen Constable
6	18/04/2012	Minor changes to Risk Assessment Framework	Laureen Constable
5	22/03/2012	Corrected the page numbering in the footer	Laureen Constable
4	22/03/2012	Minor correction to the page numbering in the footer	Laureen Constable
3	17/02/2012	Minor content amendments; hyperlinked the Reference and Associated Documents area. Metadata amendments.	Laureen Constable
2	01/02/2012	Inserted Hyperlinks into 'Reference' area	Laureen Constable



1	22/12/2011	Inclusion into the BMS	Laureen Constable
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Risk Management
Business Management System Group (BMS) Standard
Document No.: HEQ-STD-00005

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1. Purpose

The purpose of this Group Standard is to outline the methodology and process to ensure the 'Hazard Identification, Risk Assessment and Control' (HIRAC) processes are conducted, documented, and are in accordance with the relevant Health and Safety Acts, Regulations, Australian Standards and Codes of Practice.

In addition, provide an outline to assist in the identification assessment and control for risk associated with both environmental and commercial risk (financial, time and quality).

2. Scope

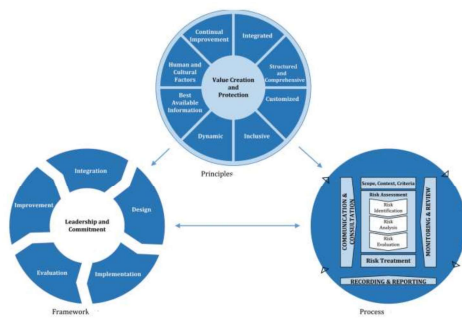
This document encompasses all BMD Group subsidiaries including BMD Constructions; BMD Urban; Empower; JMac Constructions; and Urbex. This Standard applies to all risk assessment activities occurring in the course of activities associated with BMD operations and BMD Group administrative support. It also applies to plant, workers and subcontractors.

This standard addresses the methodology for assessing risk involved in any of the following phases within the BMD Group operations:



3. Introduction

Managing risk is based on the principles, framework and process outlined in AS ISO 31000:2018 and provides guidance for the efficient, effective and consistent risk management approach further content in this document.





Risk plays an inherent and expected role in the construction process. Construction projects are complex and unique, and by nature carry challenging and diverse risks affected by environmental protection; public safety regulation; economic instability; contractual relations; stakeholder (interested party) communication; design assumptions; site conditions; construction procedures; and occupational health and safety "physical and psychological".

For the purposes of the AS/NZS ISO14001:2015 Environmental Management System, AS/NZS ISO9001:2015 Quality Management System Standards AND AS/NZS ISO45001:2018 Occupational Health and Safety Management Systems, 'Top Management' is defined as 'a person or group of people who direct and control an organisation at the highest level'. For the BMD Group 'Officers of the Company' as described in [Section 8.2 HSEQ Leadership Commitment](#) are defined as having responsibilities as 'Top Management'.

3.1. Principles of Risk Management

The principles provide guidance on the characteristics of effective and efficient risk management, communicating the value, intention and purpose of the process through the following:

- Integrated – risk management being an integrated as part of all BMD activities;
- Structured and comprehensive – approach to achieved consistent and comparable results;
- Customised – customised and proportionate framework or process to the BMD internal and external context;
- Dynamic – as risk can emerge, change or disappear, the process should be able to anticipate, detect, acknowledge and respond in an appropriate and timely manner;
- Best available information – should be based upon historical and current information, future expectations while understanding any limitation or uncertainties associated with this information;
- Human and cultural factors – significantly influence all aspects of risk management; and
- Continual improvement – through learning and experience

3.2. Framework for Risk Management

The framework assists in the integrating risk management into significant activities, with the effectiveness depending on governance and decision-making of the organisation which requires support from all stakeholders (especially Top Management).

Top management and oversight bodies (senior management) should ensure that risk management is integrated into all organisation activities and demonstrate leadership and commitment.

Top management is accountable for the management of risk, while oversight bodies (senior management) are accountable for overseeing the risk management process.

This framework consists of the following:

- Integration - Integration of risk management into a dynamic and iterative process forming part of the BMD's organisation & operational purposes, governance, leadership & commitment, strategy and objectives & targets;



- Design – The design of BMD's risk management framework takes into account:
 - Understanding the organisation and context;
 - Articulating risk management commitment;
 - Assigning roles, authorities, responsibilities, accountabilities;
 - Allocation of resources;
 - Communication and consultation;
 - Implementation;
 - Evaluation; and
 - Improvement.

3.3. Risk Management Process

The BMD risk management process provides a systemic approach to the following (this is further broken down in Section 5):

- Communication and consultation – with all relevant stakeholders;
- Scope, context and criteria – defining the scope of the process, understanding the external and internal context;
- Risk assessment – which covers identification, analysis and evaluation;
- Risk Treatment – which cover selection and planning & implementation treatment options;
- Monitoring and review; and
- Recording and reporting.

Note: a comprehensive breakdown of the below is available in AS ISO31000:2018

4. Roles and Responsibilities

The successful development of a proactive risk management culture in the workplace requires:

- Commitment, accountability and leadership;
- Consultation and active participation at all levels;
- An understanding of responsibilities;
- Documented procedures;
- Allocation of appropriate resources; and,
- Ongoing monitoring and evaluation of risks, and processes of control.

The overarching emphasis of risk management is to prevent workplace incidents, physical & psychological injuries, disease and harm to the environment.

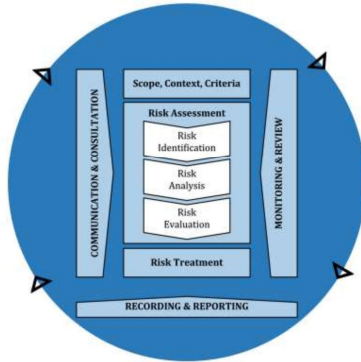
All senior and site management positions have a responsibility to ensure foreseeable workplace risks are identified; assessed; eliminated or controlled; and comply with or exceed minimum requirements contained within legislation, standards and codes of practice.

Top Management
• Customising and implementing all components of the risk management framework; • Issuing risk management process; • Allocation of necessary resources; • Assigning authority, responsibilities and accountability at organisational levels.
Senior Management
• Develop effective risk management programs; • Support and promote risk management processes; • Allocate resources to implement risk management programs and activities; • Ensure workers receive training in risk management processes; and, • Audit hazard identification and control systems for effectiveness, as per review schedule.
Project Managers (including Subcontractor Managers)
• Facilitate the implementation of risk management in areas of responsibility, through effective consultation with all employees (workers); • Participate in risk assessment and control activities; • Identify workers to participate, where appropriate, in planning and design risk assessment processes; • Monitor the ongoing effectiveness of risk control strategies; • Ensure risks to health and safety and the environment are eliminated or controlled when planning the design of new projects, purchasing new equipment and prior to introducing new work processes; and, • Action / investigate hazards and enter corrective action/s when a hazard is reported.
Workers (Employees and Contractors)
• Participate in hazard identification, risk assessment and control activities; • Use the risk control measures, tools and procedures at all times; • Inform management of any risks to health and safety including the effectiveness of risk control systems; • Take reasonable care for the health and safety of themselves and others at the workplace; and, • Report, and where practicable, resolve hazards.

5. Risk Assessment Framework

The objective of this standard is to capture risks in the following areas: commercial; health and safety; and, environmental. The risk management process involves the following steps, as listed in AS/NZS ISO 31000:2018:

- communicate and consult with stakeholders (interested parties both internal and external);
- establishing the scope, context and criteria of the risk assessment and setting objectives;
- identifying the risks;
- analysing the risks to determine the level of risk (defined as the combination of the consequences and likelihood of the risk);
- Evaluating the risk, to decide if a risk requires further control measures (level of acceptance will be determined by the next level of management, High Risk work can only precede with written approval and reviewed by the Project Manager, Extreme Risk can only precede with the written authorisation at General Manager Level.)
- treating the risks, focusing on those risks which are intolerable; and,
- monitoring and reviewing, to continuously refine and improve assessment and risk treatments;
- record and report the outcomes and risk treatments.



5.1. Assessment Competency¹

The process for project Hazard Identification, Risk Assessment and Control (HIRAC) must be undertaken by personnel competent in the use of the company's HIRAC methodology. Evidence of competency can be demonstrated as follows:

- details of competency assessment requirement in position / position descriptions;
- details of competency assessment recorded (after attending and passing a company conducted, or authorised, training session in using and applying the company's HIRAC methodology, or from on-the-job assessment);
- JHAs/WMS can only be signed-off by a person competent in assessing the content; and,
- when the HIRAC methodology changes, training is provided and recorded, and a record will be maintained at either a project level or higher².

6. Communication and Consultation

Communication and consultation with all relevant internal and external stakeholders are to be undertaken to gain an understanding of risks, decisions to be made, actions to be taken. This should occur throughout the whole risk management process with the aim to:

- provide input from varying levels of expertise and experience;
- define risk criteria and evaluating risks;
- source sufficient factual information;
- develop ownership and buy-in.

7. Establishing the Scope, Context and Criteria

Hazard Identification, Risk Assessment and Control is a structured, systematic, proactive approach aimed at early identification of hazards, evaluation of risk, and application of effective risk controls.

Establishing the context is determining the scope of the assessment:

- Which phase within the BMD Group operations are you assessing?
- Which site / location is being assessed?
- Who needs to be involved or consulted during the assessment (all stakeholder)?
- What details need to be recorded and retained?
- What needs to be communicated, and to whom?

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- ¹ OFSC Audit Criteria WH12.2
 - ² OFSC Audit Criteria WH12.2



Establishing the scope, context and criteria helps to clarify boundaries and identify tools required to assist with identification, assessment and recording of results and outcomes.

8. Identifying the Risks³

Risk and Hazard identification is the process of identifying all possible situations where people may be exposed to injury, illness or disease arising from all sources of potential harm (including emergency situations and responses). In addition, the identification of risks to the environment through the aspects and impacts of the business, and commercial risk needs to be considered. Risks are to be identified and assessed:

- At the time of tender and project selection: Site Visit Checklist and [Risk Register](#);
- At the planning and design stage: [Risk Register](#);
- Prior to the project commencing: a formal project specific risk assessment is carried out and includes the handover of the tender & design information as applicable, which is retained in the [Risk Register](#) and forms the foundation for the project sites specific HSEQ systems of work (including emergency preparedness planning); and,
- For the duration of the project at operational and task levels: Ongoing site-specific risk assessments are carried out and recorded in the Risk Register located in the Project's MYJOB page, by the project team.

Additionally, risk and hazard identification must also be considered and assessed:

- Before changes to work practices and systems of work are introduced;
- When planning work processes such as Work Method Statements (WMS);
- While work is being carried out;
- Whenever new, or additional, information regarding work processes becomes available;
- Before changes are made to the workplace, the system or method of work, the plant used, or chemicals used;
- Before and during the installation, erection or commissioning of plant;
- Prior to hiring contractors and labour hire (refer to [Subcontractor HSE Management Standard](#)); and,
- Prior to the introduction of any plant, substances (review SDS where applicable), processes or work practices in the workplace to identify whether there is any potential for injury, illness or disease.
- During the development of any workplace specific emergency response plans

• ³ OFSC Audit Criteria WH14

OHS risks and hazards may include, but not limited to, the following general categories:

Mechanical Hazards	Non-Mechanical Hazards	
▪ "drawing in" points ▪ shearing points ▪ impact and crushing areas ▪ cutting areas ▪ entanglement areas ▪ stabbing points ▪ abrasion areas ▪ flying particles ▪ any protrusions which could cause injury ▪ traffic and vehicles	▪ ergonomic hazards, including manual handling ▪ electrical shocks and burns ▪ chemical burns, toxicity, flammability ▪ noise ▪ vibration ▪ radiation ▪ mist, dust and fumes ▪ confinement and suffocation ▪ violence, harassment and workplace stress	▪ engulfment ▪ biological hazards and viral ▪ slipping, tripping and falling hazards ▪ falling objects ▪ high pressure fluid ▪ high temperature objects ▪ working in very hot or cold conditions ▪ fatigue

Common psychosocial hazards include, but may not be limited to the following categories:

Psychosocial Hazards	
▪ (Very high or low) Cognitive demands ▪ Emotional demands ▪ (Very high or very low) Time demands ▪ Low job control ▪ Poor leadership ▪ Low co-worker support ▪ Low supervisor support ▪ Poor organisational change management ▪ Inadequate reward and recognition ▪ Lack of professional development opportunities ▪ Poor physical environment ▪ Interpersonal or group conflict	▪ Role ambiguity ▪ Role conflict ▪ Organisational injustice ▪ Job insecurity ▪ Remote or isolated work ▪ Shift work ▪ Work / life imbalance ▪ Mental health stigma ▪ Traumatic events or material ▪ Violence and aggression ▪ Bullying ▪ Harassment (including sexual harassment)

Environmental Aspects (i.e. aspects of the business that contain an environmental hazard) and Impacts (i.e. how the hazard impacts on the environment) may include, but not limited to, the following general categories:

Aspects	Impacts
▪ Clearing and Grubbing ▪ Earthworks ▪ PUP removal and replacement ▪ Drainage works	▪ Decrease of water quality in waterways ▪ Loss of flora and fauna ▪ Contamination of land

Aspects	Impacts
- Asphalt / Bitumen works - Office and crib hut operation - Bridgework - Site establishment and demobilisation - Major spills (emergencies) - Approvals / Permits / Licences	- Noise / vibration / light / odour impacts on surrounding community - Decrease in air quality in surrounding community - Spread of weeds / pests / biosecurity items - Disturbance of acid sulphate soils - Generation of waste - Ignition of bushfire - Disturbance of cultural heritage - Generation of greenhouse gas emissions

Key commercial risk may include, but not limited to, the following general categories:

Categories		
Financial	Time	Quality
- Contract conditions - Excessive securities, including bank guarantees - Excessive liquidated damages - Large rewrite of Australian Standard as the contract condition - Change in traditional definitions of items in contract conditions	- Weather conditions - Unrealistic time period for the contracts	Rework due to poor quality control

8.1. Key Hazards and Core Operating Procedures

As a business BMD has identified the following key hazards:

Key Hazard Identification		
Description	Key Hazard	BMD Core Operating Procedure
Working at Heights	- Work involving heights greater than 2.0m; - Falling from one level to another regardless of heights; or, - An unmitigated risk assessment indicates a risk rating greater than low.	Working at Heights Management

Key Hazard Identification		
Description	Key Hazard	BMD Core Operating Procedure
Mobile Plant	- Operating mobile plant; - Site deliveries and plant movement; - Plant and people interaction; - Plant and plant interaction; - Loading of plant incorrectly; - Incidents from utilising plant in poor working condition.	Plant and Equipment Management Isolation and Tagging Management
Fitness for Work	- Increase in likelihood and/or consequence of an incident affecting workers and/or the public from an impaired worker on site, or during transport of materials to and from site; - Impairment from Drugs, Alcohol, Fatigue & Stress.	Fitness for Work Management Standard
Excavation	- Works involving trenching and/or excavation greater than or equal to 1.5m; - With an unmitigated risk assessment indicates a risk rating greater than low.	Trenching and Excavation Management
Traffic	Works near traffic with an unmitigated risk score greater than low.	Traffic Management Standard Traffic Management Plan Template <i>Note: The above documents have been created instead of a COP in this instance.</i>
Structural Alternatives / Temporary Support Structures	Works requiring false work and temporary structures and design.	Formwork and Falsework Management Scaffolding Management Temporary Works Management
Electrical	- Working near or with underground and overhead services; - Potholing and identification of underground services.	Isolation and Tagging Management; Working Near Services.

Key Hazard Identification		
Description	Key Hazard	BMD Core Operating Procedure
▪ Confined Spaces	▪ Working in a confined space.	▪ Confined Space Management
▪ Manual Handling	▪ Work with the risk of musculoskeletal injury. ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Hazardous Manual Task Management
▪ Working Near or Over Water	▪ Works that involve the risk of drowning. ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Working Near or Over Water Management
▪ Hazardous Chemical	▪ Works with the risk of injury from chemicals. ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Hazardous Chemical Management
▪ Remote or Isolated Work	▪ Increase in risk of injury, when no assistance is available. ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Remote or Isolated Work Management
▪ Psychosocial Hazards	▪ Various hazards as identified within ISO45003:2021 (listed within Section 8)	<i>Note: Risks posed by psychosocial hazards are controlled via multiple levels within the BMS Framework. Refer to the Risk Register for specific details regarding each hazard.</i>
▪ Water Quality	▪ Risk of degradation of water quality from the works. ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Water Quality Management
▪ Soil Movement and Management	▪ Works with a risk of unlawful movement of clean and contaminated soil ▪ With unmitigated risk assessment indicates a risk rating greater than low.	▪ Soil and Land Management
▪ Vegetation Clearing	▪ Risk of impact on ecological values	▪ Vegetation Clearing Management

Key Hazard Identification		
Description	Key Hazard	BMD Core Operating Procedure
	With unmitigated risk assessment indicates a risk rating greater than low.	
Infectious Disease (COVID-19)	- Worker in risk of infection and spread of COVID-19 - Business Continuity risk due to impact of COVID-19	COVID-19 Safe Management Plan Business Continuity Plan (BCP) – COVID-19

Where these key hazards are identified on a project, then the corresponding BMD Core Operating Procedure is to be used as a minimum requirement to address the risks. The requirements in these COPs are to be used to determine the works methodology and be communicated to the workforce in the Work Method Statement and Job Hazard Analysis Card.

Other hazards identified that need consideration if they arise are:

- Demolition;
- Tilt-up / Precast Concrete;
- Asbestos;
- Explosives;
- Construction Work In, Over or Adjacent to Water / Liquids Where Risk of Drowning;
- Tunnels;
- Pressurised Gas;
- Chemical, Fuel or Refrigerant Lines;
- Telecommunication Towers;
- Contaminated / Flammable Atmosphere;
- Artificial Extremes of Temperature; and,
- Diving.

As a final check the development of control measures for hazards requires a comparison to be carried out against the criteria outlined in the OFSC document, [Audit Criteria Evidence Guide](#), as applicable.



8.2. Consultation⁴

Consultation with workers and others who may be affected by the risks in the workplace is essential at all stages of the risk management process. Workers and others are encouraged to participate and suggest ways to effectively manage the risks and to allow them to operate efficiently in their jobs.

8.3. Client or Other Entity⁵

8.3.1. Client or Other Entity Controlled Workplace

When required to provide services within a client's or other entity's workplace, a risk assessment shall be conducted to ensure all health, safety and environmental hazards that could affect the workers and public at the workplace are identified, assessed and controlled. This is to be documented in the project's [Risk Register](#). The identified hazards and associated controls must be communicated and reviewed by all stakeholders through interface meeting or other forums

In addition, the commercial risks need to be considered in these circumstances as well.

8.3.2. BMD Controlled Workplace

When the client or any other entity's is required to provide services within, or has the potential of impact on, a BMD workplace, an interface meeting or other forums must be conducted to ensure health, safety and environmental hazards that could affect the workers and public at the workplace are identified, assessed, controlled and documented in the project's Risk Register. The identified hazards and associated controls must be communicated and reviewed by all stakeholders and workforce that may be impacted by this works.

As a minimum, all people within or accessing through a BMD controlled site must have completed the BMD site induction which must communicate all site requirements, identify hazards and appropriate control measures, prior to the commencement of work and/or accessing site.

8.4. Plant and Equipment Risk Assessment

Prior to the induction of any plant or equipment to the workplace, a risk assessment must be conducted to identify any possible situations where people may be exposed to injury, illness or disease arising from its operation or use. The detail requirements when purchasing (including risk assessment) BMD plant or equipment's is contained the BMD's [Purchasing and Supplier Commercial Procedure](#).

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- ⁴ OFSC Audit Criteria WH12.4
 - ⁵ OFSC Audit Criteria WH 12.4



The risk assessment process should be followed when identifying the plant which is fit for purpose (e.g. use of long-reach excavator). Prior to mobilisation or commencing work a plant risk assessment and site checklist must be conducted on each individual piece of mobile plant (either BMD owned or Hire-in) This includes but is not limited to pinch points, exposure to fuel and lubricates, refuelling process, service history, legislative and manufacturer's operational requirements (refer to [Plant and Equipment COP](#)).

8.5. Delivery / Haulage / Cartage Vehicles

The arrival, departure and the journey of heavy vehicles in association with BMD's works is viewed as a key risk, and must be controlled through the following actions:

- Complying with Chain of Responsibility requirements, and hence, BMD requirements as detailed to ensure BMD, and/or its contractors do not drive or promote a behaviour that contributes to an unsafe act.
- Utilising contractors that are compliant with the Heavy Vehicle National Law (HVNL), or alternatively, instructing contractors without a compliant system to operate with BMD set requirements or to take appropriate corrective action to ensure compliance before use.
- Ensuring delivery drivers receive a [Deliver Driver Induction](#).
- Ensuring the loading of heavy vehicles meet set requirements regarding mass and size, and that the transport route and vehicle selection is appropriate for the task.
- Monitoring deliveries to ensure compliance, and that drivers and other parties in the Chain of Responsibility are acting in a safe manner, with key processes in place to ensure drivers are not impaired due to drug, alcohol or fatigue.
- Controlling access onto the vehicle and / or load in a safe manner during loading and unloading.
- Complying with biosecurity protocols for set regions, such as regarding dieback, fire ants and noxious weeds, to ensure no environmental harm occurs.

The above will be addressed through the identification of HVNL requirements as part of key tasks for the project. Where assessed as 'High Risk', these shall be recorded in the [risk register](#), then managed through the Subcontractor selection and the Risk Management process by identifying and communicating controls in items such as the Construction Method Statement, Work Method Statement and/or Job Hazard Analysis risk management process. Consideration should be made through key phases of the project such as during:

- The establishment phase;
- Any heavy material reliant activities (such as precast and pavements); and
- During the disestablishment phase.

8.6. Hazardous Chemical Risk Assessment

Similar to the above, prior to bringing any chemical or substance to the workplace the risk assessment process must be followed. If a chemical or substance is determined to be hazardous, the [Hazardous Chemical COP](#) must be followed.

9. Analysing the Risks

Analysing the risks means determining outcomes associated with the hazards; what can happen for the hazard to cause harm or loss? The analysis of risks involves considering the likelihood (probability) and consequence of the identified risks, to calculate the overall level of risk (extreme, high, moderate or low).

The BMD Risk Matrix tool is used to determine probability and consequences.

Please refer to [Appendix 2: Risk Matrix](#).

Note: *At tender phase the Risk Register is used to assess and identify major hazards and high-level risks.*

For small scale projects that have uniformity, there is an allowance with the approval of Senior Management to analyse risk as one project.

9.1. Determining Probability

The first step is to determine the probability of the risk occurring. This involves determining the frequency (and duration for psychosocial hazards) of exposure and the probability of an incident occurring. The basic premise is the more an individual is exposed to a hazard, the more likely it is for an incident to occur.

9.2. Determining Consequences

The second step is to analyse the potential consequences (impacts/effects) by identifying all possible outcomes or severity and any associated impacts. Consideration must be given during any risk management process to events that while having a low probability, the actual occurrence of the event would have a high consequence.

A person competent to assess risk must review all proposed changes for:

- technical capability;
- hazards; and,
- loss potential.

Note: *The identified risks and ratings shall be recorded in the risk register.*

9.3. Specific Safety Legislative Requirements

Legislation requires employers to assess risks posed by hazards (initial and residual) in their workplace, and to determine how best to modify their work processes to effectively eliminate or control risks. These requirements are documented in the appropriate Occupational Health and Safety Regulation (AS/NZS 4801:2001).

The *Regulations* require "a Person Conducting a Business or Undertaking (PCBU) to consult with the Health and Safety Representative of a designated work group, if practicable, when undertaking hazard identification, risk assessment or control of risk processes that may affect the health or safety of any member of the designated work group."

9.4. Environmental Compliance Obligations

Each project needs to consider any environmental regulatory requirements from the Federal, State and Local Government authorities; this may also depend on the scale, nature, location and sensitivity of the surrounding environment. As there may be a number of permits, authorities, etc. that need to be addressed by the project, these are required to be factored into the risk assessment. Additionally, Client requirements and specifications, and the interests of stakeholders (e.g. community), need to be considered when undertaking the risk assessment.

9.5. Other Available Information

Other areas to be considered when analysing a risk includes information from the construction industry and other relevant industries; organisational and project incident reports; hazard information; specifications and approved drawings; manufacturers or suppliers' guidelines; inspection and audit reports; bulletins and alerts; and change notices can also be considered during the HIRAC processes. If used as a means of supporting a decision for a risk analysis, the reference should be recorded on the appropriate project specific Risk Register.

10. Evaluating the Risk⁶

Risk evaluation, as defined in *ISO 31000:2018* involves comparing the results of the risk analysis with risk criteria, to determine whether the level of risk is acceptable, tolerable or intolerable, with intolerable risks requiring treatment as a priority. Given finite resources, it will not be possible to treat every risk, and indeed, there is a point where the cost of implementing a treatment far outweighs the benefit (or risk reduction) gained.

The BMD Risk Matrix tool calculator is used to determine the rating for the risk.

Please refer to [Appendix 2: Risk Matrix](#).

10.1. Assigning a Risk Rating and Control Priority

When the consequence and the likelihood have been decided, the risk rating is determined at the point where the consequence and probability meet; the greater the assessed risk is, the greater the effort and level of control required. Using this process, all hazards associated with the task can be assessed and prioritised according to the risk rating.

Note: *The risks ratings and control priorities shall be recorded in the relevant Risk Register and transferred to any relevant JHAs/WMS⁷. This also includes sub-contractors who must have access to this information, and have it included in their WMS.*

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- ⁶ OFSC Audit Criteria WH12,5
 - ⁷ OFSC Audit Criteria WH12.3



Note: Any major hazards and high-level risks identified at tender phase via tender handover are to be transferred to the Risk Register for management within the project.

An extreme risk rating requires further planning and notification to the next level of management, an analysis of the control measures to reduce this risk score through the re-evaluation using the HIRAC process is then conducted. All work associated around this risk must also stop during the re-evaluation, until all potential controls have been explored, implemented and/or ruled out and presented to and given written authorisation by General Manager Level; consideration may be given but not limited to such things as redesign, changing high level work practices.

A high-risk rating requires that all work associated around the risk must stop, and the HIRAC process re-used until all potential controls have been explored, implemented, ruled out and presented to and given written authorisation by the Project Management Level; consideration may be given but not limited to such things as changing site work practices, increase supervision, permit to work system.

11. Treating the Risk⁸

In identifying risk control measures, there is a legal requirement to **eliminate** potential foreseeable risks to health and safety, if reasonably practicable. If elimination is not reasonably practicable then there is the requirement to identify effective measures to reduce the risk. Similarly, the same approach should be applied to environmental risk management with all reasonable and practicable controls applied to minimise environmental harm.

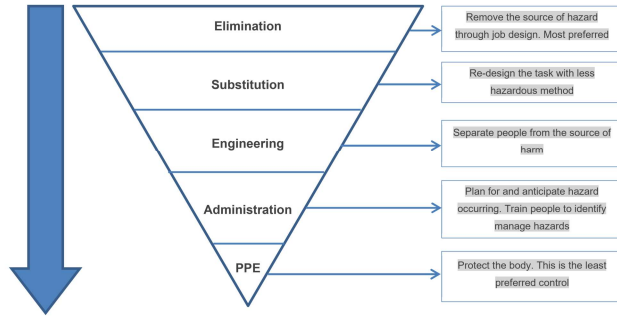
The selection of risk control measures should be based on a comprehensive understanding of the risk issues (and hazards) concerned. This understanding comes from an appropriate level of risk analysis. It is particularly important to identify the causes of the risks so that these are treated and not just the symptoms. If there is an immediate risk to health or safety, the process/activity in question must cease until appropriate measures are taken to remove the immediate risk.

For risk control measures, consideration should be given to the severity of injury, illness or disease that could occur. If the severity is high (i.e. fatality, serious injury, etc.), a higher hierarchy order of control (i.e. elimination, substitution, engineering controls and isolation) should be used.

11.1. Hierarchy of Control

The hierarchy of control is a legislative approach to controlling risk and, is a list of control measures in order of priority that can be used to eliminate or minimise exposure to hazards.

⁸ OFSC Audit Criteria WH12.5 & 12.6



OHS legislation specifies not to depend solely on the use of administrative controls or personal protective equipment (PPE) to reduce the risk, unless you have established the following practicable measures:

- Eliminate or remove the hazard;
- Substituting the plant or substance with another one that is less hazardous;
- Using engineering controls (e.g. modifying the design of the workplace or plant, or environmental conditions);
- Isolating people from the source of exposure;
- Changing the objects used in the task involving manual handling;
- Using mechanical aids for manual handling tasks.

If elimination is not reasonably practicable, consideration should be given to each of the other control measures in priority order until a control measure or combination of control measures are identified which can achieve the required reduction in risk exposure to the hazard/risks.

The Risk Assessment identifies the Hierarchy of Control after the control type to ensure the most effective controls are considered.

The control measure for the hazard/risk must be and remain:

- fit for purpose;
- suitable for the nature and duration of the work;
- installed, set-up and used correctly; and,

- comply with legislative requirements.⁹

Note: *These risks and their control measures must be recorded and managed in the relevant project risk register.*

11.2. Risk Rating

If upon the completion of the risk assessment process the residue risk rating is identified as 'Extreme' or 'High' the follow must be followed:

Extreme – Authorisation from the BU's General Manager is required. Further planning and notification to the next level of management is required to analyse control measures to reduce the risk score. Work associated around this risk must stop, and the HIRAC process followed until all potential controls have been explored, implemented and if necessary, ruled out. The assessment will be submitted and written authorisation by a General Manager obtained before the activity commences. Consideration may be given to such things as redesign, changing high level work practices etc.

High – Authorisation from the Project Manager is required. Work associated around this risk must stop, and the HIRAC process followed until all potential controls have been explored, implemented, and if necessary, ruled out. The assessment shall be submitted to the Project Manager for written authorisation before the commencement of the activity. Consideration may be given to such things as changing site work practices, increased supervision, etc.

12. Implementing Management Strategies¹⁰

12.1. Group Risk Management

A Risk Register shall be generated and maintained identifying the high levels risks for the entire BMD Group. This will involve the roll up of risks from the project level through the Business Units to the Group. The Group Register shall also include risks from the Corporate Office. Each of the Business Units shall maintain their own Risk Register. Risks associated with regional offices shall be recorded within the Business Unit Register.

The process involves reviewing the risk registers from the projects and combining the high-risk items to form a Business Unit Risk Register. The Business Unit General Manager (or delegate) is responsible for ensuring that this is undertaken on a minimum of an annual basis. Senior Managers and HSE and / or System Representatives from within each Business Unit shall be involved in the review of the Risk Register.

Similarly, the high-risk items from the Business Units will be merged into a Risk Register for the BMD Group. The Group Risk Register shall be reviewed on an annual basis as a minimum by the Chief Risk Officer and the

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- ⁹ OFSC Audit Criteria WH12.6
 - ¹⁰ OFSC Audit Criteria WHS 12.7



HSEQ Steering Committee. Both the frequency and severity of the risks will be utilised to ascertain the risks that are to be rolled up from one level to the next.

At the commencement of a new project the Business Unit and Group Risk Registers will be consulted to ensure that any activities and their controls applicable to the project are transferred to the project level. Additionally, if following the development of a Project Risk Register extreme or high risks are identified, these are transferred up to the Business Unit Risk Register.

A schematic of the risk rollup and feedback process is outlined in [Appendix 3](#).

Responsibilities for each of the Risk Registers shall be as follows:

Risk Register	Person Responsible
Group	Chief Risk Officer
Northern Region Construction	General Manager
Southern Region Construction	General Manager
Urban	National General Manager – Urban
JMac	General Manager
Urbex	General Manager
Empower	General Manager
Project	Project Manager

Copies of the Business Unit and Group Risk Registers shall be stored on the BMS with current versions available to the Group.

12.1.1. Communication of Group Risk

Communication of current risks is required up from projects through to Board Level. To facilitate this process the top 3-5 risks are listed in each Project's HSE Overview on a monthly basis. Business unit HSEQ Representatives collate and review this information and adjust the Business Unit Risk Register as required. Subsequently the monthly reports and risk registers for each business unit are reviewed by Functional Leads and **Chief Risk Officer**. This information is included in the monthly Board Report and HSEQ Steering Committee Meeting minutes.

12.2. Project Risk Management

Risk management is a continuous process through all stages of a project including tender, design and construction. The key document for demonstrating the risk assessment process on a project is the risk register. This register is a live document within the Beakon platform which is progressively reviewed and updated throughout the life of the project. It ensures a record of all risks, and the means adopted to control them, is maintained throughout the life of the project. The risk register is considered a mapping document that records

all identified risk and can also reference to documents that are developed to detail the risk control measures to be implemented.

The Risk Register should be reviewed and updated at each phase change of the project life cycles (e.g. transferring from tender to construction). During the construction phase this review should as scope works changes or as a minimum on a 6-month basis.

The risk register shall contain information about:

- the risks identified;
- their causes;
- the nature and extent of the potential impacts associated with the risk issues;
- any additional control action required to further control risk to an acceptable level;
- the immediate risks, expressed in terms of consequence and probability factors (the risk rating), and the residual risk rating after the application of controls;
- the existing controls being relied upon to control risk to an acceptable level; and,
- an assessment of risk control effectiveness, through the consideration of the Hierarchy of Controls.

The project risk register is generated within the **Beakon platform** and allows for the consideration of safety, environmental and quality risks and opportunities.

12.3. Opportunity

Although the Risk Register is substantially focussed on addressing risk, it also includes the ability to record and manage project opportunities.

12.4. Tender Phase

During the tender phase of a project HSEQ risks shall be identified, assessed and recorded in the [BMD Estimating Risk and Opportunity Register](#). Following the successful completion of the tender, risks and opportunities identified during the tender phase shall be communicated to the project team during the tender handover meeting.

12.5. Safety in Design

Where BMD are involved in Design and Construct (D&C) projects, safety hazards shall be identified and eliminated at the design stage wherever possible. Engineering contractors providing design, procurement, and construction management services, will ensure their scope for design criteria covers OHS buildability issues during construction.

Outcomes from design stage risk assessments and treatment processes and any required actions shall be recorded in the [BMD Estimating Risk and Opportunity Register](#) and monitored until closed-out or implemented.



Any design changes shall be reviewed against current project documents and risk assessed where applicable. Design change amendments shall be document controlled and retained for reference. When there are design amendments the Project Manager may include request of design risk assessments from the client / designer. The design project team must ensure certification and approval from the required authorities is approved and signed-off for all documentation.

All changes / amendments shall be discussed at project meetings and communicated to the wider team as appropriate. For Construct only projects, BMD are to be provided a Safety In Design report from the Client that has been prepared by the designer. This shall be done prior to the commencement of construction activities and included in the project's risk register.

12.6. Construction Phase ^{11 12}

Prior to establishment of a site the Project Manager, Engineers and Field Supervision are to review the construction methodology of the project. This includes examining and evaluating all sections of the construction sequence and breaking them down to all relevant activities.

For all BMD projects, a site-specific risk assessment shall be completed before work commences and recorded in the project Risk Register. It shall include:

- a review of the risk register prepared by others at time of tender and during the design phase;
- evaluation of key HSEQ hazards as detailed in Section 7.1 as applicable to the site;
- all stages of the project, including purchasing, hire and supply of goods and services, and subcontractor works;
- reasonably foreseeable emergency incidents;
- stakeholder and community impacts; and
- legislative requirements and compliance obligations.

The Risk Register is prioritised and addressed based on extreme to low risk. An owner shall be assigned to each risk during the development of the register.

The project team including the risk owner will regularly (each stage or 6mth minimum) review and update the Risk Register to ensure controls are adequate and applied. Following the completion of activities involving a particular risk, the risk may be closed in the register.

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- ¹¹ OFSC Audit Criteria WH12.1, 12.3 & 12.4
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12.6.1. Construction Method Statement (CMS)

Where activities have been identified as complex or high risk by the project team, a Construction Method Statement (CMS) will be generated. This is to be done at the discretion of the project team as CMSs are not a requirement for every project. The CMS shall be developed in consultation with the Project Manager engineering team, field supervision and HSEQ representatives.

A Construction Method Statement (CMS) shall consist of, but not limited to:

- methodology;
- timing;
- plant and equipment;
- risks and hazards, introduced and inherent;
- chain of responsibility requirements;
- commercial risk;
- resources;
- safety;
- legal compliance;
- environmental;
- training;
- materials;
- associated WMS and BMD Core Operating Procedures.

Hazards and aspects identified on the Construction Method Statement will be recorded in the project risk register.

12.6.2. Work Method Statements (WMS)

Work Method Statements (WMS) are developed for all activities containing hazards and risks including consideration of Chain of Responsibility requirements. The purpose is to identify risks and control measures and communicate these to the workforce undertaking the activity.

Note: BMD's Work Method Statement (WMS) is equivalent to any reference made to Safe Work Method Statement (SWMS) under any legislation. As the WMS encompasses all safety and environmental hazards, aspects and control measures for the activity, the reference to 'Safe' in the beginning has been removed for simplification and to avoid confusion.

WMS Development

The WMS breaks down the activities into defined tasks and identifies any associated safety hazards and environmental impacts and assigns a risk score. The WMS must be developed in consultation with workers conducting the activity (or their representative). Project team members (e.g. engineers, supervisors, HSEQ



reps, workers) are to develop project specific WMS from the BMD template. These are to be reviewed by the HSEQ Reps and approved by the project manager prior to the activity starting onsite.

During the development of WMS additional sources of information to identify potential hazards must be considered, these sources may include but not limited to:

- legislation and industry alerts;
- previous work history;
- Incident trends;
- industry knowledge.

Example WMS can be used as a guide; however, a full review of the project specific risks and hazards is to be completed to reflect the actual site details and activities. For further information consult the [BMD WMS Guideline](#).

Hazards and Controls identified in the WMS should be specific to activity and not generic statements (e.g.: in case of trenching – shoring to be used instead of the generic batter, bench or shore),

Communication of WMS

It is the responsibility of the project manager (or delegate) to ensure all workers onsite have read an understood the WMS(s) related to their work. All workers are to sign on to the WMS prior to starting the activity onsite.

Review of WMS

Hand written changes to existing WMS are acceptable, this document must have the version number changed, also details of changes, update version number and date of change recorded in "Review and Monitoring" section of the WMS, all persons involved in the activity must reviewed and re-signed the WMS.

Note: *If the activity risk is determined to meet the criteria of extreme risk, the activity shall not progress until a full review is conducted by a Senior Manager.*

12.6.3. Job Hazard Analysis (JHA) Cards

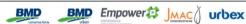
[Job Hazard Analysis \(JHA\) Cards](#) are to be completed prior to any task on site by the work crew in the field. The work task shall be broken down to individual steps for greater understanding. Work crews are required to identify any safety and environmental hazards that may exist within the work area, especially hazards that may be introduced into the area, e.g. plant, equipment and specific work environment. (Refer to the [JHA template](#)).

JHA cards have a maximum life of one week before needing to be re-written and are to be reviewed daily by crews or when there are changes to activities or conditions in the work area.

Note: *The JHA cards shall be used in conjunction with the WMS for any activity and does not replace the requirements of the WMS.*

12.7. Risk Based Departure

During construction activity there may be circumstances where it is reasonable for teams need to utilise a methodology which may vary from the BMD System requirements.





Prior to adopting an alternative methodology, a risk assessment must be undertaken to ensure that the alternate methodology delivers the same level of protection / risk mitigation and in no way removes any requirements set by legislation.

Requirements around alternative methodology:

- The reasons for the proposed departure from BMD's systems regarding safety, environmental and quality considerations need to be clearly documented as follows:
 - A detailed risk assessment has been completed in the form of an activity specific work method statement in consultation with the relevant workforce team. This is only valid for a defined period which is to be documented within the WMS
 - The new risk assessment WMS must be recorded in the Project Risk Register.
 - The Project Manager must review the proposed Work Method Statement (WMS) with the workforce team and HSE Representative to confirm legislative requirements are being met.
 - The Project Manager is to consult with Senior Management prior to approving the alternative methodology.
 - Work must not commence until the Project Manager has signed off on the WMS, and the closure of this WMS is after the completion of the nominated activity.
 - Project Management must increase the frequency of supervision and method of monitoring of works conducted under the alternative methodology.
- Where an alternative methodology is sought from a client's set process, all aspects of the procedure above apply, with the additional need to consult and obtain approval from the client.
- Following the completion of the subject activity, the alternative methodology is not to be adopted for future activities either on that project or other projects without the above process being followed. If similar circumstances arise again where an alternate methodology is optimal, then the process outlined above must be restarted and followed through.

Note: Departures to a higher standard due to Regional or Client requirements are considered business as usual when undertaking the risk management process and are hence not part of this procedure.

12.8. Holiday Period Operations

During project shutdown due to holiday periods a number of risks need to be managed when staff are not onsite. To identify and manage these risks a [Holiday Period Operations Plan](#) shall be developed by each project. This plan shall identify risks, mitigation measures and responsibilities for the project during this period where works are shutdown. Within the plan is a Pre-Holiday Inspection Checklist for projects to complete prior to shutdown period. It shall also detail plans of how projects start-up works on the site following the break.

12.9. Infectious Disease (COVID-19)

The crisis arising from the COVID-19 pandemic poses risks that threaten the viability of BMD and has the potential to impact the safety or wellbeing of workers and others, and/or the integrity, performance, or reputation of the company. BMD recognises that COVID-19 is a potential source of emergency in the workplace and has created a COVID-19 Response Team. The Group has developed and implemented both a [COVID-19 Safe Management Plan](#) and [Business Continuity Plan \(BCP\) – COVID-19](#) to recognise and manage the overall business risks.

13. Monitoring and Reviewing¹³

The monitoring and review of project safety and environmental risks consists of the following:

- [Activity Based Conservations \(ABCs\)](#);
- internal and external audits;
- regular inspections;
- monitoring;
- testing; and,
- reviewing.

These are carried-out to verify the project management plan requirements (e.g. SMP, EMP) have been implemented and controls are in place. Additionally, these are conducted and to ensure the hazard identification, risk assessment and risk control process is subject to an evaluation to ensure the effectiveness of the process. This also provides the opportunity to identify and amend any controls as a result of another risk being identified.

Any major safety hazards and high-risk work associated with the project / site is controlled in accordance with the *Major Hazard Guidelines* designed to meet the *Federal Safety Commission (FSC)* and legislative requirements.

• ¹³ OFSC Audit Criteria WH12.7

13.1. Inspection and Review

The following table details the communication and reviews conducted to ensure effectiveness of the process and controls including the frequency of review, the responsible person and the checklist or tool used for the activity.

Checklists located within the BMS are designed to assist people who are involved in the hazard identification process and systematic identification of hazards.

Item / Details	Review Cycle	Responsible Person	Checklist / Tool
Communication			
Site Induction	On Start	Foreman	Prestart Talk and Site Induction Attendance record
Construction Method Statements and Work Method Statements	At commencement of a project and at a maximum of 6 months	Project Manager	Not applicable
Job Hazard Analysis	Weekly / Daily	Field Supervisor	JHA Card
Prestart and toolbox meetings - communicate additional hazards or risks introduced since the previous shift	Daily	Foreman	Prestart / Toolbox Talk record - signed by all attendees, HSE Alerts
Major hazards and high-risk activity reviews	Monthly Random	Engineers and Foreman in their respective work areas	Project Risk Register
Key Project HSE Risks	Monthly	Project Manager	HSE Overview
Review			
Identify, controlling and reporting of hazards	As identified	Site employees and sub-contractors	ABC Card
Activity Based Conversation	Weekly	PM / Engineers / HSE Reps and Foreman	ABC Card

Item / Details	Review Cycle	Responsible Person	Checklist / Tool
Weekly inspection	Weekly	PM / Engineers / HSE Reps and Foreman	Inspection Checklist
Monthly site inspections	Monthly	Project Manager or his delegate	Not applicable
Audits	Minimum of once every six months	Internal or appropriate external body/external systems audit as per project requirements	Audit Report

Note: All relevant documents may be reviewed if there is a significant injury or incident requiring revisiting the construction methodology, in which case any or all of the documents may be changed.

13.2. Reporting Hazards

Hazard identification is communicated and reported to assist in reducing the exposure to hazards and potential for illness, injury, environmental harm and commercial. Reporting hazards provides an opportunity to establish proactive measures to control the risk that the hazard presents.

It is the duty of all workers, sub-contractors and visitors to verbally report any hazard they may observe to their immediate supervisor, or escort in the first instance. Hazards identified during the course of work are to be formally reported using the [Activity Based Conversation \(ABC\) card](#).

Note: If the issue involves an immediate risk to health, safety or environment, work shall cease until the issue is resolved and corrected or controlled.

13.2.1. Immediate Hazard Response

All HSE hazards and hazardous conditions should be rectified immediately. If unable to do so, the hazard shall be isolated, signposted and secured to warn other personnel of the danger. As soon as practicable, the hazardous condition shall be reported, rectified, controlled or eliminated.

13.3. Corrective Action

Corrective actions raised shall be entered into the [Corrective or Improvement Actions database](#) and tracked until implemented / closed out. All hazards are assigned corrective action priorities and subject to risk assessment and control strategies.

13.4. Managing Changing Risks

Managing risk extends to identifying and assessing risks associated with change which can include, but not limited to:

- changes to processes (temporary or permanent);
- changes to competency requirements;
- modifications to plant and equipment;
- changes to the operating parameters of plant and equipment;
- relocation of plant and equipment;
- changes to procedures for plant and equipment;
- introduction of hazardous substances;
- change in weather conditions;
- temporary works / support structures;
- changes to existing works / support structures;
- adding to, or re-routing, existing piping, cables / hydraulic lines etc.;
- new knowledge or technologies; and,
- changes to legislation, Codes and Standards should also instigate a review of procedures/WMS.

The level of risk assessment undertaken must be suitable for the potential implications of the change. Relevant members of the workforce must be involved when assessing risks posed by change. The following points need to be considered when evaluating the process:

- a more detailed risk assessment should be performed, and details recorded, if required;
- a description of the change/s must be recorded and detailed;
- any changes to processes must be communicated to all persons affected by the work; and,
- The expected outcomes of the proposed changes must be identified and can be used to assess whether the changes were effective.

14. Record Keeping

Documentation demonstrates risk management has been conducted properly and systematically. Risk management records provide an accurate record of decisions made and actions taken to effectively manage workplace risks.

Site records are retained to reference:

- Compliance with OHS and environmental legislation;
- When and where hazard identification was carried out;
- Summary of identified hazards and associated management and mitigation controls;
- The risk assessment method used;
- Implementation and consultation in the risk control methods; and,
- New measures implemented.



All completed risk assessments and registers shall be kept in an electronic format for the duration of the project and stored within the SharePoint Project Site.

15. Definitions

Top Management	BMD Group 'Officers of the Company' as described in Section 8.2 HSEQ Leadership Commitment
Operational Senior Management (General / Operations / Construction Managers)	Off-site regional Senior Management team for BMD Constructions, BMD Urban, JMac Constructions, Empower and Urbex
PCBU	Person Conducting a Business or Undertaking.
Project Manager	Person in direct control of project (e.g. Area Manager, Site Engineer in lieu of Project Manager).
Consequence	Outcome or impact of an event.
Control	The means used to manage risk, i.e. policy, procedure, device, physical barriers, system, communication or other action.
Hierarchy of Control	A legislated method for controlling risk, from elimination of the hazard, substitution, engineering or administrative controls to the wearing of PPE.
Exposure	The frequency at which persons could be exposed to consequences of a specified severity.
Hazard	Any condition, situation or action (behaviour) which, when left uncontrolled, has the potential to cause harm.
Psychosocial Hazard	Hazards which arise from, or in relation to, the design or management of work; the working environment; plant within the workplace; or workplace interactions or behaviours that may cause psychological and/or physical harm.
Hazard Identification	The process of recognising a source of potential harm or detriment.
HIRAC	Hazard Identification, Risk Assessment and Control.
Incident	Any unplanned event or situation, that has caused or has the potential to result in (i.e. near miss), adverse consequences to people, the environment, property, reputation or a combination of these.
JHA	Job Hazard Analysis.
MSDS	Material Safety Data Sheet.



WMS	Work Method Statements.
Likelihood	A description of probability or frequency, in relation to the chance that something will occur.
Residual Risk	The remaining level of risk; typically used to describe the risk left after risk treatment/control measures have been implemented.
Risk	Exposure to the consequences of uncertainty and/or the likelihood or probability a hazard may cause harm. It has two dimensions: the likelihood of something happening and the consequences and severity if it were to happen.
Near Miss	An incident that may have led to an injury or to affecting the health of an individual but did not.
Analysis	Systematic use of available information to determine how often specified events may occur and the magnitude of their probability/likelihood and consequence.
Probability	The likelihood of a specific outcome. Usually measured by a ratio against the total number of possible outcomes.
Risk Assessment	A process used to determine risk management priorities by evaluating and comparing the level of risk against pre-determine factors, target risk levels or other data.
Risk Management	The systematic application of management data; policies; procedures; practices to the tasks of identifying; analysing; assessing; treating; and monitoring risk and hazards.
Workers	Employee, contractor, sub-contractor, labour hire, etc.

The terms "hazard identification", "risk assessment" and "risk control" are commonly used to summarise the systematic approach for undertaking the above activities for managing workplace health and safety.

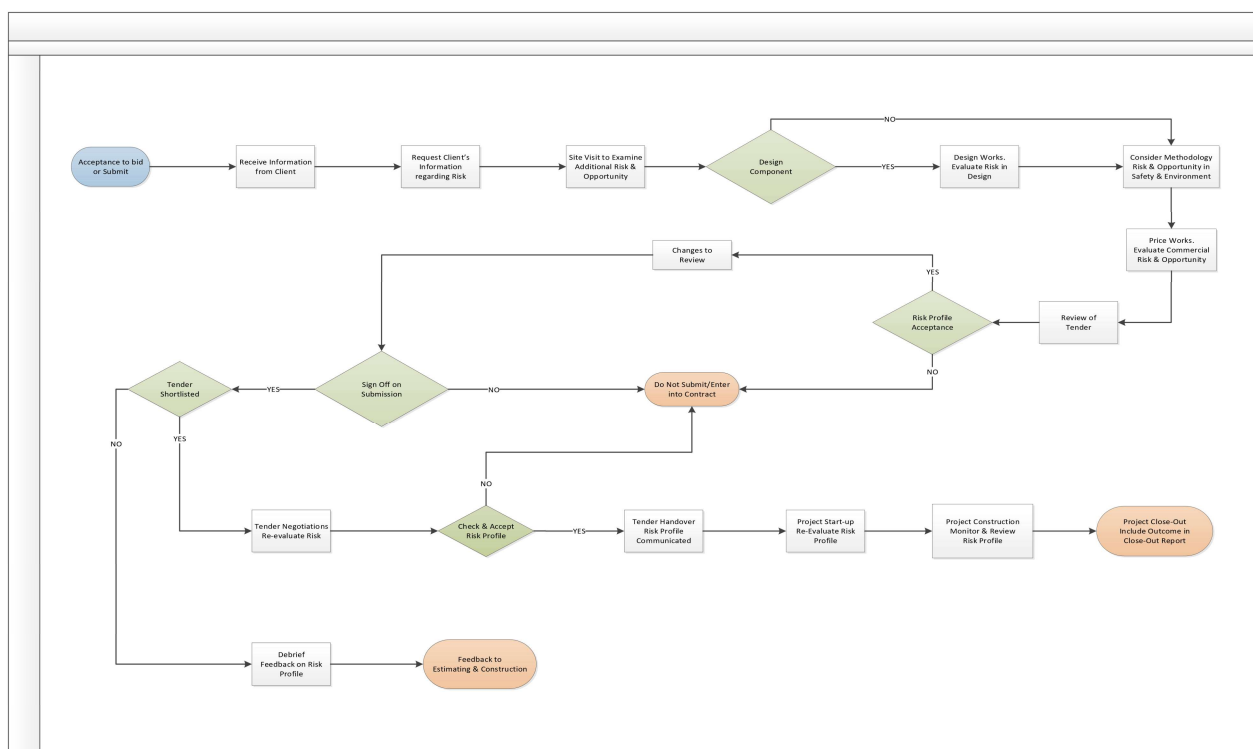
The term "reasonably practicable" has a particular meaning under the OHS legislation. It means practicable having regard to:

- the likelihood of a hazard or risk occurring (i.e. the probability of a person being exposed to harm);
- the degree of harm that would result if the hazard or risk occurred (i.e. the potential seriousness of injury or harm);
- what the person concerned knows, or ought to reasonably know, about the hazard or risk and any ways of eliminating or reducing that hazard or risk;
- the availability and suitability of ways to eliminate or reduce the hazard or risk; and
- the cost of eliminating or reducing the hazard or risk.

The risk control process must be carried out in consultation with the relevant health and safety representatives and workers.



16. Appendix 1: Risk Management Process Map



17. Appendix 2: Risk Matrix¹⁴

Step 1 – Identification

What is a risk?

Risk is a threat, not a weakness or current problem. Risk is an undesirable event that, if it occurs, will have an adverse effect on people's health, the environment, the quality of products, schedule, costs or performance. Consider if there are any existing regulations, advisory standards, industry codes, BMD documents, guideline materials that are relevant to the hazard that you have identified, and if this is the case use them to assess the risk and decide on the control measures.

What is an opportunity?

Opportunity is a benefit or saving. Opportunity could be a pro-active strategy or innovation which, if implemented, leads to improved health of workers, condition of environment, quality of products, reduction in project cost, schedule or to improved performance.

Step 2 – Assessment of Impact

		Consequence				
		Negligible (1)	Minor (2)	Moderate (3)	Major (4)	Substantial (5)
Risk	Cost (Project <\$75M)	Additional cost to project \$0 - \$10k	Additional cost to project \$10k - \$50k	Additional cost to project \$50k - \$250k	Additional cost to project \$250k-\$500k	Additional cost to project >\$500k
	Cost (Project >\$75M)	Additional cost to project \$0 - \$10k	Additional cost to project \$10k - \$100k	Additional cost to project \$100k - \$500k	Additional cost to project \$500k-\$1M	Additional cost to project >\$1M
	Time	Minimal or no impact to schedule; 0 - 2 days slip	Extra resources / replanning required to meet date; 2 - 7 days slip	Moderate slip in key milestone; 1 - 2 weeks slip	Major slip in key milestone or critical path; 2 - 4 weeks slip	Cannot achieve major program milestone; > 1-month slip
	Safety	Slight Injury; First Aid Injury (Class 3)	Minor Injury; MTI (Class 3)	Lost Time Injury; (Class 2)	Permanent Injury (Class 1)	Fatal Accident (Class 1)
	Quality	Negligible reduction in product quality; nil reduction in service life	Minor quality issue raising a Non-conformance (NCR) to accept as is	Moderate quality issue raising a Non-conformance (NCR) with some re-work	Project team receives poor reputation for quality works. Some re-work	Poor final product with substantial re-work required. Reduced service life
	Environment	Short term damage	Limited but medium-term damage	Major but recoverable ecological damage	Heavy ecological damage; costly restoration	Permanent, widespread ecological damage
	Stakeholder	Minor stakeholder dissatisfaction	Major dissatisfaction amongst a minority stakeholder	Key stakeholders are dissatisfied and threaten to disrupt works	Multiple stakeholders publicly denounce the project and prevent progress	Stakeholders initiate legal proceedings

¹⁴ OFSC Audit Criteria WH12.1

Opportunity		Consequence				
		Negligible (1)	Minor (2)	Moderate (3)	Major (4)	Substantial (5)
	Cost (Project <\$75M)	Saving to project \$0 - \$10k	Saving to project \$10k - \$50k	Saving to project \$50k - \$250k	Saving to project \$250k-\$500k	Saving to project >\$500k
	Cost (Project >\$75M)	Saving to project \$0 - \$10k	Saving to project \$10k - \$100k	Saving to project \$100k - \$500k	Saving to project \$500k-\$1M	Saving to project >\$1M
	Time	Minimal or no impact to schedule; 0 - 2 days saved	2 - 7 days saving to critical path	Moderate improvement in key milestone; 1 - 2 weeks saving	Major improvement in key milestone; 2 - 4 weeks saving	> 1 month saving to key milestone or critical path
	Safety	Slight or First Aid Injury prevented (Class 3)	Minor or Medical Treated Injury prevented (Class 3)	Lost Time Injury prevented (Class 2)	Permanent Injury Prevented (Class 1)	Fatal Accident Prevented (Class 1)
	Quality	Minimal quality issues encountered, resulting in time and cost saving, as well as Project flow	Quality issues causes no interruption to works	All works completed right the first time, resulting in no-rework	Outstanding quality of works resulting in Project being nominated for Quality Awards	Outstanding quality of works resulting in Project receiving Ministerial Recognition
	Environment	Short term enhancement	Limited but medium-term enhancement	Medium to long term enhancement	Long term and important enhancement	Permanent, widespread ecological enhancement
	Stakeholder	Community feedback neutral	Community queries about the Project	Community Project acceptance	Community support and willingness to be involved with the Project	Positive form of feedback and Ministerial praise Full community involvement
Probability						
		Rare (1)	Unlikely (2)	Possible (3)	Likely (4)	Almost Certain (5)
		Can be expected to occur in short duration and exceptional circumstances (0-10% chance)	Can be expected to occur in moderate duration and infrequently (10-25% chance)	Can be expected to occur in moderate duration and occasionally (25-50% chance)	Can be expected to occur for long duration and quite commonly occur (50-75% chance)	Is expected to very likely occur and for long durations (75-99% chance)

Step 3 – Prioritisation

Probability	Consequence				
	Negligible (1)	Minor (2)	Moderate (3)	Major (4)	Substantial (5)
Rare (1)	1 (L)	2 (L)	3 (L)	4 (L)	5 (M)
Unlikely (2)	2 (L)	4 (L)	6 (M)	8 (M)	10 (H)
Possible (3)	3 (L)	6 (M)	9 (M)	12 (H)	15 (H)
Likely (4)	4 (L)	8 (M)	12 (H)	16 (E)	20 (E)
Almost Certain (5)	5 (M)	10 (H)	15 (H)	20 (E)	25 (E)
Extreme	Further planning and notification to the next level of management is required to analyse control measure(s) and reduce this risk score. Work associated around this risk can <u>only</u> proceed with written authorisation at a General Manager level. (refer sect. 10.2 Risk Standard)				
High	Work can only proceed with written approval & reviewed by the Project Manager. (refer sect. 10.4 Risk Standard)				
Moderate	Managed by specific monitoring or response procedures.				
Low	Manage by routine procedure, no formal approval required.				

Step 4 – Management

Risk Score	Risk Rating	Action Needed
16-25	Extreme	Further planning and notification to the next level of management is required to analyse control measure and reduce this risk score. Work associated around this risk can <u>only</u> proceed with written authorisation at a General Manager Level. (refer to Section 11.2 risk rating)
10-15	High	Work can only proceed with written approval & review by the Project Manager. (refer to Section 10.2 risk rating)
5-9	Moderate	Managed by specific monitoring or response procedures.
1-4	Low	Manage by routine procedures, no formal approval required.

Opportunity Score	Opportunity Rating	Action Needed
16 – 25	Extreme	Capitalise on the opportunity and identify with the next level of Management. In addition, Management to identify the opportunity with the Business System Manager to analyse suitability in alternatives applications.
10 – 15	High	Capitalise on the opportunity and identify with the next level of Management.
5 – 9	Moderate	Identify with the next level of management, to analyse whether the score can be raised with more resources.
1 – 4	Low	Consider whether the opportunity is worth pursuing.

18. Appendix 3: Group Risk Register Rollup and Feedback Process

