

EARTHWORKS RISK MANAGEMENT PROCEDURE

SCOPE

This Procedure relates to all activities under the management and control of Monash University in Australia and applies to affected staff, students, contractors and visitors.

PROCEDURE STATEMENT

The purpose of this Procedure is to provide an overarching framework for the effective management of Occupational Health and Safety (OHS) associated with underground disturbance and the corresponding risks at Monash University.

1. Abbreviations

BPD	Buildings and Property Division
OHS	Occupational Health and Safety
OH&S	Monash Occupational Health and Safety

2. Activities involving Earthworks

2.1 Scoping

It is the responsibility of the Operational Manager to ensure that when scoping work to be undertaken, to the extent that it is practicable, it is determined whether or not the activities will include earthworks.

2.2 Risk Assessment

2.2.1 All hazards associated with earthworks must be identified and assessed. Risks that may arise include:

- Excavating a substantial volume of soil such that the banks could collapse;
- Create a risk of falling from heights (for risk management requirements see Working From Heights Risk Management Procedure);
- Damaging services that could directly cause harm (e.g. high voltage electrical cabling, gas piping);
- Disrupting services that could compromise existing safety systems (e.g. damaging fire monitoring services, data cables, water supplies).

2.2.2 Operational managers must ensure that any risks arising from earthworks are identified, so far as reasonable, before work commences. If there is an element of doubt, Operational Managers must consult with the Authorised Person.

2.2.3 Any Operational Manager directing work involving risks arising from earthworks must be approved to do so using the [OHS Prescribed Activities Approval Form](#).

2.2.4 Risk assessments must be conducted in consultation with the party who will perform the works in accordance with the [OHS Risk Management Procedure](#). The risk assessment must be documented and should include consideration and adequate control of risks. A template risk assessment is available in SARAH.

3. Earthworks Permit-to-work

3.1 Any work conducted under the management control of Monash University that may involve earthworks must have a permit-to-work before commencement unless that work involves:

3.1.1 Minor soil disturbance using only hand tools to a depth of less than 60 cm from ground level at the time services may previously have been installed. Where this ground level cannot be clearly identified, works should not be considered as minor soil disturbance

3.2 Permits are requested through Buildings and Property Division.

3.3 Permit-to-work requests must be assigned to an Approved Person in accordance with the requirements of the [OHS Prescribed Activities and Permit-to-work Procedure](#). The Approved Person is responsible for ensuring that:

3.3.1 The party conducting the work has demonstrated suitable competency to perform work of this nature;

3.3.2 Hazards associated with the work appear to have been identified and risks assessed;

3.3.3 The intended work methods appear to be safe and without risk to health; and

3.3.4 A Permit-to-work is in place before any works commence.

3.4 Conditions on a Permit-to-work

The Permit Holder must ensure that:

3.4.1 Existing underground services have been located, so far as practicable, including the use of:

- a) Plans and drawings;
- b) Scanning technology;
- c) Exploratory excavation works; and/or
- d) Signage indicating presence of services.

3.4.2 Powered plant and equipment is used operated in such a fashion as to minimise the potential to damage to any service accidentally located during earthworks.

3.4.3 The edge or bank of any removed soil has been secured to prevent hazardous collapse and that there is a safe means of entry and exit to the workarea.

3.4.4 For excavations, completion of the WorkSafe *'Notice of intention to perform construction excavation work'* and evidence of approval from WorkSafe to commence.

3.4.5 The work area has been isolated, so far as practicable, from other person;

3.4.6 Emergency procedures are in place for the duration of works.

3.5 Monitoring

3.5.1 The Permit Holder must ensure that all controls identified through risk management are in place.

3.5.2 The Approved Person must conduct monitoring to ensure that, as far as practicable, controls identified through risk management are in place.

3.5.3 The Authorised Person, The Manager, OH&S, or their representative, may review the conduct of any work activities relating to earthworks entry without notice.

4. Responsibility for Implementation

4.1 It is the responsibility of the Manager, OH&S to ensure that this procedure is implemented.

5. Records

5.1 For OHS Records document retention please refer to:

[OHS Records Management Procedure](#)

DEFINITIONS

A comprehensive list of definitions is provided in the [Definitions tool](#). Definitions specific to this procedure are provided below.

Key word	Definition
Authorised Person	A person who is authorised on behalf of the Manager, OH&S, to approve and issue a certificate in relation to a specific type of prescribed activity.
Approved Person	A person who has been approved by an authorised person to supervise activities involving prescribed activities.
Contractor	Any person or business engaged by Monash University who enters into a contractual arrangement to conduct work for Monash University, but whose primary employer is not Monash University.
Contractor Management	The process of managing work that is being/has been outsourced by Monash University. In the context of this procedure 'contractor management' relates to OHS.
Earthworks	Where there is any potential to disturb underground services either as a result of earth removal (excavation, trenching, etc.) or through the introduction of equipment underground (staking, aerating, monitoring, etc.).
Excavations	Any earthworks that involves the formation of: <ul style="list-style-type: none"> • a trench (if the excavated depth is more than 1.5 metres) • a shaft (if the excavated depth is more than two metres) • a tunnel (if the construction excavation would be deep enough for a person to enter or there is a health and safety risk to anyone from the excavation)
Ground Level	The present height of the surface of the earth.
Permit-to-work Certificate	Documented evidence of the issuing of a permit-to-work.
Permit Holder	A person who is authorised by both an approved person and the authorised person to supervise activities involving prescribed activities as documented in a permit-to-work certificate.
Sub-Contractor	Any person engaged by the principal contractor to assist with the contracted works. Any person subsequently engaged by these persons to assist is also deemed to be a sub-contractor.
Suitably Qualified Person	Person who can demonstrate that, through their experience, knowledge, qualifications and/or skills, they are competent to perform underground disturbance and determine safe methods of controlling the risk of fire.

GOVERNANCE

Parent policy	OHS&W Policy
Supporting schedules	N/A
Associated procedures	<p>Australian and International Standards</p> <p>ISO 45001:2018 Occupational Health and Safety Management Systems</p> <p>WorkSafe Guidance documents</p> <p>Compliance Code 'Confined Spaces', WorkSafe Victoria September 2008</p> <p>Monash University OHS documents</p> <p>OHS Prescribed Activities and Permit-to-work Procedure</p> <p>OHS Records Management Procedure</p>

	OHS Risk Management Procedure
Legislation mandating compliance	Occupational Health and Safety Act (2004), Victoria Occupational Health and Safety Regulations (2017) Victoria
Category	Operational
Endorsement	Monash University OHS Committee 18 March 2020
Approval	Office of the Chief Operating Officer & Senior Vice-President (a delegate of the President & Vice-Chancellor) 2 April 2020
Procedure owner	Health, Safety and Wellbeing Manager
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Content enquiries	ohshelpline@monash.edu

DOCUMENT HISTORY

Version	Date Approved	Changes made to document
1	April 2020	Earthworks Risk Management Procedure, v1
1.1	July 2021	<ol style="list-style-type: none"> 1. Updated certification logo in footer to ISO 45001 2. Updated the Standard to ISO 45001 under "Associated procedures" in the Governance table 3. Updated OHS Policy under 'Parent Policy' to OHS&W Policy