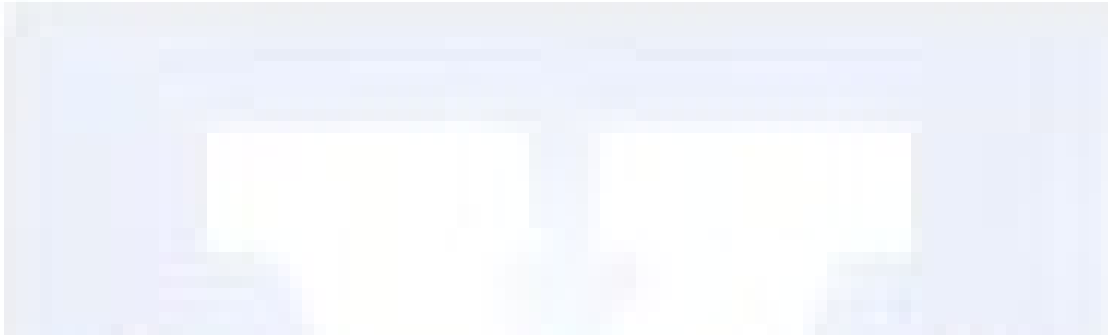




VULCAN MINE



Standard Operating Procedure Concealed Services





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1. PURPOSE

The purpose of this procedure is to describe the requirements and to effectively manage the hazards and risks associated with the effects of cutting, drilling or excavating near concealed services at the Vulcan Mine.

This procedure has been developed to ensure compliance with section 88 of the CSMHR.

2. SCOPE

This procedure is applicable to all persons at the Vulcan Mine including employees, contractors, and visitors.

The controls within this procedure are mandatory.

3. DEFINITIONS

Authorised Person	A person who has the required competencies and who has been appointed by the Site Senior Executive to carry out a designated scope of duties.
CMSHA	Queensland Coal Mining Safety and Health Act (1999).
CSMHR	Queensland Coal Mining Safety and Health Regulation (2017).
CMW	Coal Mine Worker.
Competent Person	Competence for a task at a coal mine is the demonstrated skill and knowledge required to carry out the task to a standard necessary for the safety and health of persons. The CMW must be assessed as competent and authorised by the SSE or SSE delegate to perform the task.
DRNME	Department of Natural Resources, Mines and Energy.
EEM	Electrical Engineering Manager.
JHA	Job Hazard Analysis.
MOP	Mine Operating Procedure.
EOM	Original Equipment Manufacturer.
SHMS	Safety and Health Management System.
SSE	Site Senior Executive.
Take 5	Personal Risk Assessment.
TSS	Technical Services Superintendent.

4. PROCEDURE

4.1. Designated Areas

The TSS shall identify designated areas on the Mine Plan where VUL-FRM-19-12-Penetration Excavation Permit shall be completed for any excavation activities due to buried concealed services or hazards. At a minimum the following areas shall be deemed “designated areas”:

- mine infrastructure areas;
- within 20 metres of known power lines;
- within 10 metres of any other known concealed service; and
- within 10 metres of mining tenure boundary.



4.2. Planning

As a part of the initial assessment, the personnel undertaking the work shall ensure the risk of any uncontrolled release of energies be minimised. Consideration shall be given to, but not limited to the following:

- viewing building and structure plans and drawings;
- viewing plan of surface services;
- viewing electrical wiring plans; and
- viewing OEM drawings and plans.

Persons wishing to cut or drill a building or structure or excavate in a designated area shall contact the TSS and complete VUL-FRM-19-12-Penetration Excavation Permit and a JHA. The TSS shall be consulted to determine the location of concealed services and have the location clearly marked. Site drawings and Dial Before You Dig information shall be obtained to identify potential underground services in the work area prior to commencement. Where electrical services have been identified as being potentially present, the permit process shall require consultation with the EEM.

The supervisor responsible for the work to be carried out, shall provide the appropriate equipment fit for purpose, prior to the commencement of any excavating, drilling, or cutting near a concealed service.

The supervisor responsible for the work is responsible to ensure VUL-FRM-19-12-Penetration Excavation Permit process has been completed prior to commencement of the task.

4.3. Located Concealed Services

Concealed services include, but are not limited to:

- pipes (water, sewage, drainage, gas, etc.); and
- conduits and cables (electrical and communications) whether in-service (live) or out of service that could be in or near an area of excavation / trenching or within a building or structure.

The location of all buried cables, pipelines and other services shall be identified by a suitable marker indicating the nature of the buried service adjacent to the buried service. Where applicable, service locators/potholing or hand digging at suitable intervals shall be used to determine the location of buried services.

The location of any buried service shall be marked on a plan available for inspection at any time through the technical services department. This plan shall be kept up to date and modified as required.

4.4. Cutting or Drilling

Persons wishing to cut or drill a building or structure shall contact an appointed electrical CMW and submit VUL-FRM-19-12-Penetration Excavation Permit. Details of the planned work are to be entered into the permit.

All energy sources shall be located, marked, isolated, tested, proved de-energised and tagged as per the VUL-SOP-078-Isolation and Tagging.

4.5. Excavation

Persons wishing to excavate in a designated area shall contact the TSS and submit a VUL-FRM-19-12-Penetration Excavation Permit. Details of the planned work are to be entered into the permit.

All energy sources shall be located, marked, isolated, tested, proved de-energised and tagged as per the VUL-SOP-078-Isolation and Tagging.

4.6. Installation of New Services

Where new concealed services are installed or where the path of a concealed service is modified, measures must be implemented to provide future warning to those who may cut, drill or excavate in the area. As far as is practicable, all concealed services must be identified by marker tape colours or labels applicable to the type of service.

The location of the services shall be recorded within the Statutory Mine Plans.

New services shall be entrenched in bedding sand and topped with clean spoil free of stones and other sharp objects.



4.7. Completion of Task

On completion of the work, the permit issuer shall be notified in writing, with a copy to the TSS of any changes in the location of cables, pipelines, or other services. Changes must be clearly documented and included by the technical services department in the statutory mine plans.

5. ROLES AND RESPONSIBILITIES

SSE	Shall review and approve this procedure.
HST Superintendent	Shall ensure that all provisions of this procedure are implemented, and that compliance is achieved.
Managers/Superintendents	Shall be responsible for their area of operations and the implementation and application of this procedure; Provide adequate training, information, structure, and supervision to ensure that this procedure is implemented; Carry-out a periodic review of activities to ensure the appropriate application and understanding of this procedure; and Ensure immediate and appropriate steps are taken to investigate and rectify any risks to health and safety arising from these activities.
Supervisors	Ensure all CMWs are familiar with, have access to and comply with the requirements set out in this procedure.
All CMWs (including visitors and contactor)	Shall comply with the requirements of this procedure.

6. REFERENCES

- Coal Mining Safety and Health Act 1999 (Qld)
- Coal Mining Safety and Health Regulation 2017 (Qld)
- Significant Incident 58 Penetration into concealed services - buildings and structures
- VUL-FRM-19-12-Penetration Excavation Permit
- VUL-SOP-078-Isolation and Tagging

7. REVIEW

This document shall be reviewed at a minimum two yearly, or as follows:

- when there is a change of method and/or technology and/or legal or other requirement that may affect the accuracy of this document;
- when operational changes occur that effect the currency of the document;
- when there has been a significant event to which this document was relevant; and
- as a result of relevant audit findings.

8. DOCUMENT CONTROL

Version	Date	Description	Document Controller
01	21/05/2020	Initial draft	Rachael Dacker
02	26/06/2020	Risk workshop	Shane Johnson
03	13/05/2021	Review and formatting	Nicole Davey
04	1/09/2021	Review and formatting	Rachael Dacker
05	31/03/2023	Procedure review and update	Allira Spencer