MPQBL05

Charge blast holes to specification

Overview

What is this standard about?

This standard specifies the skills, knowledge and understanding required to demonstrate competence to charge blast holes to specification. The standard includes checking blasting areas prior to charging to ensure the parameters are in line with and conform to the blast specifications, preparing the explosive materials and charging blast holes with the explosive materials. The standard also covers disposing of surplus packaging and removing surplus explosive material from the blasting area.

Who is this standard for?

This standard is specifically designed for those with responsibility for charging blast holes with explosive materials, normally referred to as shotfirers.

Performance criteria

You must be able to:

1. carry out the work activity according to the **approved policies, procedures and practices** for the work activity and blasting location
2. obtain and check information on the blasting area, design and the **explosive materials** to be used
3. identify hazards and risks arising from adverse environmental conditions and take precautionary action
4. check the position, condition and dimensions of each blast hole, and the surrounding area
5. identify, report and record all checks and any aspects that require amendment to the blast specification
6. handle **explosive materials** in conformity with manufacturers' recommendations
7. establish precautions to protect **explosive materials** and personnel
8. identify, select and inspect the tools and equipment for the charging operations
9. prepare **explosive materials** in accordance with the blasting specification
10. check the **explosive materials** to ensure they conform in quantity and type to the blasting specification requirements
11. check the **explosive materials** are in good condition
12. charge blast holes in accordance with the blasting specification
13. position detonators and primers in conformity with the blasting specification
14. use **non-explosive materials** as specified for the blast
15. identify, record and report variations between the blasting specification and the actual conditions at the time of charging
16. check, remove and dispose of packaging

Knowledge and understanding

You need to know and understand:

1. the **approved policies, procedures and practices** as appropriate to the work activity and blasting location
2. the hazards and risks associated with the **explosive materials** and the work activity, how they affect yourself, others and the work environment, and how they are controlled
3. the dangers from and the effects of adverse environmental and site conditions on the **explosive materials**, system performance and premature ignition
4. the personal responsibilities of you and others involved in the blasting process under health and safety and blasting statutory regulations for the work environment
5. the sources of information in relation to the **explosive materials** and the blast requirements, and how to interpret them
6. the organisational communications, recording and reporting arrangements relating to the work activity
7. the principles and practices of ensuring blast hole suitability
8. blast hole measuring and inspection equipment and techniques
9. the types and range of **explosive materials** for the work activity, their limitations and susceptibility to accidental or premature detonation
10. the characteristics of detonation devices and primers for the work activity
11. manufacturers' recommendations and site rules for handling **explosive materials**
12. the range of tools and equipment for handling explosive materials and charging blast holes, why they are used, and how to inspect, use and store them after use
13. the effects of water in blast holes, how this imposes limitations on the choice of **explosive materials** and blast initiation systems, and actions to deal with wet blast holes
14. the causes of blockages in blast holes, and how to take remedial action
15. the tools, procedures and methods for clearing overfilled or incorrectly charged blast holes
16. the regulations, methods and practices for packaging, labelling, recording and removal of **explosive materials** to storage or disposal site
17. the limits of your own role and responsibilities

Scope/range

1. **explosive materials**: explosive articles or substances, and any blasting intermediaries, or as defined in current legislation, as appropriate to the work activity
2. **approved policies, procedures and practices**: legislative, organisational, operational, accident or emergency, health and safety, first aid, and environmental as appropriate to the blasting area and work activity
3. **non-explosive materials**: stemming, sleeves and other materials required to support charging or blasting as appropriate to the work activity and the work environment

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Developed by	MPQC
Version Number	1
Date Approved	December 2015
Indicative Review Date	January 2021
Validity	Current
Status	Original
Originating Organisation	MPQC
Original URN	MPQBL05
Relevant Occupations	Shotfirer
Suite	Blasting Operations
Keywords	explosive; quarry; detonators; store; receive; issue; security; quarrying; blasting