RIISAM301F

Test Operational Functions of Vehicles and Equipment

Learner Guide Instructions

Who is this document for?

The learner.

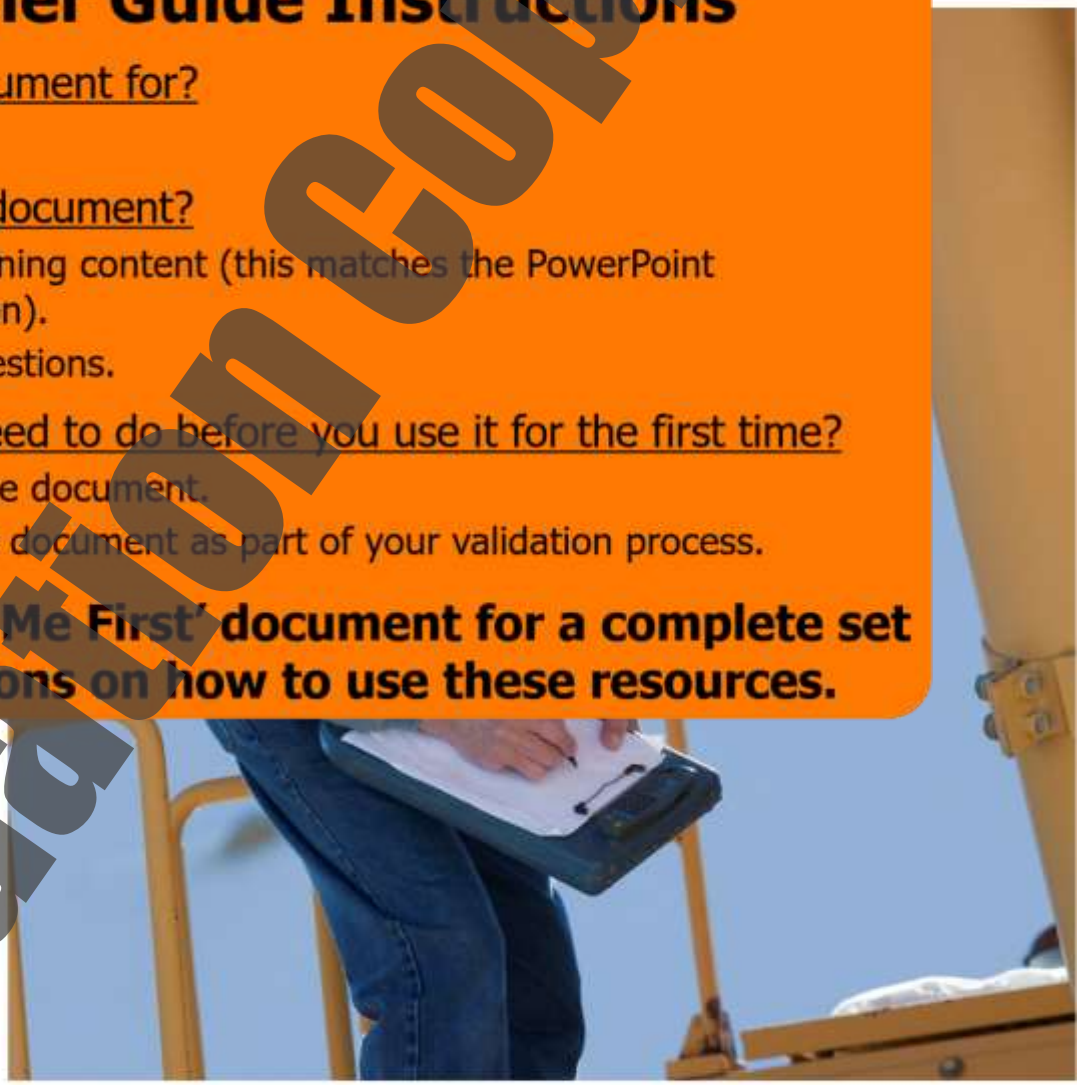
What is in this document?

- Course training content (this matches the PowerPoint Presentation).
- Review questions.

What do you need to do before you use it for the first time?

1. Rebrand the document.
2. Review the document as part of your validation process.

See the 'Read Me First' document for a complete set of instructions on how to use these resources.



LEARNER GUIDE

RIISAM301F Test Operational Functions of Vehicles and Equipment

Learner Name:	
Learner ID:	
Learner Contact Number:	
Learner Email Address:	
Date Training Commenced:	

This Book Contains:

☐ Course Information.
☐ Review Questions.

Table of Contents

1.1 Introduction

This course is based on the unit of competency **RIISAM301F Test Operational Functions of Vehicles and Equipment**.

You will learn about:

- Planning and preparing for work.
- Testing vehicles and equipment.
- Completing the testing sequence.

1.1.1 Mine Vehicles and Equipment

All vehicles involved in the production and support roles on mine sites require testing of operational function. This covers a broad range of vehicles from four-wheel drives through to bucket wheel excavators.

You may also be required to test equipment including gas sampling equipment and hydraulic and pneumatic testing equipment.

Due to the diverse nature of these machines it is important that you are able to identify the operations, characteristics, capabilities and limitations of the vehicles and equipment you are working on. You should refer to the manufacturer's specification as well as any relevant site documents.

You must make sure you have appropriate training and licensing for any vehicle or equipment you are required to test before operating it.

Review Questions

1.	What four (4) things must you be able to identify on the vehicles and equipment you are working on?	☐

1.

2.

3.

4.

1.2 Work Safely

You must follow all safety rules and instructions when performing any work. If you are not sure about what you should do, ask your boss or supervisor. They will tell you what you need to do and how to do it in a safe way.

1.2.1 Health and Safety Rules

Every workplace has to follow laws and rules to keep everyone safe. There are 4 main types:

Laws	Description
Acts	Laws to protect the health, safety and welfare of people at work.
Regulations	Gives more details or information on particular parts of the Act.
Codes of Practice	Are practical instructions on how to meet the terms of the Law.
Australian Standards	Give you the minimum levels of performance or quality for a hazard, work process or product.

Some states use OHS laws, and other states use WHS laws. They both talk about the same thing but use different words or names for people. If you have any questions about safety rules you should talk to your boss or supervisor.

1.2.2 Operations Documentation

Before starting your work you need to make sure you have access to all operations documentation for the job. This will help you to do your work in the safest way and make sure all work is compliant.

Operations documentation includes:

- **Site details** – The information and safety requirements of the worksite environment, including the site layout and various landmarks.
- **Hazard details** – Any known hazards in the area that you should be aware of. This could also include instructions on how to handle dangerous or hazardous materials.
- **Task details** – Instructions of what the work is or what you will be doing (this can include diagrams or plans). Also, instructions on how to safely do the job.
- **Faulty equipment procedures** – Isolation procedures to follow or forms to fill out.
- **Signage** – Site signage tells you what equipment you need to have, or areas that are not safe to be in.
- **Emergency procedures** – Specific instructions on what to do in emergency situations, for example where evacuation or first aid is needed.
- **Equipment and work instructions** – Details of how to operate plant and equipment and the sequence of work to be done.

1.2.3 Applying Requirements and Procedures

As these requirements can vary from state to state, company to company, and job to job, you are required to familiarise yourself with the documentation that applies to your work area and situation.

Working safely and effectively is your responsibility and ensuring those around you are aware of the requirements is another way of increasing your own safety level.

The procedures for your work should be applied from the planning level all the way through to the completion of the work.

In a hazardous environment such as a mine, you should also ensure:

- All materials, tools and equipment are properly maintained.
- All emergency access points are kept clear.
- Procedures and equipment are known and usable.
- Regular familiarisation is carried out for contingencies and emergencies.

To apply any of the requirements from any level (Acts, Regulations etc.) you must understand them. You need to be able to apply what is written relevantly to your work.

If you have any problems, difficulty or issues doing this, make sure you ask for assistance from appropriate personnel.

1.2.4 How to Keep Everyone Safe

WHS law says that all companies and workers need to keep themselves and other people safe while they work. This is called a duty of care.

To keep yourself and other workers safe you need to:

- Follow your instructions.
- Follow all workplace rules.
- Make sure all equipment is safe to use.

All personnel have a legal responsibility under duty of care to do everything reasonably practicable to protect others from harm by complying with safe work practices.

1.2.5 Worksite Communications

It is important to coordinate your activities with other workers when you are planning for and carrying out the work to make sure everyone knows:

- The work being completed.
- How, when and where you will be operating.
- What they need to do.

All workers on site must understand their own role and the roles of others before starting work. It helps to make sure work is done safely and efficiently.

You will also need to alert personnel to any hazards you notice during your work activities, including changing work environments.

People you may need to communicate and coordinate with on site include:

- Other mobile plant operators.
- Processing plant operators.
- Maintenance workers.
- Water truck/cart operators.
- Service vehicle operators.
- Crane and float operators.
- Contractors.
- Inspectors, both internal and external, including WHS, environmental and quality assurance officers.
- Supervisors and team leaders.
- Site visitors.
- Control centres.

It is important everyone on site is coordinated in the way they work and communicate as this minimises the chance of unsafe work behaviours due to misunderstanding.

1.2.5.1 Communicating with Others

When communicating with others on site, make sure that you:

- Speak clearly and unambiguously – stick to the important details, don't waffle.
- Give instructions or directions so that they are easily understood.
- Provide complex information or explain issues to your listener in a way that ensures they understand. You could try breaking down the details, simplifying the information or referring to related examples.
- Listen carefully, answer questions and provide clarification as necessary. You can also ask questions to clarify understanding.
- Use all communications equipment appropriately, following the required procedures and protocols.

Communication equipment you might need to use includes:

- Two-way radios.
- Telephones.
- Written reports.
- Emails.
- Text messages.
- Other site-specific systems.

Make sure that you follow your site procedures and protocols for communicating on site. This may include using the correct communication processes for communicating work activities or exclusion zones.

Review Questions

2.	List three (3) things that may be included in 'operations documentation'.	☐

1.

2.

3.

3.	How can you make sure you meet your Duty of Care requirements to keep yourself and other workers safe?	☐

4.	Why is it important to coordinate with other personnel on site?	☐

1.3 The Mine Safety Management Plan

The Mine Safety Management Plan (MSMP) is a requirement for all mines. Regulations specifically state what must and should be in the MSMP. The MSMP details all the factors that should improve safety and reduce risk for the mine operations.

1.3.1 Provisions of the Mine Safety Management Plan

All personnel and visitors on the mine site should be aware of the provisions of the MSMP.

The MSMP must contain:

- The WHS Policy for the site and its objectives.
- Arrangements for informing and training persons on WHS matters.
- Arrangements for supervision.
- Arrangements for communication.
- The management structure.
- How risks are to be managed.
- Arrangements for the safe use of plant and electricity.
- The contractor management plan.
- The emergency plans.

The MSMP must provide for:

- Exchanging information between shifts regarding hazards.
- Systems to communicate in the event of imminent risk.

In addition, underground mines will require:

- A system to record:
  - The name of persons underground.
  - Their probable location.
- A voice communication system from surface to critical parts underground.

The MSMP should provide detail on:

- The site safety rules and arrangements.
- How every person that comes to the site will be informed of these rules.
- Arrangements for the control of documents and keeping of records.

The MSMP should state what arrangements are in place to:

- Use, distribute and control documents.
- Instruct persons in the use, distribution and control of documents.

The MSMP is to contain summaries of and references to each of the following:

- Mine health and safety regulations.
- Any WHS systems, policies, programs, plans and procedures.
- Any codes, standards or guidelines that apply.

1.3.2 Site Emergency Plans

Site emergency plans will cover a variety of scenarios and hazards and detail:

- Action to be taken.
- Location of emergency equipment.
- Location of emergency access points.
- Evacuation plans and procedures.
- Emergency notification contacts.
- Communication methods and protocols.
- Immediate survival actions and precautions.

Emergency procedures will vary depending upon the worksite. These procedures could include:

- Emergency shutdown.
- Evacuation.
- First aid.
- Fire fighting.

1.3.2.1 Emergency Shutdown of Equipment

If there is a fire, emergency or accident you might need to use the emergency stop on the equipment you are testing. This will turn the equipment off immediately. You can also use the emergency stop if the equipment stops working properly or you lose control of the equipment.

1.3.2.2 Evacuation

Things to remember are:

1. Keep calm.
2. Move away from the danger to a designated evacuation point, sometimes called an emergency assembly area.
3. Do not let other people into the area.
4. Call emergency services in accordance with workplace procedures and policies.

1.3.2.3 First Aid

First Aid is the quick care given to an injured or ill person.

Every site will have a First Aid Officer. If somebody needs first aid you must tell your supervisor or First Aid Officer.

Do not try to give first aid if you have not been trained.

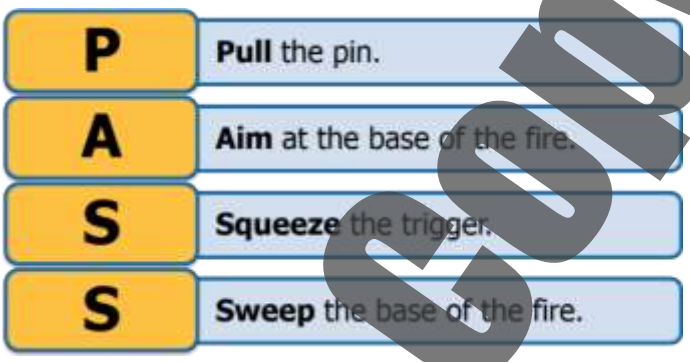
1.3.2.4 Fire Fighting Equipment

Fire fighting equipment on site could be anything from small fire extinguishers through to large water cannons. Different fire fighting equipment should be used for different types of fire. Always check the equipment for information on what type of fire it can be used on.

Steps for using a fire extinguisher:

1. Evacuate the area.
2. Isolate the area.
3. Call emergency services or other designated on site procedure.
4. If it is safe to do so, use an extinguisher to attempt to control the fire using the **PASS** system.

The **PASS** system:



Contact your site emergency management team as soon as possible and call the fire brigade on 000.

1.3.3 Geological and Survey Data

Geological and survey data is used to guide you through a job. It tells you what the area is like, what things you will need to think about and where you will find hazardous formations.

Geological data gives you information about:

- Rock or material types and characteristics.
- Wet and dry areas.
- Water tables or other sources of water.
- Broken ground, faults or joints.
- Compaction levels.

Survey data can be used to mark out:

- Work circuits.
- Pick up areas.
- Dump areas.
- Spill zones.
- Routes or traffic ways.

All of this information will help you to decide on where and how you should travel with equipment and areas to avoid.

Review Questions

5.	What are four (4) things that must be contained in a Mine Safety Management Plan?	☐

1.

2.

3.

4.

6.	What two (2) communication requirements are specific to underground mines?	☐

1.

2.