Rail Drills

Document no.	Work description
SMS-06-SW-0480	Use of rail drills
	Scope Applies to all types of rail drill
Review date 11/03/10	**References** OHS Reg 2001 Chapter 5 SMS-06-PR-0225 Plant SMS-06-GD-0403 Plant Risk Assessment

Responsible supervisor *Insert name in BLOCK letters*	PPE and precautions	Competencies or qualifications	Licences or permits required
	• Safety glasses • Hearing protection – everyone must wear hearing protection within **5 metres** of the drill • Long sleeved shirt – Make sure you have no loose clothing that can be caught in the drill • Knee guards – you will need knee protection when kneeling on ballast • Safety boots	Trained and competent in the use of the specific rail drills. Backsafe instruction	N/A

Tools and equipment required

Rail drill

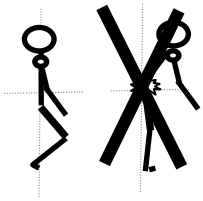
IF CONTROL MEASURES ARE NOT SUITABLE AND MAJOR CHANGES ARE NEEDED, CONDUCT A RISK ASSESSMENT AND DEVELOP NEW CONTROLS ACCORDING TO SMS-06-SR-1479 OHS RISK MANAGEMENT.

Warning
Don't smoke when using or fuelling the rail drill.

Site / job planning	• Place the first aid kit and fire fighting gear nearby. • Follow all worksite procedures, eg. induction, Pre-Work Brief. • Conduct your own hazard assessment – consider the job, the environment and the weather (eg. fire risks are higher where there is long grass or bushland, or in hot, dry or windy weather). • Clear the worksite in a 3 metre radius from the rail drill. • Keep fuels, people, site equipment and anything flammable well away. • Keep Material Safety Data Sheets (MSDS) for fuels and lubricants on site. • Special ventilation is needed in tunnels and confined spaces – poisonous Carbon Monoxide can build up if the correct precautions are not taken.

Refuelling	• Turn off the drill before adding fuel. • Have good ventilation when refuelling or mixing fuels. • NEVER start the drill if there is fuel spilt on it or if there is a leak in the fuel system. • If there is fuel on your clothes, change them before starting the drill. • Only use the correct fuel for the drill – it should be marked RAIL DRILL FUEL and kept in an open area away from possible sources of flames or sparks.

Pre-operational checks	• Check the condition of the cutter bit and drill. • Don't use if there is any damage. Replace the cutter bit or tag the drill and repair ASAP. • Check that the motor is switched off before changing the cutter bit or for any maintenance, including clearing the swarf away. • Check the cutter-retaining screws are secure. • Check there is enough coolant (water or other) for the job.

Setting up	• Check the immediate area is clear. • Use the correct manual handling techniques when lifting the drill. • Clamp the drill firmly to the head of the rail. • Get a firm foothold and make sure you're holding the drill correctly to stop it moving when you pull the starter cord.	 When lifting the drill, bend at the knees, with your elbows bent and back straight

Using the rail drill	• Before starting, make sure you understand what happens and the precautions to take when a drill bit becomes damaged or jams when still in the drill hole. Always: • check the Manufacturer's Instructions for the model you are using if you are not familiar with it – there may be safety critical differences to the one you are used to • start and stop the drill according to the Manufacturer's Instructions • start drilling gently – don't force or squeeze the drill into the rail • drill at full throttle • keep coolant (water or other) directed at the drill bit • remove the swarf with a brush • keep hands clear of the borer at all times • idle the machine when not drilling • wait for freshly cut metal to cool or use heavy-duty gloves to handle it.	

Care and storage	• Use the correct manual handling techniques when lifting the drill. • Always remove the drill bit after you've finished – store drill bits in a storage box in a dry location with a steady temperature, with a light coating of oil. • Do a visual inspection of the rail clamping device. • Don't use it if it's damaged. Replace it, don't try to repair it. • Store the rail drilling machine and fuel in an unrestricted space away from possible sources of flames or sparks. • Drain the fuel tank if the drill is to be stored for any long period.

Inspection and maintenance	• Conduct maintenance as per the Manufacturer's Specifications. • Get an authorised dealer to do any repairs or checks/alterations to the motor settings. • Maintain inspection and test records in accordance with SMS-16-SR-0057 Inspection and Testing and SMS-05-SR-0027 Records Management.

Additional controls