

Safe Work Method Statement

Job Task Summary:

Powered hand tools

This SWMS includes specific risks associated with angle grinders and demolition saws and general risks associated with other tools.

Can this involve High Risk Construction Work?

Where there is a risk of a person falling more than two metres?	No
At workplaces where there is any movement of powered mobile plant?	No
Involving demolition of an element of a structure that is load-bearing	No

Excludes: Chainsaws

Applicable to the following worker type: employee, contractor, volunteer

SWMS completed by: Tony Griffiths. Reviewed by Safety Team November 2021
Read in conjunction with other relevant [SWMS](#).

Site: All sites

Date: November 2021

PPC (Mandatory): DRA field clothing including DRA long sleeve shirt, non-synthetic trousers, safety boots or safety gumboots (AS 2210.1:2010 Operational Protective Footwear), non-synthetic layers or outer clothing for warmth (if required).

PPE (mandatory): Medium impact safety glasses (AS/NZS 1337.1:2010) unless grinding or cutting metal or use of high-speed tools when a high impact face shield and browguard (AS/NZS 1337.1:2010 Personal eye protection, Part 1: Eye and face protectors for occupational applications High Impact (V).) Helmet (AS/NZ 1801:1998

Safe Work Method Statement

Occupational Protective Helmets), hearing protection (AS/NZS 1270:2002: Acoustics – Hearing protectors), Safety shirt/vest (AS/NZS 4602.1:2011 Class D for daytime use)

PPE (Subject to relevant SWMS/Safety 5) Respiratory Protective Equipment [RPE] (AS/NZS 1716:2012) AS/NZS 1715:2009 Selection, Use and Maintenance of Respiratory Protective Devices. Gloves, heavy duty, non-slip,

Additional PPE for brush cutter use: Protective shin and knee guards, face shield or face screen worn over protective goggle or glasses

DRA Policies

1. DRA policy prohibits the cutting, sawing, grinding, drilling of silica containing materials including concrete and stone.
2. DRA will formally accredit members to operate certain types of powered hand tools including demolition saws.
3. DRA requires the on-site verification of competency of powered hand tools regardless of accreditation or qualification.
4. DRA mandates the use of genuine manufacturer's parts and maintenance or repair by authorised manufacturer's dealers or repair facilities.

Safe Work Method Statement

R1 Risk without controls

R2 Risk with controls

Procedural step(s)	Possible hazard(s)	R1	Safety control(s)	Person responsible	R2
Pre-start checks	Faulty or damaged tool		<p>Conduct checks in accordance with the operator's manual.</p> <p>Generally these will include: Inspect tools for any damage prior to each use. Check the handle and body casing of the tool for cracks or other damage. If the tool has auxiliary or double handles, check to see that they installed securely. Inspect cords for defects: check the power cord for cracking, fraying, and other signs of wear or faults in the cord insulation. Check for damaged switches and ones with faulty trigger locks. Inspect the electrical plug for cracks and for missing, loose or faulty prongs. If a tool is defective, remove it from service, and tag it clearly "Out of service for repair". Replace damaged equipment immediately – do not use defective tools "temporarily". Have tools repaired by a qualified person – do not attempt field repairs.</p> <p>Check equipment is fitted with a current electrical safety test tag (for 240V equipment)¹</p>	STL/ Safety Officer/ workers	
Before use	Electric shock Hand and Eye injuries Crush and Pinch Points Ergonomic injuries Flying debris/dust Rotating machine parts – entanglement High noise levels Sharp edges & burrs Traumatic injury		<p>Ensure that you have been properly trained to use the tool safely. Read the operator's manual before using the tool and operate the tool according to the manufacturer's instructions. Use only tested and approved tools. Ensure that the power tool has the correct guard, shield or other attachment that the manufacturer recommends.</p> <p>240V tools Prevent shocks. Ensure that the tools are properly grounded using a three-prong plug, are double-insulated (and are labelled as such), or are powered by a low-voltage isolation transformer: this will protect users from an electrical shock. Check electric tools to ensure that a tool with a 3-prong plug has an approved 3-wire cord and is grounded. The three-prong plug should be plugged in a properly grounded 3-pole</p>	STL/ Safety Officer/ workers	

¹ AS/NZS 3760 In-Service Safety Inspection and Testing of Electrical Equipment indicates testing at 12 month intervals

Safe Work Method Statement

			<p>outlet. If an adapter must be used to accommodate a two-hole receptacle, the adapter wire must be attached to a known, functioning ground. NEVER remove the third, grounding prong from a plug.</p> <p>All 240V tools are to be operated using a Residual Current Device (RCD) which is tested before use.</p> <p>Battery operated tools</p> <p>Use only the kind of battery that the tool manufacturer specifies for the battery-powered tool that you are using.</p> <p>Recharge a battery-powered tool only with a charger that is specifically intended for the battery in that tool.</p> <p>Remove the battery from the tool or ensure that the tool is switched off or locked off before changing accessories, making adjustments, or storing the tool.</p> <p>Store a battery pack safely so that no metal parts, nails, screws, wrenches and so on can come in contact with the battery terminals; this could result in shorting the battery and possibly cause sparks, fires or burns.</p>		
Tool operation	<p>Electric shock Hand and Eye injuries Crush and Pinch Points Ergonomic injuries Flying debris/dust Rotating machine parts – entanglement High noise levels Sharp edges & burrs Traumatic injury</p>		<p>Wear or use personal protective equipment (PPE) or clothing that is appropriate for the work you are doing and in accordance with the site risk assessment/Safety 5. Additionally:</p> <p>Long and loose hair must be contained</p> <p>Close fitting/protective clothing must be worn</p> <p>Hearing protection must be worn where noise levels are in excess of the 85 dB(A) occupational exposure limit.</p> <p>Rings and jewellery must not be worn when operating this equipment.</p>	Operator/ Spotter/ assistant	

Safe Work Method Statement

		<p>Switch off the tools before connecting them to a power supply.</p> <p>If a power cord feels more than comfortably warm or if a tool is sparking, have it checked by an electrician or other qualified person.</p> <p>Disconnect the power supply before making adjustments or changing accessories.</p> <p>Remove any wrenches and adjusting tools before turning on a tool. Inspect the cord for fraying or damage before each use. Tag defective tools clearly with an "Out of service" tag and replace immediately with a tool in good running order.</p> <p>During use, keep power cords clear of work areas, tools, aisles and the path that the tool will take. Cords should be suspended above head height (to eliminate stumbling or tripping hazards) and clear of wet areas.</p> <p>Use only approved extension cords that have the proper wire size (gauge) for the length of cord and power requirements of the electric tool that you are using. This will prevent the cord from overheating.</p> <p>Eliminate octopus connections: if more than one receptacle plug is needed, use a power bar or power distribution strip that has an integral power cord and a built-in RCD protection.</p> <p>Pull the plug, not the cord when unplugging a tool. Pulling the cord causes wear and may adversely affect the wiring to the plug and cause electrical shock to the operator.</p> <p>Follow good housekeeping procedures – keep the work area free of clutter and debris that could be tripping or slipping hazards.</p> <p>Keep power cords away from heat, water, oil, sharp edges and moving parts. They can damage the insulation and cause a shock.</p> <p>Ensure that cutting tools, drill bits, etc. are kept sharp, clean and well maintained.</p>	
--	--	---	--

Safe Work Method Statement

	Fire risk		<p>Store tools in a dry, secure location when they are not being used.</p> <p>Ensure firefighting equipment is available when grinding or other hot work. Grinding and hot work must not be undertaken during periods of total fire ban.</p>		
Tool operation	<p>Electric shock</p> <p>Hand and Eye injuries</p> <p>Crush and Pinch Points</p> <p>Ergonomic injuries</p> <p>Flying debris/dust</p> <p>Rotating machine parts – entanglement</p> <p>High noise levels</p> <p>Sharp edges & burrs</p> <p>Traumatic injury</p>		<p>Do not wear gloves, loose clothing or jewellery while using revolving power tools. Tie back long hair or wear appropriate hair protection to prevent hair from getting caught in moving parts of equipment.</p> <p>Do not use a tool unless you have been trained to use it safely and know its limitations and hazards.</p> <p>Avoid accidental starting by ensuring the tool is turned off before you plug it in. Also do not walk around with a plugged-in tool with your finger touching the switch.</p> <p>Do not bypass the ON/OFF switch and operate the tools by connecting and disconnecting the power cord.</p> <p>Do not disconnect the power supply of the tool by pulling or jerking the cord from the outlet.</p> <p>Do not leave a running tool unattended. Do not leave it until it has been turned off, has stopped running completely, and has been unplugged.</p> <p>Do not use electric tools in wet conditions or damp locations unless the tool is connected to an RCD.</p> <p>Do not expose electric power tools to rain or wet conditions; wet tools increase the likelihood of electric shock.</p> <p>Avoid body contact with grounded surfaces like refrigerators, pipes and radiators when using electric powered tools; this will reduce the likelihood of shock if the operator's body is grounded.</p>	Operator/ Spotter/ assistant	

Safe Work Method Statement

	<p>Do not plug several power cords into one outlet by using single-to-multiple outlet adapters or converters ("cube taps").</p> <p>Do not use light duty power cords. Stop using an electric power tool if you feel a tingle in your fingers. This is a warning that the tool is faulty and needs repair.</p> <p>Do not connect or splice extension cords together to make a longer connection: the resulting extension cord may not be able to provide sufficient current or power safely.</p> <p>Do not carry electrical tools by the power cord.</p> <p>Do not tie power cords in knots. Knots can cause short circuits and shocks. Loop the cords or use a twist lock plug.</p> <p>Do Not Tie Power Cords</p> <p>Never use extension cords as permanent wiring: use extension cords only as a temporary power supply to an area that does not have a power outlet.</p> <p>Do not walk on or allow vehicles or other moving equipment to pass over unprotected power cords. Cords should be put in conduits or protected by placing planks on each side of them.</p> <p>Do not brush away sawdust, shavings or turnings while the tool is running. Never use compressed air for cleaning surfaces or removing sawdust, metal turnings, etc.</p> <p>Do not operate tools in an area containing explosive vapours or gases.</p> <p>Do not clean tools with flammable or toxic solvents.</p> <p>Do not surprise or touch anyone who is operating a tool. Startling a tool operator could end up causing an accident or injury.</p>	
--	--	--

Safe Work Method Statement

<p>Brush cutters and whipper snippers</p>	<p>Traumatic injury to operators and bystanders</p> <p>Kick out (blade thrust)</p> <p>Improperly sharpened, dull or cracked blades causing excessive tool load or blade failure</p>		<p>Operate in accordance with Owner's or operator's manual Use only genuine manufacturers parts and accessories. Ensure brush cutter deflector is properly mounted and serviceable Ensure bystanders are 15m away</p> <p>When using grass cutting blades brush cutting knives, ensure the correct fitting of the bike or loop handle with barrier bar.</p> <p>Ensure inspection and sharpening in accordance with specifications. Avoid contact with hard objects and the ground.</p> <p>PPE in accordance with the above requirements</p>	<p>STL/ Safety Officer/ Operator/ Spotter/ assistant</p>	
<p>Demolition saw</p>	<p>Hand and Eye injuries Crush and Pinch Points Ergonomic injuries Flying debris/dust Rotating machine parts – entanglement High noise levels Sharp edges & burrs Traumatic injury</p>		<p>Note: DRA policy prohibits the cutting, sawing, grinding, drilling of silica containing materials including concrete and sandstone</p> <p>Personnel must not operate this equipment without formal accreditation by DRA NTM</p> <p>Kick-back Kick-back is the sudden and violent movement of a saw away from the cutting surface and presents an extreme risk for the operator and for bystanders.</p> <p>It is important to take a methodical approach to cutting to minimise the risk of kick-back. This includes:</p> <ul style="list-style-type: none"> ● selecting equipment specifically designed for the task; ● using a fit for purpose work platform or scaffold so the tool can be used in a safe working range; ● carefully consulting builder's plans to avoid embedded objects; ● ensuring bystanders are at a safe distance from your work area; and ● never removing or circumventing guards. <p>Inverted cutting</p>	<p>STL/ Safety Officer/ Operator/ Spotter/ assistant</p>	

Safe Work Method Statement

Inverted cutting (cutting the underside of a slab, floor or overhang) should never be done with a hand-held saw, because the operator has little control of a cutting machine held above shoulder height.

Dust and gases

Electric saws can be fitted with a vacuum bag ventilation system, however as the bag fills, efficiency may reduce and a respirator is generally required for longer periods of use.

Compliant wet electric saws protected by a residual current device (RCD) may be used. Always check the manufacturer's directions for safe use.

Respiratory protection may be necessary where none of these methods are practical. In such cases, appropriate particulate filter respirators will protect workers against dust and fibres, the toxic effects of substances such as lead fumes, or respiratory diseases

The operator is responsible for cleaning up dust (including slurry) using a safe method after the work activity/task.

Where petrol-driven machines such as hand-held saws are used, filtered air respirators are not effective against toxic exhaust. Saws must be operated in well ventilated areas.

Noise

Excessive noise from concrete cutting and drilling is a workplace hazard. An operator's hearing may be damaged by very loud noise over a relatively short period or by exposure to a lower level of noise over a longer period.

DRA will:

- prior to purchase or hire, obtain information on the noise output of different models from manufacturers and suppliers;
- select the quietest suitable model and blade available;
- provide training and instruction about noise, its effects, noise control measures and the proper use and maintenance of hearing protectors; and
- provide operators and nearby workers who need to be in excessive noise areas with hearing protectors selected in accordance with Australian/New Zealand Standard, AS/NZS 1269.3 Occupational noise management – Hearing protector program

Safe Work Method Statement

			<p>Equipment operators must:</p> <ul style="list-style-type: none"> • keep people not directly involved in cutting or drilling at least seven metres away from excessive noise areas; • consider erecting temporary acoustic barriers around cutting and drilling areas to further reduce the spread of noise; • assess the suitability of using noise-reduced saw blades for a particular job; 		
	<p>Manual task hazards</p> <ul style="list-style-type: none"> • awkward or static working positions repeated or maintained for long periods; • holding handheld equipment over extended periods; • lifting, pushing, levering, holding or carrying plant, equipment and cut sections ; • cutting above shoulder height unless the tool has been designed for this; • slip and trip hazards while handling plant, equipment or materials; and • sudden violent reactions (kick-back, push-back or 		<p>Choosing lighter equipment, including smaller diameter blades, where possible; Selecting a fit for purpose work platform to avoid cutting above shoulder height; Avoiding kick-back, push-back and pull-in situations by pre-checking blades and other saw components for wear and tear, assessing materials to be cut and locating hidden steel reinforcing and other obstructions; and Avoiding hazardous cutting situations. Regular breaks and use of other team members</p>	Operator	

Safe Work Method Statement

	pull-in) by a saw when the blade strikes a hidden object or resistance, or is pinched or jams in the cut.				
	<p>Vibration Vibration transmitted from concrete and masonry cutting and drilling equipment can affect the operator's whole body or parts of the body, such as the hands and arms. Whole body effects are generally musculoskeletal, especially affecting the lower spine region but there may be a range of other effects.</p>		<p>Ideally DRA or hire equipment should:</p> <ul style="list-style-type: none"> • vibrate less or does not have to be held or manually supported; • is well-balanced, as light as possible and capable of being held in either hand (and different sized hands); and • has vibration-absorbing handles, or with an even surface on the handles to distribute gripping force. <p>Wrapping metal handles with soft resilient rubber lagging can also effectively reduce vibration exposure. Gloves should not be relied on to protect workers from vibration.</p>		Operator/ Logistics Chief/ National Logistics Manager
	<p>Working at height Using this equipment at height increases the risk of falling.</p>		<p>Do not operate concrete and masonry cutting and drilling equipment when standing on a ladder. All work at height should be done from a safe working platform</p>		Operator

Safe Work Method Statement

OTHER JOB REQUIREMENTS			
List staff skills/competencies and licences required for safe job performance:			
<input checked="" type="checkbox"/>	DRA accreditation in use of this equipment		
<input checked="" type="checkbox"/>	On site training or verification of competency in powered hand tools		
<input type="checkbox"/>			
List items of plant/equipment/tools required:			
<input type="checkbox"/>			
Relevant codes of practice, legislation standards or critical risk controls that may be applicable:			
<input checked="" type="checkbox"/>	Relevant codes of practice, legislation standards or critical risk controls that may be applicable: as adopted by State and territory jurisdictions (less WA and Vic) ²		
<input checked="" type="checkbox"/>	Canadian Centre for Occupational Health and Safety - Powered Hand Tools - Electric Tools - Basic Safety		
<input checked="" type="checkbox"/>	AS/NZS 3760 In-Service Safety Inspection and Testing of Electrical Equipment		
<input checked="" type="checkbox"/>	Manufacturer's Operation Manual		
Maintenance checks, site/workplace inspections required:			
<input checked="" type="checkbox"/>	Pre-start checks on powered mobile plant, vehicles and powered hand tools		
<input checked="" type="checkbox"/>	Maintenance of equipment logbooks		
Additional approvals, certificates, WorkCover approvals/permits required e.g. confined spaces, working at heights, hot works etc: N/A <input checked="" type="checkbox"/>			
Has a risk assessment been completed for any work involving confined spaces, electrical work or diving work			
	Yes	No	N/A <input checked="" type="checkbox"/>

² A court may rely on the codes as evidence of whether you took reasonably practicable steps to ensure the health and safety of your workers. In Victoria, the codes (known as compliance codes) are legally binding. You should follow the codes at all times



Safe Work Method Statement

Approvals

This SWMS is approved by DRA National Director of Field Operations

Name	Signature	Date

Site SWMS Approval (Strike Team Leader/ Supervisor i.e. person responsible for ensuring compliance with SWMS)

I have read and understand this SWMS. I have completed a site risk assessment with team members and will ensure compliance with the SWMS.

Name:	Signature:	Date:
--------------	-------------------	--------------

Operator/team confirmation

I have read and understand this Safe Work Method Statement. I have no medical conditions that may affect my ability to operate the vehicle.

NAME	SIGNATURE	DATE

Safety Officer confirmation (or Operations Chief in lieu)

I confirm that the safety controls detailed above are in place or will be acted upon. I can confirm that proposed tasks are within the scope of operations and that plant operators (if applicable) are duly authorised by the National Training Manager.

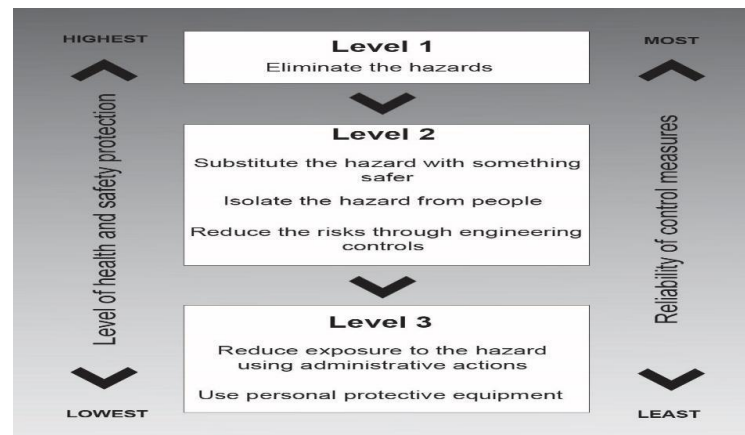
NAME	SIGNATURE	DATE

Safe Work Method Statement

WHS RISK MATRIX

	Minor	Moderate	Substantial	Major	Catastrophic
Almost Certain	Medium	High	High	Extreme	Extreme
Likely	Medium	Medium	High	Extreme	Extreme
Possible	Low	Medium	High	High	Extreme
Unlikely	Low	Low	Medium	High	High
Very Unlikely	Low	Low	Medium	Medium	High

HIERARCHY OF CONTROLS



Acknowledgements:
NSW Government – Department of Industry



Safe Work Method Statement

NSW Government – Department of Primary Industries
Health and Safety handbook - Portner Press