

SAFE WORK METHOD STATEMENT		Rivers and Lakes Opening		
<b>Reference documents</b>	Work Health & Safety Act and Regulation's 2011, Codes of Practice; How to manage Work Health Safety Risks, Managing the risk of Chemicals in the Workplace, Hazardous Manual Tasks, First aid in the workplace, Confined spaces, Construction Work, Demolition Work, Excavation Work, How to manage and Control Asbestos, Managing the Risk of Falls.			
<b>SWI:</b>	Excavator, Water cart, Back hoe,			
<b>Training and Competencies</b>	General construction induction card (white card),			
<b>Safety data Sheets</b>	Diesel fuel, Castrol hydraulic fluid,			
<b>Personal Protective Equipment</b>	Hearing protection, eye protection, Safety footwear, High visibility long sleeve shirt and trousers, Wide brimmed hat or brim attachment, Sun screen, Protective gloves, Hard hat, Respiratory protective equipment,			
<b>Plant and Equipment</b>	Dump truck, excavator, back hoe, front end loader,			
<b>Inspection and Testing</b>	Pre start checks on all plant and equipment, inspection as per manufacturers requirements			
<b>Hazardous Chemicals and Dangerous Goods</b>	Diesel fuel, hydraulic fluid,			
<b>High Risk Work</b> <i>Indicate if any of the HIGH risk activities are performed by workers</i>	<input type="checkbox"/> Where there is a risk of a person falling more than two metres.	<input type="checkbox"/> On in or adjacent to roadways, railways, shipping lanes or other traffic corridor.	<input checked="" type="checkbox"/> In, over or adjacent to water or other liquids where there is a risk of drowning.	
	<input checked="" type="checkbox"/> At workplaces where there is any movement of powered mobile plant.	<input type="checkbox"/> Involving the use of explosives.	<input type="checkbox"/> In an area where there are artificial extremes of temperature.	
	<input type="checkbox"/> On or near energised electrical installations or services.	<input type="checkbox"/> Involving a trench or shaft if the excavated depth is more than 1.5 metres.	<input type="checkbox"/> On or near pressurised gas distribution mains or piping.	
	<input type="checkbox"/> Involves structural alterations or repairs that require temporary support to prevent collapse.	<input type="checkbox"/> Involving a confined space.	<input type="checkbox"/> On or near chemical, fuel or refrigerant lines.	
	<input type="checkbox"/> Involving tilt-up or precast concrete.	<input type="checkbox"/> On telecommunications towers.	<input type="checkbox"/> Involving diving.	
	<input type="checkbox"/> Involving removal or likely disturbance of asbestos	<input type="checkbox"/> In an area that may have a contaminated or flammable atmosphere.	<input type="checkbox"/> Involves demolition of an element of a structure that is load-bearing or otherwise related to the structural integrity of the structure.	
	<input type="checkbox"/> Involving a tunnel.			
<b>SWMS Prepared by:</b>	<b>Name and signature:</b>		<b>Date:</b>	
<b>Authorised by:</b>	<b>Name and signature:</b>		<b>Date:</b>	

*\*SWMS are to be reviewed as per the Document Control Procedure or when there has been a change to the Task / Process or Legislation.*

Job Step	Hazard	Risk	Initial Risk Rating E,H,M,L	Control Measures <i>Controls have been identified using the hierarchy of controls</i>	Responsibility <i>Who</i>	Residual Risk Rating E,H,M,L
Prior to the commencement of work ensure appropriate permits and licences from fisheries have been obtained to work in rivers/lakes area.  1. Conduct risk assessment and induct staff, if necessary  Establish worksite	Persons entering/exiting vehicles	<ul style="list-style-type: none"> <li>- Muscle sprain (limbs or torso)</li> <li>- Broken bones</li> </ul>	<b>M</b>	3 point' technique, back out while exiting, check for uneven ground	Supervisor and workers	<b>L</b>
	Uneven or slippery Ground	<ul style="list-style-type: none"> <li>- Muscle sprain (limbs or torso)</li> <li>- Broken bones</li> <li>- Cuts and abrasion</li> <li>- Plant roll over/obstructed</li> </ul>	<b>M</b>	Inspect work area for appropriate foot placement and vehicle access  Don't walk where can't see firm surface e.g. wet sand  Don't drive onto soft or slippery ground  Identify access route during day light and mark so visible at night	Supervisor and workers	<b>L</b>
	Ineffective communication	<ul style="list-style-type: none"> <li>- Injured worker in isolation</li> </ul>	<b>M</b>	Mobile phone or two way radio access or hand held unit  Workers trained in emergency procedures	Supervisor and workers	<b>L</b>
	Unauthorised by persons or vehicles to work site	<ul style="list-style-type: none"> <li>- Muscle sprain (limbs or torso)</li> <li>- Broken bones</li> <li>- Cuts and abrasions -</li> <li>- Drowning</li> <li>- Struck by vehicle</li> </ul>	<b>M</b>	Isolate workers and public from plant/vehicles by implementing an appropriate exclusion zone using barriers, danger tape, para web, traffic control personnel or other suitable method  Where appropriate, have a life guard ring  Where appropriate arrange for Police /Ranger presence	Supervisor and workers	<b>L</b>
	Moving Traffic or Plant	<ul style="list-style-type: none"> <li>- Death or serious injury</li> </ul>	<b>H</b>	Establish site, implement approved or modified traffic movement plans  If necessary, implement Vehicle Management Plan & control access  Ensure observers and signage are in place  Use only qualified operators	Supervisor and workers	<b>L</b>

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	Unloading plant	- Plant roll over - Serious injury or entrapment	H	Only qualified plant operators are to unload plant  Ensure plant trailer is positioned on level ground and all non-essential workers are clear.  Release all securing chains and ensure ramps are lowered  Plant operator is to start the piece of plant, raise all blades, buckets etc. clear of the trailer engage low gear and let the machine move down the ramps.	Competent operator	M
	Snakes	- Snake bite	M	Remain vigilant when walking through long grass or bushland  Workers should be trained in snake awareness.  Ensure suitable first aid equipment is available in case of a snake bite.	Supervisor and Workers	L
	Tidal movement/ wave action	- Drowning - Damage to plant and equipment - Isolation of worksite	H	Prior to commencing work, check tide tables and weather forecast and schedule work at most suitable times  Identify potential 'wash out' points. Locate spotter to monitor during works  Introduce signage and Danger Tape  Post operation - place hazard signage  Minimise working in water	Supervisor and competent operator	M
2. Carry out earthworks	Collapse of earth	- Death or serious injury	H	Batter (max 1.5m high), if excavating in sand need a minimum of 2:1 batters, use a competent spotter when required  Keep heavy vehicles 1m outside 45 degree line  Use plant with adequate reach	Competent operator	M

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Carry out earthworks <b>(Continued)</b>				Keep vibrating plant away from excavation  Ensure trucks are facing 90 degrees to trench when last 20mt is to be removed  Site Supervisor to review depth and conditions regularly/verify sand stability  Follow Excavation Work Guidelines		
	Falls into excavations	- Death or serious injury	<b>H</b>	Keep edges and sides clean during excavation  Install adequate barricades around excavations greater than 1.5m in depth or provide observers  Keep light vehicles 1m outside edge of excavation		
	Contact Overhead Wires	Electrocution	<b>H</b>	Observe work near overhead power lines code of practice 2006  Planning should be undertaken at least one day before program starts to locate lines at job sites  If tipping, an observer is to be placed at traffic cones so trucks do not enter 3 meters of powerlines  Do not work closer than ordinary person approach distances of overhead powerlines  Must be more than 3 m from overhead powerlines up to 132kV  Must be more than 6 m from high voltage transmission lines from 132-330kV  Must be more than 8 m from lines over 330kV  Under special circumstances, distances less than those listed above apply. These distances may be applied ONLY when the special requirements are met.	Supervisor and competent operator	<b>M</b>

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Carry out earthworks (Continued)				When a crane operator has the appropriate training, an observer is present, and the owner of the powerlines has been contacted and permission obtained, the distances can be reduced to as little as one metre.  In emergency circumstances, the owner of the powerlines can be contacted within 24 hours of the incident.		
	Plant Overturn	- Death or serious injury	H	Ensure ground is suitable under the surface by probing  Competent Spotter  Work within plant limits  Ensure reach is within limits  Emergency practices are to be discussed  Plant and equipment should be kept out of water whenever possible.	Competent operator	M
	Inappropriate Manual Handling	- Muscle sprain (limbs or torso)	M	Undertake training in proper manual handling techniques i.e.  Task rotation, muscle stretching exercises,  Use mechanical aids when possible	Supervisor and workers	L
	Equipment Malfunction or misuse	- Muscle sprain (limbs or torso) - Cuts and abrasions Entrapment	M	Undertake pre-use checks, all operations and maintenance in accordance with manufacturer's recommendations and other safety procedures  Only qualified operators are to operate and inspect plant	Competent operator	L
	Dusty conditions	- Respiratory illness	L	Ensure plant cabins are closed  Use face masks if outside conditions are adverse	Supervisor and workers	L

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				Use dust suppression methods such as water truck		
3. Site Operations  Site Operations <b>(Continued)</b>	Abuse and or harassment from the public	Mental illness, fatigue	<b>M</b>	Advertise that works are to be undertaken if appropriate,  Organise for Police or ranger presence Place signage and or danger tape to restrict access to area	Supervisor	<b>L</b>
	Excessive Exposure to UV	- Sunburn - Skin cancer	<b>L</b>	Wear wide brimmed hats, long sleeves and long trousers, use 30+ sunscreen  Take regular breaks in a shaded area	Supervisor and workers	<b>L</b>
	Excessive exposure to loud noise	- Loss of hearing	<b>L</b>	Wear suitable ear protection	Supervisor and workers	<b>L</b>
	Night Work	Serious injury	<b>H</b>	Whenever possible avoid conducting night works  Use a site plan and ensure this includes suitable lighting and competent spotters  Identify access route during day light and mark so visible at night  Alter placement of signage and or danger tape if appropriate  Cease work or limit excavation work occurring  Limit use of dump trucks  Ensure access to area is limited	Supervisor and workers	<b>M</b>
4. Depart site at completion of project	Loading plant	- Plant roll over - Serious injury or entrapment	<b>H</b>	Only qualified plant operators are to load plant  Ensure plant trailer is positioned on level ground and all non-essential workers are clear.  Plant operator is to start the piece of plant, raise all	Competent operator	<b>M</b>

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				<p>blades, buckets etc. engage low gear and let the machine move up the ramps under control.</p> <p>When correctly positioned on the trailer lower all blades, buckets, stabiliser's etc. secure plant to trailer with chains and chain binder and raise ramps.</p>		

<b>LIKELIHOOD</b> How likely is it to happen? ↓	<b>E=EXTREME H=HIGH M=MEDIUM L=LOW</b> ← CONSEQUENCES – How severely could it affect health and safety? →				
	<b>CATASTROPHIC</b> Kill or cause Permanent Disability	<b>MAJOR</b> Serious Illness or Injury	<b>MODERATE</b> Medical Attention, Time off Work	<b>MINOR</b> First Aid Required	<b>INSIGNIFICANT</b> No Injuries
	<b>ALMOST CERTAIN</b> Is expected to occur	<b>E</b>	<b>E</b>	<b>H</b>	<b>H</b>
<b>LIKELY</b> Will probably occur	<b>E</b>	<b>H</b>	<b>H</b>	<b>M</b>	<b>M</b>
<b>POSSIBLE</b> Might occur	<b>H</b>	<b>H</b>	<b>H</b>	<b>M</b>	<b>L</b>
<b>UNLIKELY</b> Could occur	<b>H</b>	<b>M</b>	<b>M</b>	<b>L</b>	<b>L</b>
<b>RARE</b> May occur only in exceptional circumstances	<b>H</b>	<b>M</b>	<b>M</b>	<b>L</b>	<b>L</b>

Risk Level	Required Action
<b>Extreme</b>	<b>Act immediately:</b> The proposed task or process activity must not proceed. Steps must be taken to lower the risk level to as low as reasonably practicable using the hierarchy of controls.
<b>High</b>	<b>Act today:</b> The proposed activity can only proceed, provided that: The risk level has been reduced to as low as reasonably practicable using the hierarchy of controls. The risk controls must include those identified in legislation, Australian Standards, Codes of Practice etc. and The document has been reviewed and approved by the supervisor and A Safe Working Procedure or Safe Work Method has been prepared and The supervisor must review and document the effectiveness of the implemented risk controls
<b>Medium</b>	<b>Act this week:</b> The proposed task or process can proceed, provided that (I) The risk level has been reduced to as low as reasonably practicable using the hierarchy of controls and The document has been reviewed and approved by the supervisor and A Safe Working Procedure or Safe Work Method has been prepared.
<b>Low</b>	<b>Act this month:</b> Managed by local documented routine procedures which must include application of the hierarchy of controls.



