

Sleeper grab (Scissor Type Operation)

Review date: 23/05/11

Document no. SMS-06-SW-1243	Job title/description The sleeper grab is a scissor type lifting device used for performing bulk sleeper lift/movement. The sleeper grabs can lift a maximum number of six timber or concrete sleepers with a safe working load of 2,000kgs. The device is an attachment suitable for compatible vehicle loading crane, excavators, cranes or Front End Loaders.		
Review date	References: OHS Act 2000, OHS Regulations 2001 Chapter 5, SMS-06-GD-0225 Plant, Work Cover NSW Plant Guide 2001, SMS-16-SR-0057 Inspection and testing.		
Responsible supervisor Barry Broome	PPE and precautions	Competencies or qualifications	Licences or permits required
	<p>Hard Hat High Visibility vest Safety boots Safety Glasses</p> <ol style="list-style-type: none"> Maintain an exclusion zone of 6 metres. Do not get under lifting device / Sleepers during lift. Be aware of multiple pinch points. Only use handles to make direct contact 	<p>Vehicle loading crane<10 t = nil Vehicle loading crane>10t =CV Crane = C0, C1, C2, C6, CT, CP, CD, CN, CB. Excavator = LE Front End Loader = LL</p>	Nil
Tools and equipment required A suitable and compatible lifting device such as a vehicle loading crane, excavator, crane or front end loader. Sleeper grab unit, Lifting chains / Hooks with a SWL of >2000kgs, Four timber gluts.			
IF CONTROL MEASURES ARE NOT SUITABLE AND MAJOR CHANGES ARE NEEDED, CONDUCT A RISK ASSESSMENT AND DEVELOP NEW CONTROLS ACCORDING TO SMS-06-PR-0104 WORKPLACE RISK MANAGEMENT.			
		Step 1. Connect lifting device to the sleeper grab rig and place on ground. Make a visual inspection on bolts / joints, lifting attachments and ratchet lock system and grease if required.	Step 2. Lift the sleeper grab off the ground slightly then lower onto the ground and compress the rig to activate the ratchet locking system and enable the rig to open. Raise the rig clear of the ground and repeat visual check.
		Step 3. Position the grabs over the sleeper. Only use the handles at each end of the rig if direct contact is required. Ensure that the outer two sleepers are fully in contact with the grabs to prevent them falling.	Step 4. As the sleeper grab rig is raised the grabs lock onto the sleepers. An exclusion zone of 6 metres from the area is to be maintained. Only use the handles at each end of the rig if direct contact is required to position the rig.
		Step 5. Place two timber gluts under the first row of sleepers to allow the grab to freely move away from the sleepers.	Step 6. Ensure two timber gluts are positioned between the sleeper row and the scissor rig frame. Lower the rig and allow the ratchet system to lock the scissor action. Disengage the load.
Additional controls Maintain all clearances from electrical over head conductors and danger zones i.e. Railway tracks.			