

DISLODGEMENT OF A CRANE LOAD ABOVE A PERSON – - SERIOUS ACCIDENT

INCIDENT

A maintenance contractor suffered serious injuries when he was struck by falling steel plates which became dislodged from chain slings during a crane hoisting operation at a mine.

CAUSES

The immediate causes of this accident were identified as;

- (a) Inappropriate slinging of the plate load.
- (b) Slewing a load over unwary persons.

COMMENTS AND PREVENTATIVE ACTION

- (i) It is not good practice to place chain slings round plates. The edges can fracture the links of chains, and steel on steel contact does not provide effective frictional constraint against slippage, particularly with relatively light loads.
- (ii) Steel and other metal plates are commonly very thin, whilst at the same time they may be both long and wide. If the plates are slung on the flat (as was the case here) they can develop sag, camber and undulatory effects whilst being lifted or handled, and are amongst the most dangerous of loads.
- (iii) Slewing or moving any crane load over persons is always hazardous.

To avoid recurrences of this type of accident the following should be considered:-

- (i) All thin plates should be lifted by using either shackles passing through holes in the plates or by appropriate plate clamps if no suitable holes exist in the plates.
- (ii) Crane loads should not be moved over persons. If a load is to be moved over areas of personnel traffic, appropriate steps must be taken to protect all persons. This protection may be by the erection of barricades, overhead cover, or procedural methods such as clearance of personnel from the area. In addition to these measures, the slinging of the load and the integrity of the crane mechanisms involved must be closely monitored.

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19 January 2000