Lifting Chain Failure

WHAT HAPPENED

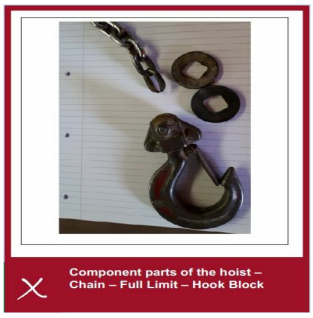
During a routine lifting operation, a chain link on the lifting hoist chain broke causing the item it was lifting to fall.

Examination revealed that the hook block had come away from the chain. The first link of the chain, that is normally inside the hook block, had worn causing it to fail. The hook block pin slid through and became separated from the chain. There was some wear on the opposite end of the link to the failure.

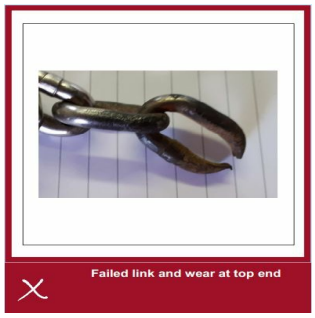
The hoist was rated with a safe working load of 250kg and was only lifting an item about 21kg. The hoist had been in service since 2002 and had a thorough examination certificate from Feb 2017 that did not identify any recommended actions in relation to the chain.

LEARNING POINTS / ACTIONS TAKEN

- All chains should be examined to ensure no noticeable wear on end links
- Ensure pre-use checks are carried out. Do not rely solely on the annual thorough examination
- Consider the amount of use and working environmental when deciding on a hoist's life expectancy before it is replaced.



Hook Block



Failed Link

LOCATION:	**OTHER**	**ALERT STATUS:**	**Normal**
ACTIVITY:	**LIFTING**	**DATE ISSUED:**	**06/02/2018 20:28:20**
SUB ACTIVITY:	**NO SUB ACTIVITY AVAILABLE**	**INCIDENT No:**	**01482**