

Reference Number	Bulletin 03 - 2016
Affected Product	142-1664 and 142-6893 Adjustable Lifting Brackets
Risks Identified	Incorrect maintenance and operating practices could lead to adjustable lifting bracket failure
Release Date	September 22 2016

## Background

There are two adjustable lifting brackets available via the Caterpillar parts system, part numbers 142-1664 and 142-6893. Both brackets were originally developed for use on medium to large track type tractors. The brackets are now specified for a variety of tasks on a number of Caterpillar products, provided the designated attachment brackets and usage instructions are used.

## Incident Description

A customer was using a 142-1664 lifting bracket to remove a D11T final drive. The maintainer reported a 'cracking sound' as the overhead crane was taking up the load of the bracket and final drive. The load was removed and the lifting bracket inspected. The weld that retains the top adjusting nut in the 'cross pin' was found to be cracked. Refer to illustrations on page 3 of this bulletin.

## Recommended Actions

Caterpillar and Hastings Deering confirm that there are no other reported concerns regarding the quality or durability of the lifting brackets. The adjusting rods and nuts are not intended to be load-bearing devices. The bracket must be adjusted according to the instructions for the component being lifted, **prior** to applying load.

Do not operate or perform any lubrication, maintenance, or repair on these lifting links, without reading and understanding the operation, lubrication, maintenance, and repair information contained in the Tool Operating Manuals for these lifting brackets, and the specific machine service manual procedure specifying the use of these tools.

Lifting bracket tool operating manual form numbers:

Bracket part number 142-1664, refer form number NEHS1015\* ([click here](#))

Bracket part number 142-6893, refer form number NEHS0994\* ([click here](#))

In some cases, attachment brackets for these tools have separate tool operating manuals. These should also be read and understood prior to use.

\*Always refer to Caterpillar WebSIS to obtain current versions of Caterpillar service literature and Tool Operating Manuals.

Page 2 of this bulletin contains excerpts from the tool operating manuals. The manual contains further clarification of many of these points and additional safety and maintenance information. Ensure a copy of the relevant tool operation manual is available to the user.

Excerpts from Adjustable Lifting Link tool operating manuals:

- ***Failure to follow the instructions or heed the warnings below could result in injury or death.***
- ***Verify that the load to be lifted does not exceed the specified capacity.***
- ***Measure the length of extension at A and B, and match with the chart. Always use the lower of the two capacities. Always adjust the arms to the shortest usable length.***
- ***Refer to the service manual for specific applications.***
- ***Do not adjust under load.***
- ***Inspect the condition of the lifting bracket group prior to use.***
- ***To avoid damage to the lifting group, do not use an impact wrench to rotate the adjusting screw. Use a hand wrench or socket. Do not adjust the extension arms while a load is suspended from the tool.***
- ***Do not use the lifting bracket group unless load capacity markings are legible –replace warning films if damaged or missing – refer Tool operating manuals for correct form numbers.***
- ***Do not use the lifting bracket group to lift at any angle other than vertical.***
- ***Do not use the lifting bracket group to position or rotate loads off centre.***
- ***Do not extend or retract the lifting bracket extension arms while a load is suspended from the tool.***
- ***Do not use end plate holes for lifting a load – refer illustration in tool operating manual.***
- ***Periodically lubricate arm extension by adjusting screw (4) using 222-3116 Dry Lubricant or equivalent.***
- ***Have tools inspected annually by an approved dealership inspector.***
- ***Internal threads can be damaged by moisture and/or high humidity. Store tool indoors in a clean, dry location, with extension arms retracted.***
- ***Lay the C-Frame flat for storage to prevent falling.***
- ***All relevant adaptors should be stored flat to prevent falling.***
- ***At the end of the operational life of the tool, destroy the tool and dispose of as scrap.***

Reported incident photographs:



Upper section of 142-1664 bracket



Sliding section - bracket removed showing pin location



Failed weld connecting nut to pin

If you have any queries regarding this Bulletin, please contact your Mining or Product Support Representative.

*This bulletin is to inform you of the recommendations of the supplier in respect of issues dealt with in the bulletin and should not be used as specific advice in respect of any particular events. Advice from a qualified repairer should be sought in respect of any particular events and Hastings Deering (Australia) Limited accepts no responsibility for any loss or damage occasioned by a party using this general bulletin.*