

## Christie Offset Gearboxes

COG CHRISTIE OFFSET GEARBOXES

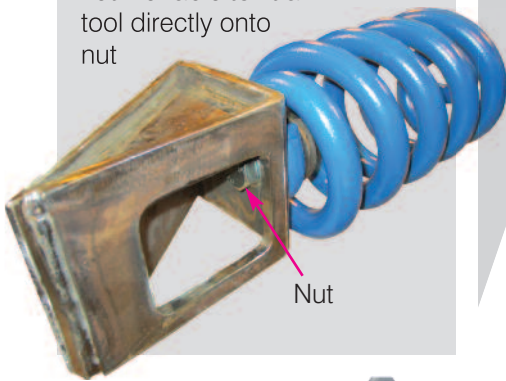
### Why use a Christie Offset Gearbox?

Christie Offset Gearboxes are designed for the tightening and un-tightening of fasteners with overhead obstructions, or nuts with protruding threads.



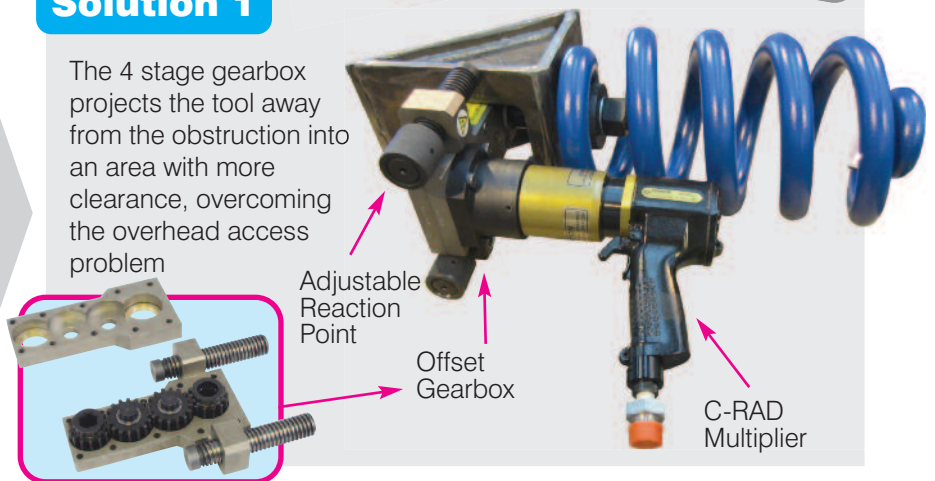
#### Problem 1

Obstruction above nut – unable to fit a tool directly onto nut



#### Solution 1

The 4 stage gearbox projects the tool away from the obstruction into an area with more clearance, overcoming the overhead access problem



#### Problem 2

To run a round nut along 350mm of protruding thread

Round Nut



#### Solution 2

Air Nut Runner

Offset Gearbox

Offset gearbox with 2 stage gear system overcomes thread protrusion and is able to **grip the round nut**



A C-RAD Pneumatic Torque Tool with an offset gearbox being used on a heat exchanger with protruding threads

#### Examples of other applications using Christie Offset Gearboxes

Thread Protrusion

C-RAD Multiplier

A C-RAD tool with an offset gearbox used for valve actuation

Offset Gearbox

Special Reaction

