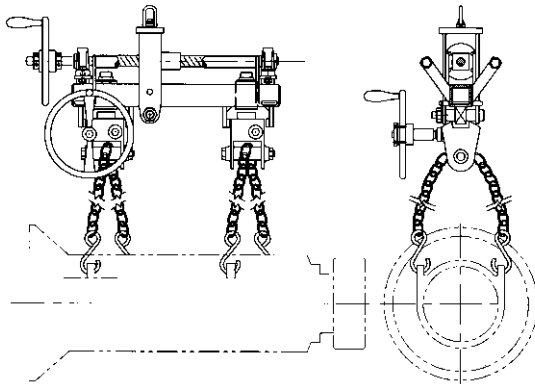




# AUTOMOTIVE TOOLS

BISON has designed and manufactured hundreds of unique tools used for automotive assembly and part production. All of our equipment is designed and certified, by a Professional Engineer, to meet or exceed local regulations as well as the ASME/ANSI Standard for Below-the-Hook Lifting Devices. As well, they conform to the stringent General Motors specifications. Some of our automotive customers are: General Motors, Toyota, Honda, Cami, DaimlerChrysler, Ford, Delphi, Saturn, Magna and Dana.



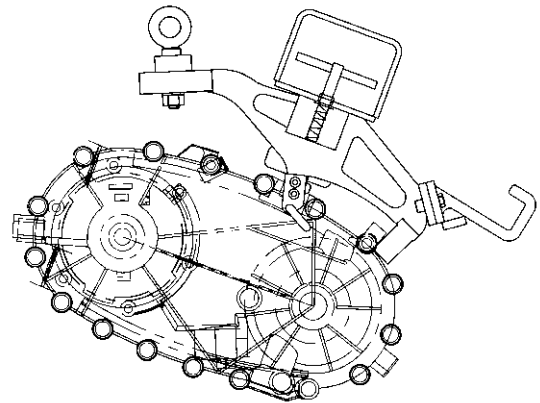
**MECHANICAL ADJUSTABLE TRANSMISSION LIFTER**

## ADJUSTABLE TRANSMISSION LIFTER

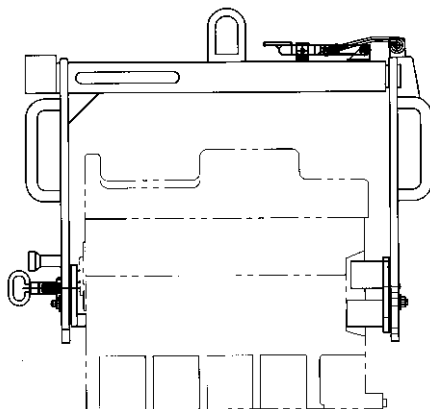
Designed to lift 7 different transmissions. Centre of balance adjustment was provided along with the ability to make fine rotational movements for spline and stud alignment. This tool was used on a vehicle assembly line. No complicated pneumatic or electric components were used.

## TRANSFER CASE LIFTER

Designed to lift 2 different transfer cases on a vehicle assembly line. The lift eye is positioned to provide the exact assembly angle for bolt up. The integrated hook, at the rear of the tool, allows secondary use as a dunnage tray lift device.



**TRANSFER CASE LIFTER**



**ENGINE BLOCK ROTATOR LIFTER**

## ENGINE BLOCK LIFT AND ROTATE DEVICE

Designed to lift and rotate an engine block. Exact positioning of the axis of rotation, at the center of gravity, allows almost effortless turning of the block with no "runaway". Overcentre clamps have latches for added security. Rotation can be locked in any specified position using a BISON designed, heavy duty, spring retaining pin. This concept has also been applied to cylinder heads and other components.