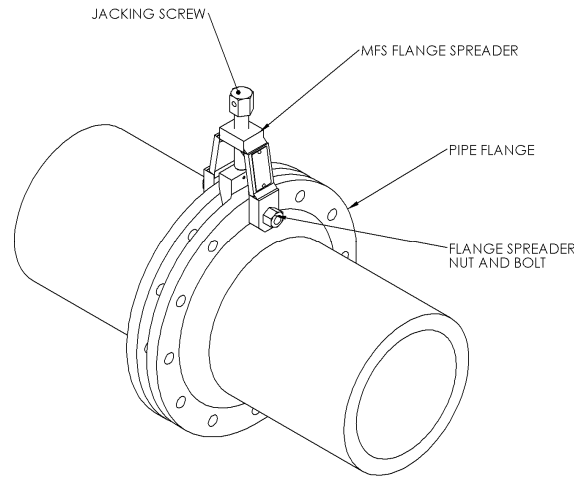


MFS MECHANICAL FLANGE SPREADERS
OPERATING INSTRUCTIONS.

1. Ensure pipeline flange is safe to work on.
2. Loosen all bolts in the flange and remove at least one completely. Note that in some cases it is necessary to remove all bolts depending on the nature of the work being carried out, but it is often beneficial to leave 1 or 2 in place to assist with re-alignment. Consult qualified personnel to determine the appropriate procedure.
3. Align the MFS flange spreader with the empty bolt hole and fit the flange spreader nut and bolt through the flange and tool as shown in the diagram. It may be necessary to turn the jacking screw anticlockwise to achieve this.
4. Align the tapered sides of the wedge with the gap in the flange and screw the jacking screw clockwise until the sides of the wedge contact the flange faces.
5. It is beneficial to lubricate the faces of the wedge if permissible in the work area to reduce the effort required.
6. Using a suitable spanner or Tommy bar turn the jacking screw clockwise to force the joint apart.
7. If two or more flange spreaders are being used they should be spaced evenly around the joint.
8. Do not force the wedge into the joint beyond the tapered faces as this has no beneficial effect and can make the tool hard to remove.
9. To withdraw the tool from the joint, rotate the jacking screw anticlockwise until the tool is loose and the nut and bolt can be removed.