## Nutcracker

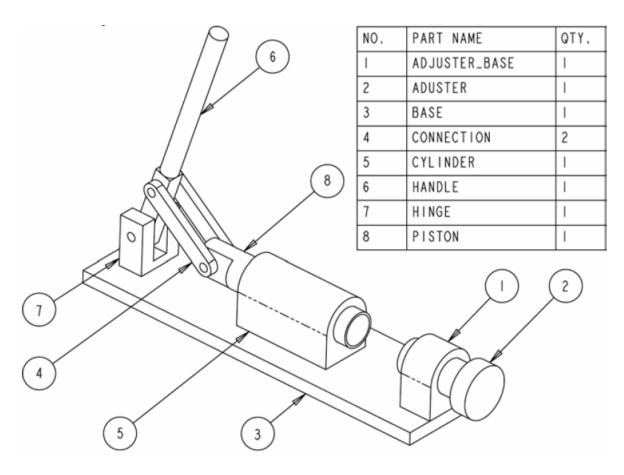


Figure 1. Nutcracker Mechanism Assembly.

The assembly consists of eight different parts:

- 1. base,
- 2. cylinder,
- 3. hinge,
- 4. piston,
- 5. adjuster\_base,
- 6. adjuster,
- 7. connection,
- 8. handle.

Notice in *Figure 1*. the connection linkage that exists from the handle through the connection part through to the piston part. The mechanism joints defining these parts only constrain each component within the degrees of freedom required by the design. Within this assembly, the handle can be moved which in turn will move the piston.

There will be two instances of the connection part. When modeling each part, pay careful attention to the locations of your sketch planes. For proper assembly of the mechanism, your sketch planes should match the planes represented in each part's drawing. Drawings can be found in *Figure 2*.

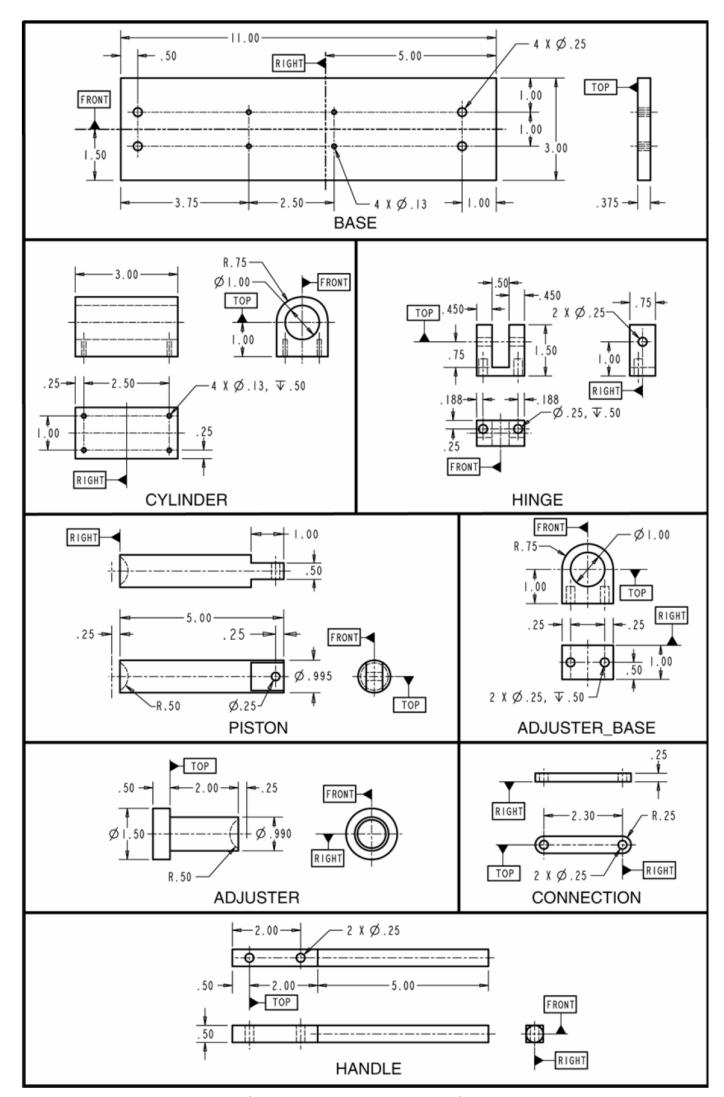


Figure 2. Assembly Parts Drawing.