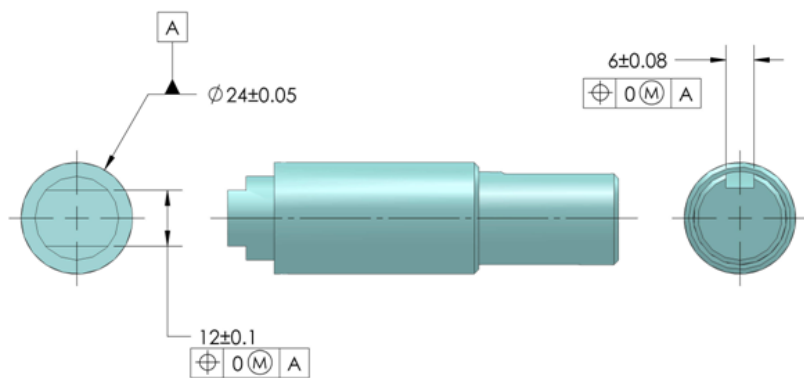


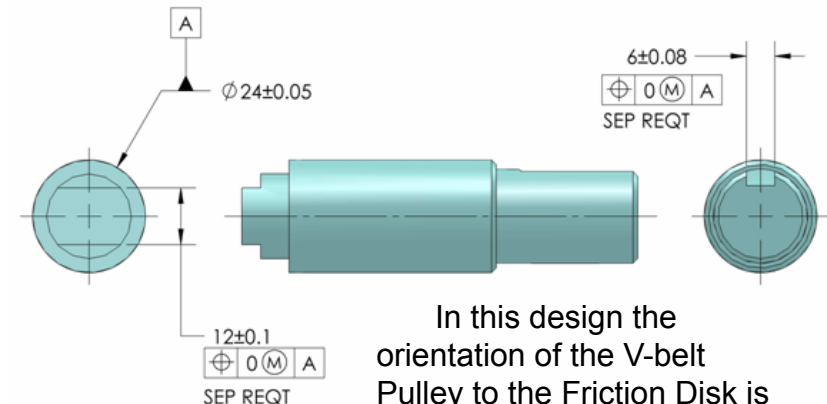
## Simultaneous Requirements [4.19]

The rule of simultaneous requirements in the past has not been well understood. Where features or patterns of features reference the same datum features in the same order of precedence with the same modifiers, the features are considered to be a pattern. These features must be within their position and/or profile of a surface tolerances simultaneously.

There are designs where this rule is needed and other designs where it is not. This rule can be very restrictive. Where this rule needs to be overridden, the abbreviation SEP REQT should be added to any affected geometric tolerances. Below are two applications for the shaft.



In this design the orientation of the Timing Gear to the Cam is critical. The simultaneous requirements rule is appropriate. Therefore, the keyseat and the pair of flats must be oriented as shown on the drawing.



In this design the orientation of the V-belt Pulley to the Friction Disk is not critical. To override the simultaneous requirements rule the abbreviation SEP REQT is added to the two position tolerances. The shaft shown below may be acceptable even though the keyseat is not oriented relative to the pair of flats.

