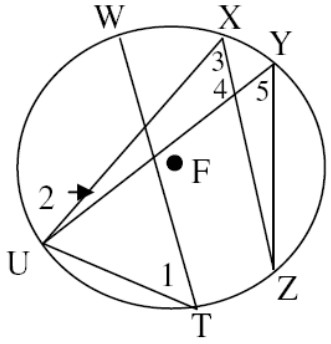
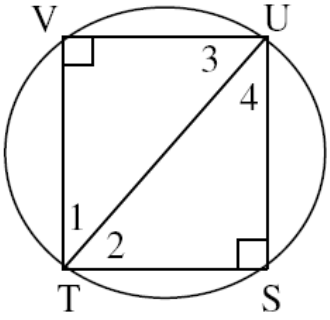
Name: _____

Inscribed Angles and Their Measures

Exercise 1: Given a circle of center F, $mWX = 20^0, mXY = 40^0, mUZ = 108^0$ and $mUW = mYZ$. Find the measures of the numbered angles.



Exercise 2: Triangles TVU and TSU are inscribed in the circle of center *P* with $\overline{VU} \cong \overline{SU}$. Find the measure of each numbered angle if $m\angle 2 = x + 9$ and $m\angle 4 = 2x + 6$.



Exercise 3: Quadrilateral QRST is inscribed in the circle of center M. If $m\angle Q = 87^0$ and $m\angle R = 102^0$. Find $m\angle S$ and $m\angle T$.

Exercise 4: Quadrilateral *MATH* is inscribed in a circle of center *R*. Show that the opposite angles of the quadrilateral are supplementary.