**Formative Assessment #22** – Degrees, Radians and Arc Length

**T1.1: I can express the measure of an angle in radians (exact value or decimal approximation), given its measure in degrees.**

1. a) Convert 110° to radians. Express your answer as a radian fraction.

   b) Convert -327° to radians. Express your answer as a radian decimal rounded to the nearest hundredth.

**T1.2: I can express the measure of an angle in degrees, given its measure in radians (exact value or decimal approximation).**

2. a) Convert -4.12 to degrees. Express your answer to the nearest tenth of a degree.

   b) Convert $\frac{9\pi}{5}$ to degrees. Express your answer to the nearest degree.

**T1.3: I can solve problems based upon the relationship between $\theta$, $a$, and $r$.**

3. A pendulum swings through an angle of 65°. Given an arc length of 28.4 cm, determine the length, L, of the pendulum. Round your answer to the nearest tenth of a centimeter.