Practice Problems Name:

ASSESSMENT **Sine & Cosine CoFunction Relationship** **G.SRT.7**

1. Which of the following is equal to cos 35°

A) sin 35° B) cos 55° C) sin 55° D) cos 145°

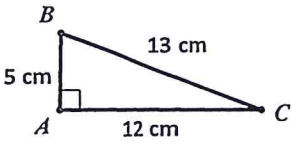
2. Which of the following is equal to sin 8°

A) sin 82° B) cos 8° C) cos 82° D) sin 98°

3. Which of the following statements is false?

A) sin 45° = cos 45° B) sin 30° = cos 30° C) cos 10° = sin 80° D) sin 0° = cos 90°

4. Given the ratio $\frac{12}{13}$, which of the following is NOT equal to this value?



A) sin $\angle B$ B) cos $\angle C$ C) $\frac{AC}{BC}$ D) sin $\angle C$

5. If cos θ = sin β then which of the following must be true?

A) $\theta + \beta = 180°$ B) $\theta - \beta = 90°$ C) $\beta = 90° - \theta$ D) $\beta - \theta = 90°$

6. Solve the following.

a) sin 27° = cos _____° b) cos 55° = sin _____° c) sin 17.8° = cos _____°

d) cos 90° = sin _____° e) cos 45° = sin _____° f) sin $62\frac{2}{3}°$ = cos _____°

7. Solve for the unknown.

a) sin $(2x + 1°) = \cos(22°)$ b) sin $(5x + 15°) = \cos(4x - 6°)$ c) sin $(2x) = \cos(x)$

d) sin $(\frac{1}{2}x) = \cos(\frac{5}{2}x + 12)$ e) sin $(7x + 15°) = \cos(3x + 40°)$ f) sin $(\frac{1}{3}x + 2) = \cos(53°)$

8. Explain WHY sin 20° = 0.342 and the cos 70° = 0.342.