

Name: _____

MA 2320: Trig Review

1. Compute the following without a calculator.

- (a) $\sin(0)$
- (b) $\cos(0)$
- (c) $\cos(\pi/2)$
- (d) $\sin(\pi/4)$
- (e) $\sin(3\pi/4)$
- (f) $\sin(13\pi/4)$
- (g) $\cos(5\pi/3)$
- (h) $\tan(5\pi/6)$
- (i) $\tan(3\pi/6)$

2. For the following, find all solutions in $[0, 2\pi]$.

- (a) $\sin^{-1}(1)$
- (b) $\cos^{-1}(1/2)$
- (c) $\tan^{-1}(-\sqrt{3})$
- (d) $\sec^{-1}(\sqrt{2})$
- (e) $\tan^{-1}(0)$

3. For the following, find an algebraic expression for the solution.

- (a) $\cos(\sin^{-1}(\frac{x}{1+x}))$
- (b) $\tan(\sec^{-1}(\frac{3}{1+x^2}))$
- (c) $\cos(\tan^{-1}(\frac{y}{x}))$
- (d) $\cos^2(\tan^{-1}(\frac{y}{x})) + \sin^2(\tan^{-1}(\frac{y}{x}))$