

EXTRA TRIG EQUATIONS TO SOLVE – MULTIPLE ANGLE ARGUMENTS

SOLVE EACH EQUATION IN THE INTERVAL $[0, 2\pi)$

1. $10\cos(x) + 2 = -3$

2. $2\sin(x) = 1$

3. $\tan(x) + 1 = 0$

4. $4\cos^2(x) - 10 = -7$

5. $3\tan^2(x) + 1 = 4$

6. $4\cos^2(x) - 2 = 0$ Hint: Both of $\sqrt{\frac{2}{4}}$ and $\sqrt{\frac{1}{2}}$ are equal to $\frac{\sqrt{2}}{2}$

7. $3\tan(x) - 1 = 0$

8. $2\cos(x) = 1$

9. $2\sin(x) + 5\sqrt{3} = 4\sqrt{3}$

10. $\tan^2(x) - 3 = 0$

11. $2\sin(x) + \sqrt{2} = 0$