PRACTICE $\delta - \varepsilon$ PROOFS

VERIFY EACH OF THE FOLOWING LIMIT STATEMENTS USING A $\delta - \varepsilon$ PROOF, AS DEMONSRATED IN THE VIDEO LESSONS.

1. $\lim_{x \to 4} (3x + 1) = 13$
2. $\lim_{x \to 1} (5x - 7) = -2$
3. $\lim_{x \to (-3)} (-2x + 4) = 10$
4. $\lim_{x \to 0} (7x - 6) = -6$
5. $\lim_{x \to 6} \left(\frac{1}{3} x - 5 \right) = -3$
6. $\lim_{x \to \left(\frac{1}{4}\right)} (8x + 1) = 3$
7. $\lim_{x \to (-4)} (-2x - 13) = -5$
8. $\lim_{x \to (-5)} (-x + 2) = 7$
9. $\lim_{x \to a} (mx) = (ma) \qquad a \neq 0$