

Limits Definition Practice

Prove each of the following limit using the $\varepsilon - \delta$ definition.

1. $\lim_{x \rightarrow 4} (3x - 2) = 10$

2. $\lim_{x \rightarrow -\frac{1}{3}} (\frac{3}{8}x - 5) = -\frac{7}{2}$

3. $\lim_{x \rightarrow -\frac{1}{4}} (1 - 4x) = 7$

4. $\lim_{x \rightarrow -6} (2x + 10) = 22$