

Find the value of each limit.

1. $\lim_{x \rightarrow \infty} \frac{5x^{5/2} - 7x}{x^2 + 10x}$

6. $\lim_{x \rightarrow \infty} \frac{7x^3 - 2x}{4x^3 + 1}$

2. $\lim_{x \rightarrow \infty} \frac{\sqrt{x}}{x+1}$

7. $\lim_{x \rightarrow \infty} \frac{6x-1}{2x+3}$

3. $\lim_{x \rightarrow \infty} \frac{5x}{x^{1/2} - 3}$

8. $\lim_{x \rightarrow \infty} \frac{x^3 + 5x^2 - x + 23}{18x^2}$

4. $\lim_{x \rightarrow \infty} \frac{2x^2 - x + 1}{19x - 2}$

9. $\lim_{x \rightarrow \infty} \frac{-2x^9 - 200x}{17x^3 + x^6}$

5. $\lim_{x \rightarrow \infty} \frac{5 - 7x^3}{8 + 15x^5}$

10. $\lim_{x \rightarrow \infty} -35x^6 + x^4$