Formative Assessment #25 – Behavior Near Asymptotes

C5.9: I can determine asymptotic and end behavior of a function using limits.

1. Find the following limit using the process in Example 2 on page 217.

 $\lim_{x \to \infty} \frac{4 - x}{x^3 - 1}$

2. Find all horizontal and all vertical asymptotes on the graph of $f(x) = \frac{(2x-1)^2}{x^2-1}$.

Justify your answers using limits.