Limits and Continuity

Question

If

$$f(x, mx) = \frac{mx}{x^3 + m^3}, \qquad g(x, mx) = \frac{m(x+1)}{1 + mx},$$

and

$$h(x, mx) = \frac{x^2 + 2x}{2x^2 + x},$$

then which limit can you conclude must NOT exist?

A. $\lim_{(x,y)\to(0,0)} f(x, y)$

B. $\lim_{(x,y)\to(0,0)} g(x, y)$

C. $\lim_{(x,y)\to(0,0)} h(x, y)$

D. There is not enough information to decide.