

DERIVATIVES

BLAKE FARMAN

Lafayette College

Name: _____

In each of the following problems, use the **limit definition**

$$f'(x) = \lim_{h \rightarrow 0} \frac{f(x+h) - f(x)}{h}$$

to compute the derivative of the given function.

1. $f(x) = \frac{x+3}{x+5}$

2. $f(x) = \sqrt{9 - x}$