

MATH 101-08 (082)
QUIZ # 7

NAME: ID #:

Q1. Given

$$f(x) = \frac{(x-1)(x+2)}{(x-3)^2}$$

$$f'(x) = \frac{1-7x}{(x-3)^3}$$

$$f''(x) = \frac{2(7x+9)}{(x-3)^4}$$

find the intervals on which $f(x)$ is increasing, decreasing, concave up, or concave down, also find all local maximum, local minimum, and inflection points.