

2. [14 points] The table for the *derivative* of a function h with continuous first derivative is given below. Assume that between each consecutive value of x , the derivative h' is either increasing or decreasing. For each statement below, indicate whether the statement is true, false, or cannot be determined from the information given. No partial credit will be given.

x	-4	-3	-2	-1	0	1	2	3	4
$h'(x)$	2	3	1	-3	-4	-2	0	2	1

- a.) The function h has a local maximum on the interval $-2 < x < -1$.

True False Not enough information

- b.) The function h is negative on the interval $-1 < x < 1$.

True False Not enough information

- c.) The function h is concave up on the interval $0 < x < 4$.

True False Not enough information

- d.) The function h is decreasing on the interval $-3 < x < -2$.

True False Not enough information

- e.) The function h has an inflection point on the interval $-1 < x < 1$.

True False Not enough information

- f.) The derivative function, h' , has a critical point at $x = 2$.

True False Not enough information

- g.) The second derivative function, h'' , is positive on the interval $0 < x < 3$.

True False Not enough information