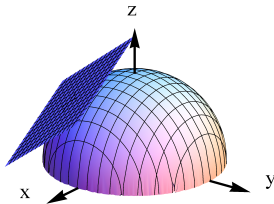# Tangent Planes and Linear Approximation

Question

The figure shows the graph of $f(x, y)$ together with its tangent plane at $(1, -1, \sqrt{2})$. What are the signs of the partial derivatives of f at $(1, -1)$?

A. $f_x(1, -1) < 0$, $f_y(1, -1) < 0$

B. $f_x(1, -1) > 0$, $f_y(1, -1) < 0$

C. $f_x(1, -1) < 0$, $f_y(1, -1) > 0$

D. $f_x(1, -1) > 0$, $f_y(1, -1) > 0$