

Quiz 7 Math 341**Name** _____

Let

$$f(x) = \begin{cases} 1 & \text{if } 0 \leq x \leq 1 \\ 2 & \text{if } 1 < x \leq 2 \end{cases}$$

(a) Using the partition $P = \{0, 1 - \sigma, 1 + \sigma, 2\}$ (for σ with $0 < \sigma < 1$), calculate the values $M_k, k = 1, 2, 3$ and $m_k, k = 1, 2, 3$ for the associated intervals.

(b) Calculate $U(F; P)$ and $L(f, p)$