## $QUIZ\sharp 1$ Math 102-sec 32

## Net Time Allowed: 20 minutes

Name: ID  $\sharp$ : Serial  $\sharp$ :

(Justify clearly your answer!)

Exercise1:(05 points)

Find 
$$\lim_{n \to \infty} \sum_{k=1}^{n} \left( \frac{2}{n} + \frac{3k}{n^2} \right)$$

Exercise2: (05 points)
Evaluate  $I = \lim_{t \to 0^+} \frac{d}{dt} \int_1^{\sqrt{t}} \frac{\sin x^2}{x} dx$ .