

Q(5) Use L' Hopital's Rule to evaluate $\lim_{x \rightarrow -\infty} \frac{x^2}{e^{1-x}}$

gts $\frac{\infty}{\infty}$ form as $x \rightarrow -\infty$

$$\lim_{x \rightarrow -\infty} \frac{x^2}{e^{1-x}} = \lim_{x \rightarrow -\infty} \frac{2x}{e^{1-x}} = \lim_{x \rightarrow -\infty} \frac{2}{e^{1-x}} = 0$$

$$= 0$$