

f) MW pyridine = 130.65 g/mol

- need answer from part e to solve ...

Ratio: $\frac{A^-}{HA} = 1.86$, given: ~~0.100~~ [HA] = 0.100 M

$\therefore [A^-] = 1.86 [HA] = 1.86 (0.100 M)$
 $= 0.186 M$

- Now that we know concentration of pyridine, it's a simple task to determine grams

$$250 \text{ mL} \times \frac{1 \text{ L}}{1000 \text{ mL}} \times \frac{0.186 \text{ mol}}{1 \text{ L}} \times \frac{130.65 \text{ g}}{\text{mol}} = 6.075 \text{ g}$$

need 6.1 g of pyridine