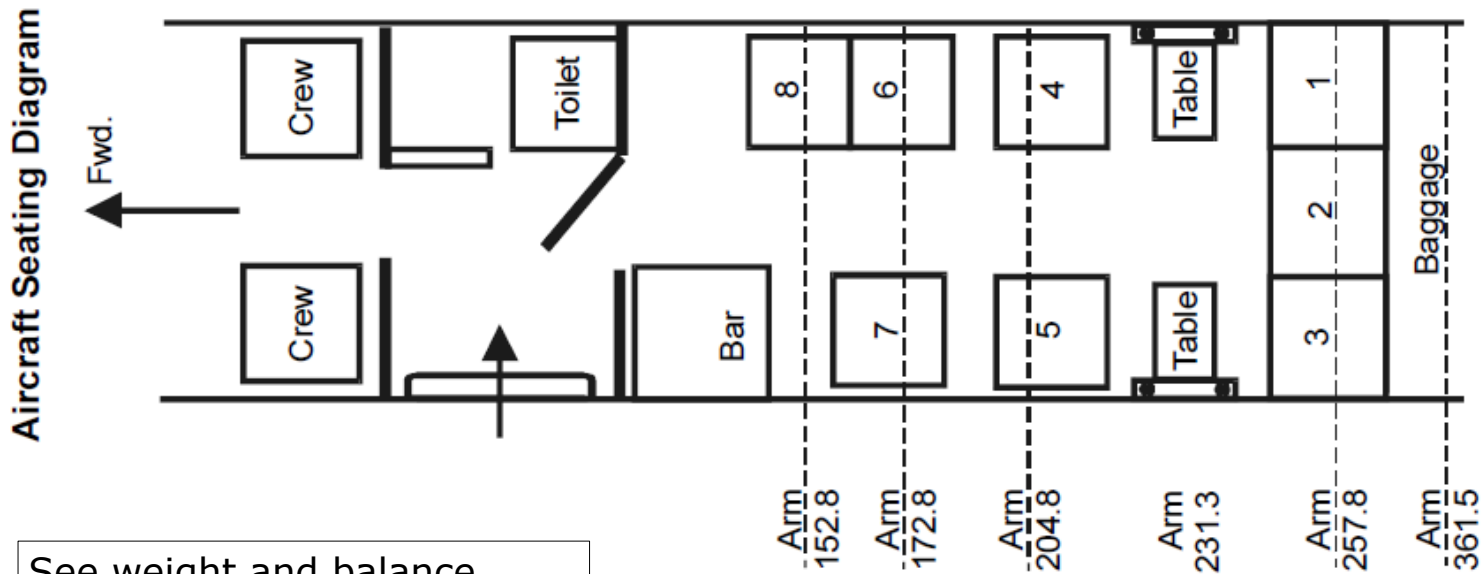


Q35

ATPL Solutions - Effect of Weight Relocation

$$\begin{aligned} \text{Change in CG} &= \frac{\text{mass moved} \times \text{distance moved}}{\text{Total weight on landing}} = \frac{250 \times (172.8 - 257.8)}{15,151} \\ &= -1.403'' \end{aligned}$$



See weight and balance table in published solution for questions 30 to 33

$$\text{CG on landing} = 277.92 - 1.403 = 276.52 = 25.00\% \text{ MAC}$$