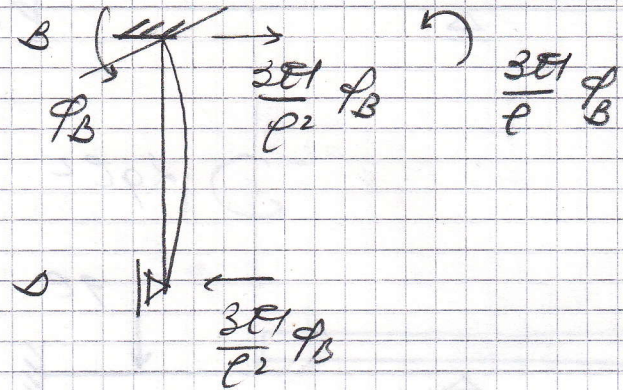
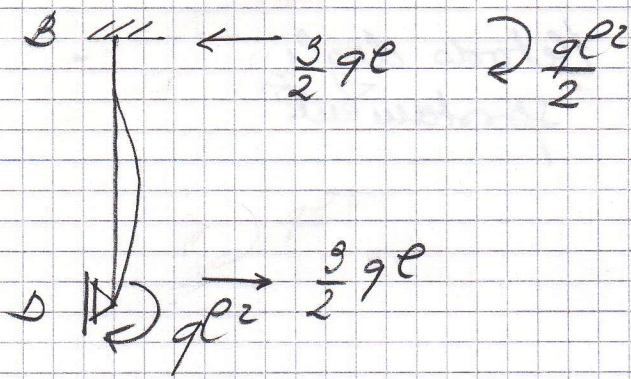


trans BD

(2)



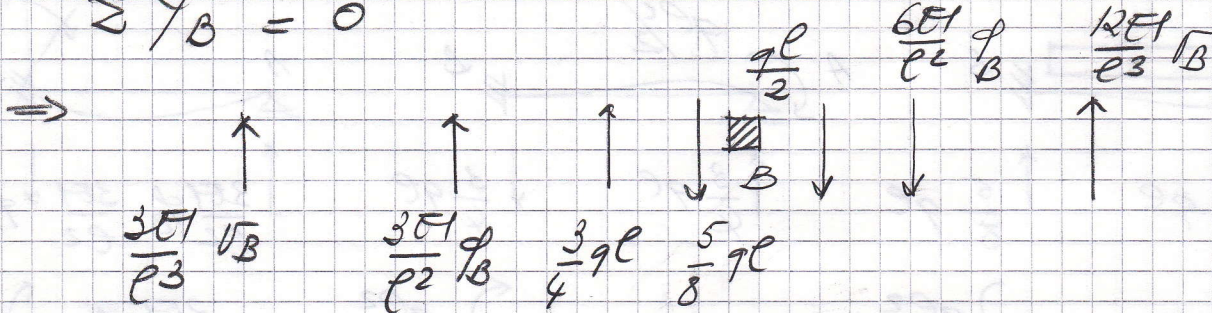
$$\sum M_B = 0$$

$$\Rightarrow \cancel{\frac{ql^2}{8}} - \frac{ql^2}{4} - \frac{3EI}{l} \phi_B - \frac{3EI}{l^2} \phi_B - \cancel{\frac{ql^2}{8}} - \frac{4EI}{l} \phi_B +$$

$$+ \frac{6EI}{l^2} \phi_B + \frac{ql^2}{2} - \frac{3EI}{l} \phi_B = 0$$

$$- 10 \frac{EI}{l} \phi_B + \frac{3EI}{l^2} \phi_B + \frac{ql^2}{4} = 0 \quad *$$

$$\sum \gamma_B = 0$$



$$\frac{3EI}{l^2} \phi_B - \frac{6EI}{l^2} \phi_B + \frac{3EI}{l^3} \phi_B + \frac{12EI}{l^3} \phi_B +$$

$$+ \frac{3}{4} ql - \frac{5}{8} ql - \frac{ql}{2} = 0$$

$$- \frac{3EI}{l^2} \phi_B + 15 \frac{EI}{l^3} \phi_B - \frac{3}{8} ql = 0 \quad *$$

$$\phi_B = \frac{ql^2}{3EI} \left(\frac{15EI}{l^3} \phi_B - \frac{3}{8} ql \right)$$

$$- 10 \frac{EI}{l} \cdot \frac{ql^2}{3EI} \left(\frac{15EI}{l^3} \phi_B - \frac{3}{8} ql \right) + \frac{3EI}{l^2} \phi_B + \frac{ql^2}{4} =$$