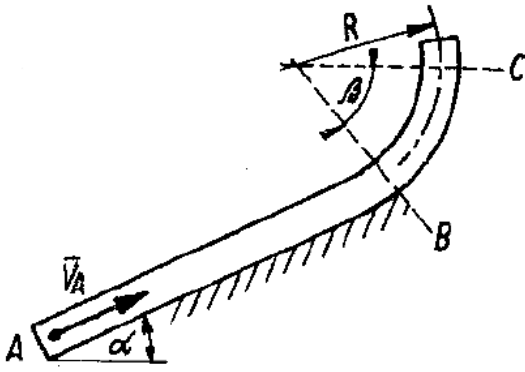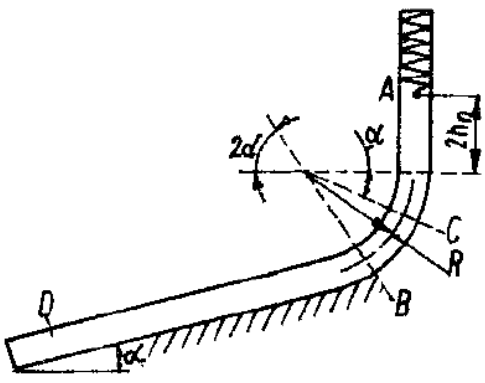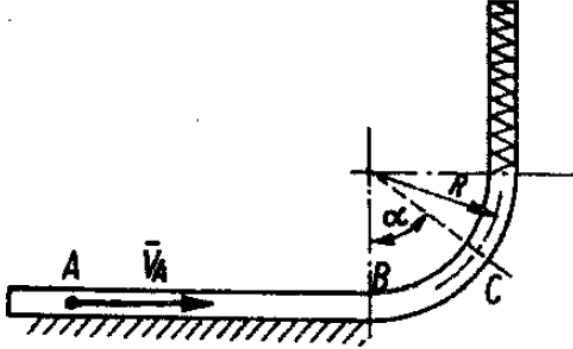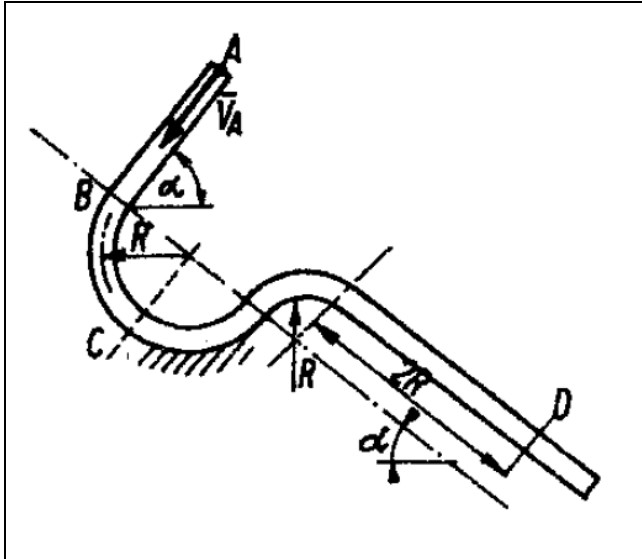The ball, assumed as a material point, moves from position A inside the tube. Find the ball velocity at positions B and C and the pressure of the ball against the wall of the tube at position C. Ignore friction on the curved sections of the tube.

	$m = 0,5\ kg$ $V_A = 20m/s$ $t_{AB} = 2s$ $R = 2m$ $\mu = 0,20$ $\alpha = 30°$ $\beta = 45°$
	$m = 0,4kg$ $V_A = 0m/s$ $t_{BD} = 2s$ $R = 0,2m$ $\mu = 0,15$ $\alpha = 30°$ $h_0 = 10cm$ $k = 1\ N/cm$ $Additionally\ find, V_D$
	$m = 0,2kg$ $V_A = 10m/s$ $t_{BD} = 1s$ $R = 0,5m$ $\mu = 0,1$ $\alpha = 60°$ $k = 1,2\ N/cm$ $Additionally\ find, h$ $how\ much\ spring\ will\ deflect$

$$m = 0,8 \, kg$$
$$V_A = 3m/s$$
$$t_{AB} = 0,2s$$
$$R = 0,4m$$
$$\mu = 0,15$$
$$\alpha = 45°$$
$$Additionally \; find, V_D$$