

Supporting Information

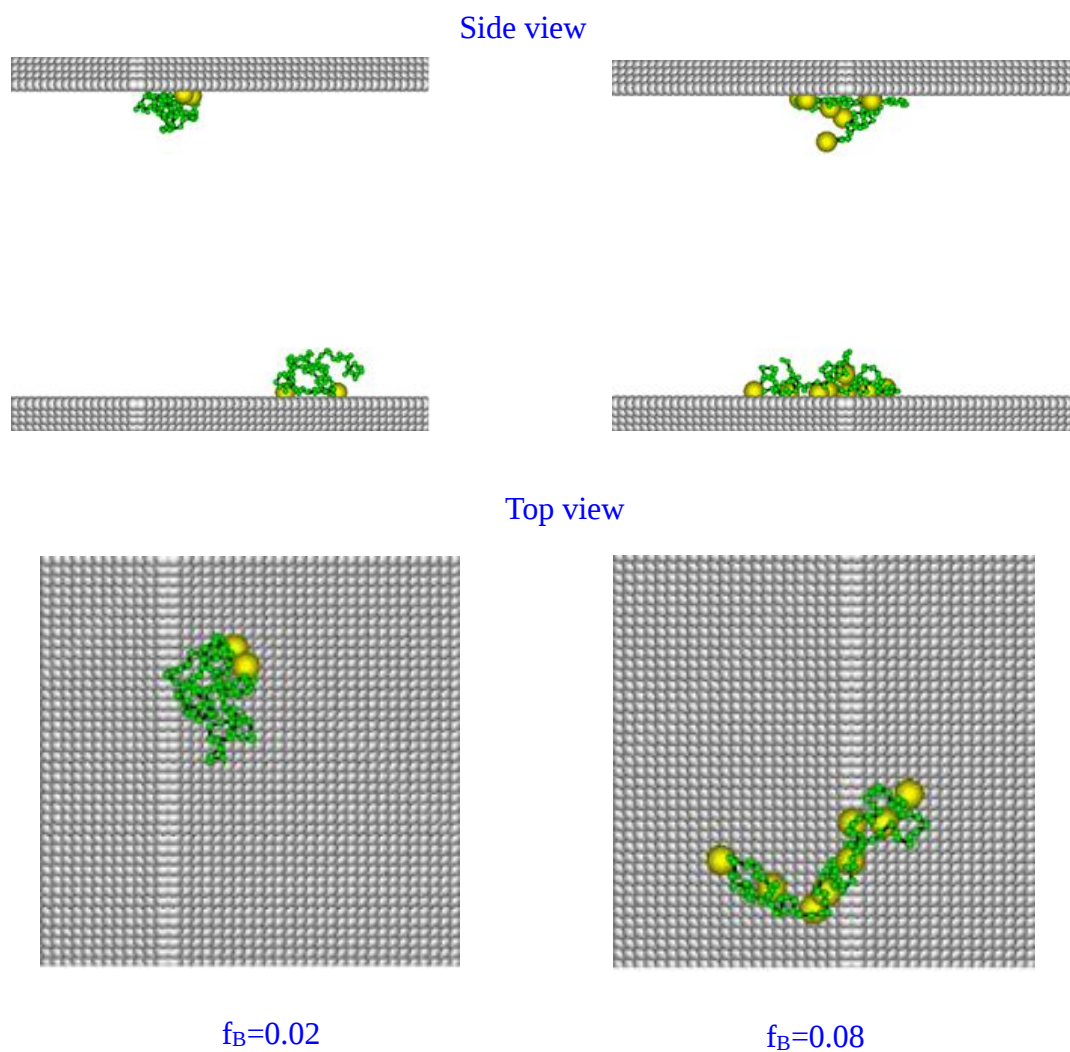
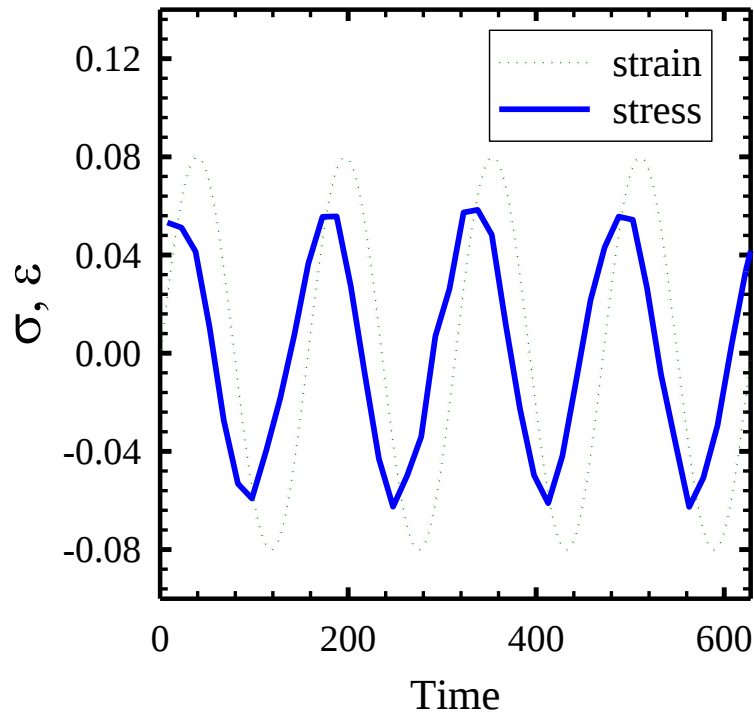


Figure S1. The representative snapshots (side and top views) of $f_B = 0.02$ and 0.08 . The B beads are enlarged for clarity.

(a)



(b)

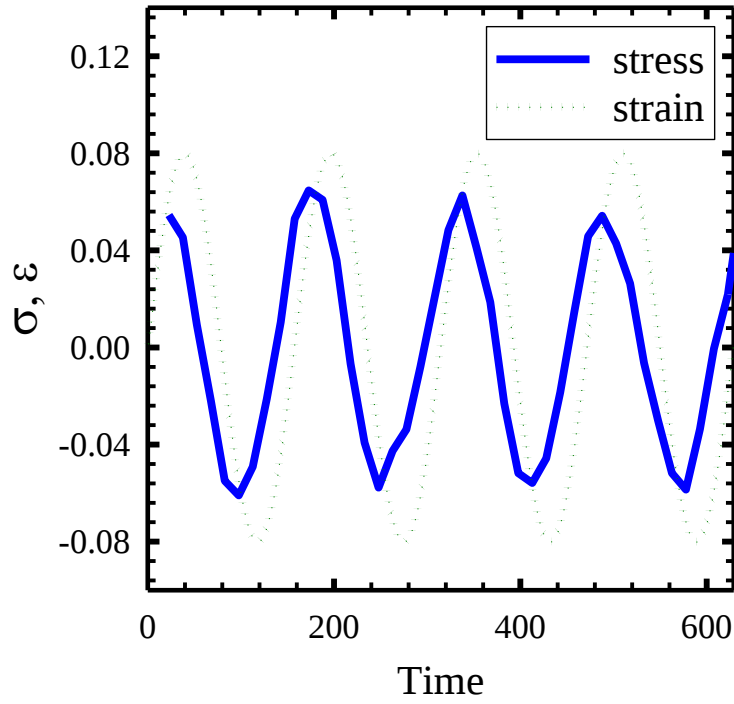


Figure S2. The oscillatory strain (ϵ) and stress (σ) are plotted against time for the frequency $\omega=0.04$ and grafting density $f_B=0.02$ by using the time step (a) 0.01 and (b) 0.005.