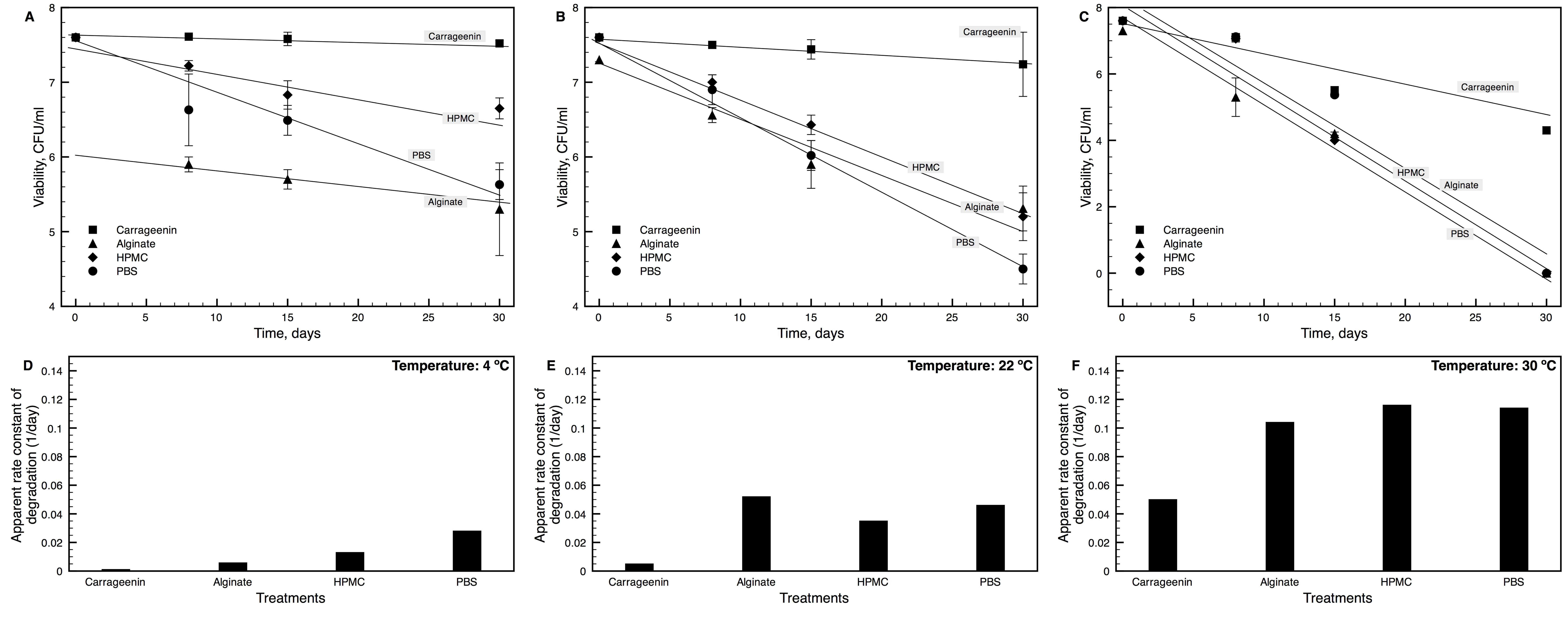
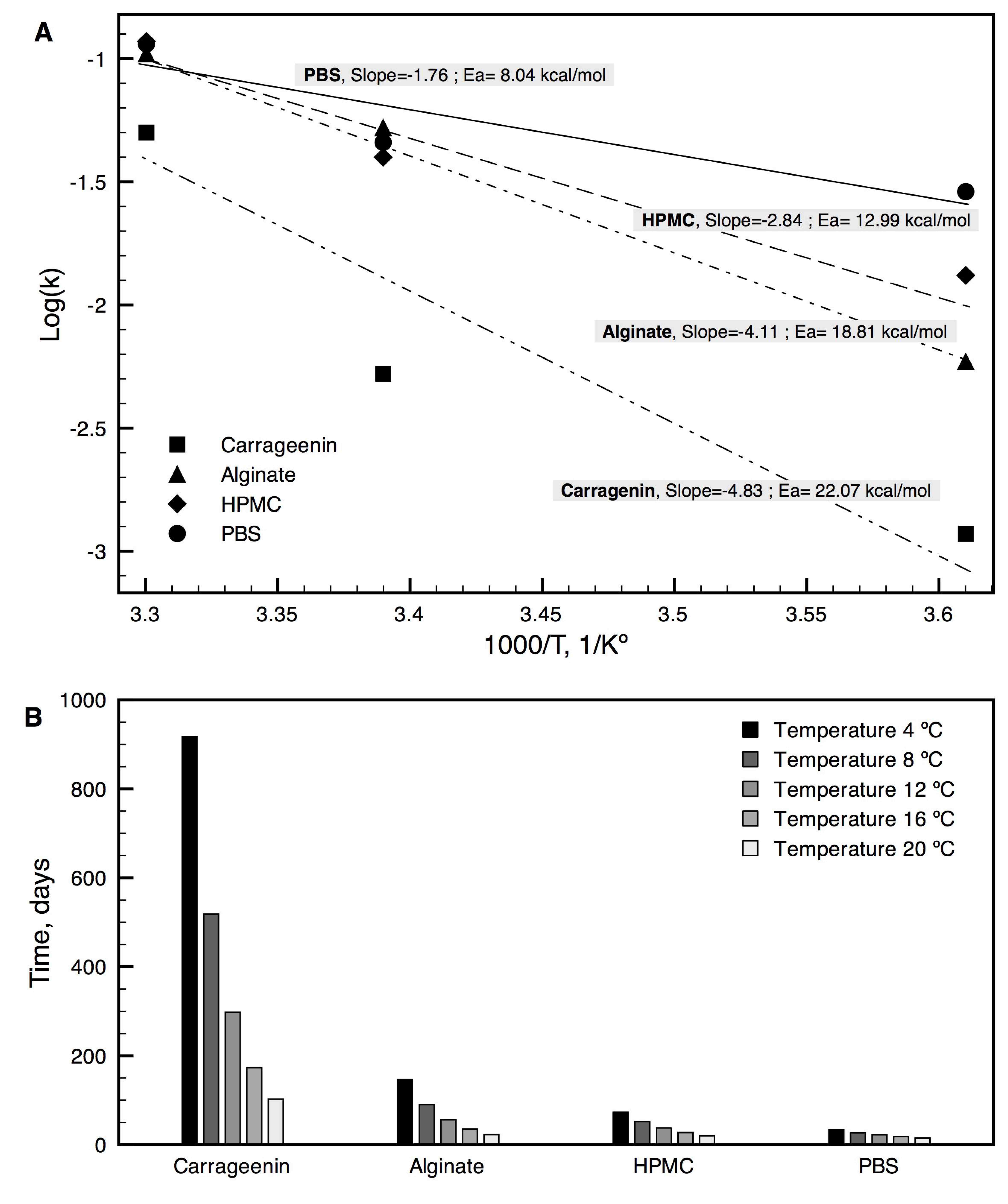
**A thermodynamic study of preservation of *Azotobacter* *chroococcum* vegetative cells in dry polymers**

**- Figures**



**Fig. 1** Apparent first-order kinetics of *A. chroococcum* C26 degradation during the storage at various temperatures. Points in A, B, and C are experimental data as shown by Sorokulova et al. (9), lines are linear regressions for samples preserved in carrageenin, alginate, HPMC, and PBS at A) 4 ºC, B) 22 ºC, and C) 30 ºC. In D, E, and F are shown the apparent rate constant of C26 degradation (k, 1/day) when preserved in carrageenin, alginate, HPMC, and PBS at D) 4 ºC, E) 22 ºC, and F) 30 ºC.



**Fig. 2** A) Arrhenius temperature degradation plot for *A. chroococcum* C26 in carrageenin, alginate, HPMC, and PBS. The linear plots for in carrageenin (■), alginate (▲), HPMC (◆), and PBS (●) were derived from experimental values of the rate constant for thermal degradation (k) at various temperatures. Points are experimental data plotted according to Arrhenius equation shown by Sorokulova et al. (9), lines are linear regressions. B) Data of simulated viability of *A. chroococcum* C26 calculated in basis on the Arrhenius equation using carrageenin, alginate, HPMC, and PBS at 4 ºC, 8 ºC, 12 ºC, 16 ºC, and 20 ºC.