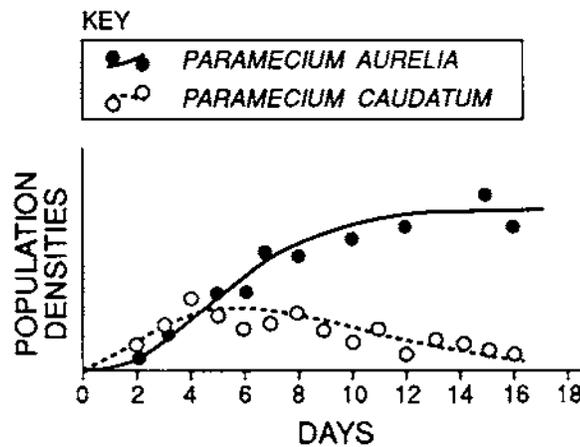


1. In a freshwater pond community, a carp eats decaying material from around the bases of underwater plants, while a snail scrapes algae from the leaves and stems of the same plants. They can survive at the same time because they occupy
- (1) the same niche, but different habitats (3) the same habitat and the same niche
 (2) **the same habitat, but different niches** (4) different habitats and niches
2. Cattails in freshwater swamps in New York State are being replaced by purple loosestrife plants. The two species have very similar environmental requirements. This observation best illustrates
- (1) variation within a species (3) isolation of species populations
 (2) **competition between species** (4) random recombination
3. In a pure culture, *Paramecium caudatum* grew and flourished. In a mixed culture with *P. aurelia*, all *P. caudatum* died within 16 days, while the *P. aurelia* survived. This observation illustrates
- (1) saprophytism (2) gradualism (3) **competition** (4) evolution
4. Two different species of insect-eating birds feed and nest at different levels in the same evergreen tree. In this way they *avoid*
- (1) predators (2) parasites (3) succession (4) **competition**
5. Two different species with the same ecological niche are placed in the same habitat. These two species will most likely
- (1) have different food requirements (3) coexist successfully in the same habitat
 (2) **compete for the same environmental resources** (4) interbreed and produce hybrid offspring
6. The graph below shows the rates of growth of populations of *Paramecium aurelia* and *Paramecium caudatum* when cultured together.



The results observed are most likely caused by

- (1) lack of water (3) **competition**
 (2) reduced enzyme activity (4) commensalism

7. Competition between the members of a woodchuck population in a large field could be expected to increase as a result of an increase in the
- (1) **woodchuck reproduction rate** (3) number of woodchucks killed by cars
 (2) spread of disease among the woodchucks (4) number of secondary consumers