

ES 10 Lectures March 21 and 23 2001
Biodiversity and Biogeography

Reading B&K Ch 12
Web site with tule elk information-- <http://www.nps.gov/pore/resources/natural/elk.htm>

Lecture Topics:

1. Biodiversity—genetic, species, community
2. Population growth models—exponential, logistic, logistic with time lag
3. Minimum Viable Population (MVP) and Minimum Dynamic Habitat (MDA)
4. Biogeography, present and past distribution of organisms
5. Conservation of species diversity, case study of Tule elk

Some species names likely to be used in lectures

Animals

- Bos taurus* cow
Canis latrans coyote
Cervus elaphus nanus tule elk
Felis concolor mountain lion
Homo sapiens human
Microtus californicus meadow vole
Ovis canadensis bighorn sheep
Odocoileus hemionus columbianus black-tailed deer
Panthera leo African lion

Plants

- Avena barbata* wild oats
Baccharis pilularis coyote brush
Erodium botrys filaree
Lolium multiflorum annual ryegrass
Lupinus arboreus bush lupine
Nassella pulchra purple needlegrass
Toxicodendron diversilobum poison oak

