

PROVISIONAL DISCUSSION READINGS (subject to change):

- Week 1:** NO DISCUSSION SECTION FIRST WEEK
- Week 2:** Gould, S.J. and R. Lewontin (1979) The spandrels of San Marco and the Panglossian paradigm: a critique of the adaptationist programme. *Proc. Royal Soc. Lon. B* 205:581-598.
AND
Gronquist, M., A. Bezzerides, A. Attygalle, J. Meinwald, M. Eisner, and T. Eisner (2001) Attractive and defensive functions of the ultraviolet pigments of a flower (*Hypericum calycinum*) *Proc. Natl. Acad. Sci. USA* 98:13745–13750.
- Week 3:** TBD
- Week 4:** Jeffery, W.R. (2005) Adaptive evolution of eye degeneration in the Mexican blind cavefish. *J. Hered.* 96:185-196.
- Week 5:** Schlenke, T.A. and D.J. Begun (2004) Strong selective sweep associated with a transposon insertion in *Drosophila simulans*. *Proc. Natl. Acad. Sci. USA* 101:1626-1631.
AND
Daborn, P.J. *et al.* (2002) A single P450 allele associated with insecticide resistance in *Drosophila*. *Science* 297:2253-2256.
- Week 6:** A cool tradeoff paper – TBD.
- Week 7:** Basic mapping paper – TBD.
- Week 8:** A cool QTL mapping paper – TBD.

SPRING BREAK

- Week 9:** A cool GWAS paper – TBD.
- Week 10:** Jordan, M.A. and H.L. Snell (2008) Historical fragmentation of islands and genetic drift in populations of Galápagos lava lizards (*Microlophus albemarlensis* complex). *Mol. Ecol.* 17:1224-1237.
- Week 11:** Nachman, M., H.E. Hoekstra and S.L. D’Agostino (2003) The genetic basis of adaptive melanism in pocket mice. *Proc. Natl. Acad. Sci. USA* 100:5268-5273.

- Week 12:** Feder, J.L. *et al.* (2003) Allopatric genetic origins for sympatric host-plant shifts and race formation in *Rhagoletis*. *Proc. Natl. Acad. Sci. USA* 100:10314-10319.
AND
Filchak, K.E., J.B. Roethele and J.L. Feder (2000) Natural selection and sympatric divergence in the apple maggot *Rhagoletis pomonella*. *Nature* 407:739-742.
- Week 13:** Dybdahl, M. and C. Lively (1998) Host-parasite coevolution: evidence for rare advantage and time-lagged selection in a natural population. *Evolution* 52:1057-1066.
AND
Schlenke, T.A. and D.J. Begun (2003) Natural selection drives *Drosophila* immune system evolution. *Genetics*. 164:1471-80.
- Week 14:** Bowen, B.W. (1999) Preserving genes, species, or ecosystems? Healing the fractured foundations of conservation policy. *Mol. Ecol.* 8:S5-S10.
AND
Miller, M.P., Susan M. Haig and R.S. Wagner (2006) Phylogeography and Spatial Genetic Structure of the Southern Torrent Salamander: Implications for Conservation and Management. *J. Hered.* 97:561-570.