



Apr 8th, 2:35 PM - 3:35 PM

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Sawyer, Kristina; Balser, Faculty Advisor, Elizabeth; and Siddon, Faculty Advisor, Christopher, "The Effect of Predation on the Fecundity of Two Subtidal Snails with Differing Reproductive Strategies" (2006). *John Wesley Powell Student Research Conference*. 8.
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Poster Presentation P66

**THE EFFECT OF PREDATION ON THE FECUNDITY OF TWO SUBTIDAL
SNAILS WITH DIFFERING REPRODUCTIVE STRATEGIES**

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A great deal of diversity exists in reproductive strategies among gastropod snails. These animals exhibit a variety of reproductive methods including broadcast spawning, release of planktonic larvae, and encapsulation of eggs. Females of *Fusitriton oregonensis* lay a flat round egg mass that they then guard against potential predators for 7-8 weeks until the eggs hatch as free-swimming veliger larvae. Crawl-away juveniles of *Neptunea lyrata* hatch 8-12 months after laying from a tall cylindrical egg mass that is not guarded. I tested the effects of predation by urchins (*Strongylocentrotus droebachiensis*), and two sea star species (*Evasterias trochellii* and *Pycnopodia helianthoides*) on these two different egg cases. I exposed egg cases of *F. oregonensis* to the predators both with the adult snails present and with them experimentally removed. I found that none of the predators consumed any of the guarded egg cases. The urchins, however, had a significant impact on the unguarded egg cases. I performed the same experiment with the naturally unguarded egg cases of *N. lyrata*. None of the predators consumed any of the egg cases in this experiment. Clearly, the guarding behavior of *Fusitriton oregonensis* was an important aspect of their reproduction, whereas the egg cases of *Neptunea lyrata* were likely protected by other methods.