

eggVar_Procedure

This is a step by step protocol to conduct an experiment in the *Tribolium* system to get at individual variation in egg laying. The goal is to get at the distribution of egg laying at the individual level, mainly, how many eggs an individual can lay in 24 hours.

Prep Info

Materials

- Large and small metal beetle bowls
- Paintbrush
- Petri dish
- Sieve
- 400 square plastic containers
- 4 Stock Containers
- 2 kg of media
- Metal scoop
- Labeling tape
- 50 microcentrifuge tubes

Experimental Container Prep

1. Place a piece of labeling tape on each container, using a different color for each group (A-D)
2. For each label include the following:
 - + Unique ID - Letter/Number Combo (e.g. A1, A2, etc.)
 - + Date
 - + Initials
3. Place 5 grams of media into each container (or just a single scoop)

Seeding Info

1. For each stock container, place 100 beetles into each (A-D)
 - 400 beetles total
2. Allow beetles 6 hours to mate
3. Transfer each individual into its own container
 - Make sure those from container A go into the A boxes and so on
4. Allow beetles 24 hours to lay eggs
5. Remove beetles after they lay eggs
 - Store 50 beetles, from a single group, in individual microcentrifuge tubes with unique ID (this is in case we need to sex them)

Census

1. Take each box and sieve out beetles
2. Count the beetles in the box and place them into a tared petri dish
3. Weigh the beetles
4. Record the number of beetles and the weight for each box