Pellet Dispenser for Small Laboratory Animal Cages

Title: Pellet Dispenser for Small Laboratory Animal Cages

Invention: This invention is a timed pellet feeder designed to deliver drug pellets inside a cage. It is comprised of an ejector controlled by a timing module connected to a computer, a pellet hopper, and a feedback unit.

Background: Route administration is one of the main challenges in evaluating pharmacological agents for therapeutic efficacy. Traditional methods require administering compounds intra-peritoneally in small animals. Unfortunately, repeated injection can cause stress, callusing at the injection site and increased resources for this manual labor. The invention presented here solves this issue by scheduling oral delivery of drug pellet administration.

Applications:
- Animal models
- Laboratory equipment
- Pharmaceuticals

Advantages:
- Reduces research costs
- Improves translational validity by simulating prescription schedules and oral administration
- Feedback system can alert for errors

Licensing Manager:
Rakhi Gibbons
Rakhig@tla.arizona.edu
(520) 626-6695

The University of Arizona, Tucson, Arizona
Inventors

Jonathan Lifshitz
Associate professor, Child Health

Bret Tallent
UA Associate, Child health

Addison Wessel
High school student volunteer, Child Health Phx

Loren Matthew Law
UA Associate