# Tips for "Mr. Good Egg Farmer" Simulation Exercise

#### Content

This exercise demonstrates the effectiveness of a rollover protective structure (ROPS) and seat belt on a farm tractor. Two scale model tractors, one with a ROPS and one without, are used in the demonstration. The tractor drivers are simulated by raw hens' eggs placed on the model tractor seats. The model tractors are then overturned. The "Mr. Good Egg Farmer" on the tractor without a ROPS is crushed during the overturn. The "Mr. Good Egg Farmer" seated and belted on the tractor with the ROPS remains unharmed during the overturn.

## Objectives

Based upon their participation in this demonstration, farm adults, farm youth, and others should:

- Observe and describe what happens to the unbelted tractor operators during overturns of model tractors without ROPS
- Observe and describe how and why the model tractor with a ROPS and seat belt protects the tractor operator from injury during an overturn
- Evaluate the relatively small cost of a ROPS and seat belt compared to the huge cost of a tractor overturn injury or fatality
- Develop favorable attitudes toward ROPS and seat belts and appreciate their potential for:
  - $\Rightarrow$  saving money by preventing injury and death
  - $\Rightarrow$  providing peace of mind to tractor operators and their families
  - $\Rightarrow$  ensuring the continued operation of the farm and a way of life

### Intended Audiences

- Young and adult farm men and women
- FFA, vocational agriculture students, and 4-H youth
- Farm community groups that provide educational, financial, business, social, spiritual, and health services and advice to farmers and their family members

### How to Use These Materials

- Read the exercise Instructor's Guide, especially the table of contents and the page 3 "Overview." (Although the total document is large, this tip sheet and page 3 in the instructor's guide tell how to do the exercise.)
- For more detail on how to conduct the activity, look over the material on pages 4-9 in the Instructor's Guide.
- Decide if the exercise is useful to you or others with whom you work.
- Then look at the follow-up notes and activities that can be used after the demonstration (See pages 10-16 in the Instructor's Guide.)

- Use the materials in any of these ways:
  - $\Rightarrow$  As a 15-minute, hands-on demonstration for a group.
  - $\Rightarrow$  As a demonstration and activity conducted repeatedly throughout the day at a booth at a fair or farm-safety day camp.
  - ⇒ For farm youth school or community projects about tractor and farm safety. (See Appendix A for a set of charts that describe tractor overturns and the value of ROPS and seat belts. See Appendices B and C for a set of detailed instructions for the gathering, construction, and assembly of the materials needed to conduct the activity.)

### **Materials Needed**

- The "Mr. Good Egg Farmer" Instructor's Guide and Appendices A, B, and C.
- Two scale model tractors, one without a ROPS and one with a ROPS, as described on page 3 of the Instructor's Guide.
- Half a dozen medium-sized, raw hens' eggs (see page 3 of the Instructor's Guide).
- A platform on which to place the tractors and then overturn them. This can be the top of a cardboard box like the ones used to hold copy-machine paper or you can construct a plywood platform. (See the Instructor's Guide, pages 3, 5, and 6, and Appendix B.)
- Felt tipped marking pens to draw faces on the eggs.
- One copy of the "Mr. Good Egg Farmer Exercise Evaluation Questionnaire" for each person who completes the activity.

### **Discussion Questions and Teaching Points**

- 1. During an overturn, how does a ROPS protect the operator?
- 2. Why and how does the seat belt make a ROPS more effective in preventing injury?
- 3. Are ROPS and seat belts on real tractors really that helpful?
- 4. Do ROPS cost too much?
- 5. What are some reasons that some farmers don't want ROPS on their tractors?
- 6. What are some reasons that farmers should get ROPS and seat belts on their tractors?
- 7. When people you love drive tractors, do you want them to have ROPS and seat belts on the tractors they drive?

#### Ideas, Notes, and Comments

Use this space to write down your ideas and plans for using these materials.