

Cooperative Extension Service Agricultural Experiment Station **Current Information Series No. 529**



UUI 3

Federal Government Participation In Rangeland Grasshopper Control

Hugh W. Homan and Roger J. Pollard

The federal government participates in cooperative grasshopper control programs on rangeland through the Plant Protection Division of the U.S. Department of Agriculture. This program does not generally apply on cropland unless it falls within a block of rangeland.

For privately owned rangeland, the program funds one-third of the total grasshopper control costs as long as landowners have arranged in advance for payment of the remaining costs. The Plant Protection Division will pay the full cost of treating infested federal lands and one-third of the cost of treating state or county lands. Personnel from Plant Protection Division, USDA, will supervise the program, supply insecticide and arrange for its application under cooperative programs.

The insecticides used in cooperative control programs will be 8 ounces of Malathion ULV Concentrate or 16 ounces of Sevin 4 oil in 4 ounces of diesel oil per acre applied by aircraft.

Criteria for A Control Program

Criteria that must be met to qualify for federal participation are as follows:

- 1. The USDA will join in grasshopper control programs only if substantial acreages of rangeland (10,000 acres or more) are involved.
- 2. The two-thirds share of program costs which are paid by ranchers or by state or county sources must be on deposit with a rancher committee before the federal government will submit contract bids for the treatment. In the past, state funds have been available for control programs on private lands, so ranchers have had to pay only onethird of the cost.



3. Grasshopper control areas must include all economically infested land (usually where 8 or more grasshoppers are found per square yard) in a given district. Solid-block acreages normally are required within the infested area. All landowners in a seriously infested area must participate in the control program. This ruling was developed to eliminate reinfestation from untreated areas within the block.

Organizing A Control Program

Swift action by extension agents and ranchers when grasshopper outbreaks occur is the key to organizing cooperative control programs. It is preferable to plan the program well in advance of an outbreak, but this is not always possible. When grasshopper buildups are noted or anticipated, meetings should be called to determine if there is interest in a cooperative control program. If a cooperative effort is desired, the following steps should be taken to develop the program:

- 1. Form a landowner (rancher) committee of five or more with chairman, secretary and treasurer.
- 2. Contact federal entomologists to determine the infested area and secure their recommendations for control.
- 3. Have the committee convass all landowners in the outlined infested area to secure finances on rangeland acreages.
- 4. The committee must determine if the county and state are going to support the program monetarily. These agencies should be kept advised of all further developments.
- 5. The committee must obtain agreement from all concerned parties to undertake a cooperative control program.

After the entire landowner's share of costs is on deposit in a bank, the USDA will request bids from aerial applicators and accept the most advantageous one.

Estimating Application Costs

Cost examples of control programs with aircraft are **estimates** only. The final cost of each program depends mainly on charges for aircraft application of pesticides.

Insecticide, malathion (8 oz/acre) Aerial application (per acre) Overhead (government travel and expenses) Total cost per acre	\$.80
	.60 .10

Further information may be obtained by contacting your county agent.



This heavy infestation of grasshoppers demonstrates the crop defoliation capability the insect has on rangeland.

The Authors

Hugh W. Homan is extension entomologist in the Department of Entomology, University of Idaho, Moscow, and Roger J. Pollard is district director of APHIS, USDA, in Twin Falls.

Brand names have been used for convenience only. No preference is intended nor implied. Destroy container in accordance with label instructions.

Issued in furtherance of cooperative extension work in agriculture and home economics, Acts of May 8 and June 30, 1914, in cooperation with the U. S. Department of Agriculture, James L. Graves, Director of Cooperative Extension Service, University of Idaho, Moscow, Idaho 83843. We offer our programs and facilities to all people without regard to race, creed, color, sex or national origin.