Co-Operative Extension Work
in
AGRICULTURE AND HOME ECONOMICS
State of California

University of California
College of Agriculture
and
United States Department of Agriculture
Co-Operating
April 1955

Extension Service

Farm Advisor Work
Agriculture Club Work
Home Demonstration Work
1720 So. Maple, Fresno, Calif.

CERTIFIED SEED NEWS LETTER

Dear Certified Seed Grower:

This newsletter is being inaugurated with the hope that it will be of service to you. Our plan is (1) to remind you from time to time concerning certain operations that should be carried out in producing certified seed; (2) to keep you informed as to latest developments in all phases of the certification program; and (3) results of current research, plot work, etc. If any of you have suggestions as to how such a letter as this may serve you further, we would be glad to hear from you.

1. RECOMMENDATIONS FOR CONTROL OF ALFALFA SEED INSECTS.

Enclosed is a bulletin covering latest recommendations for control of alfalfa seed insects. In it we have tried to give you a picture of the pests we are concerned with, recommended control, and some of the treatment techniques and considerations.

2. YELLOW CLOVER APHID

Enclosed is a reprint from California Agriculture on this aphid. Early in April a single specimen was found in an alfalfa field near Clovis. This does not necessarily mean that economic infestations will develop in the county this year.

Since we know now that the aphid is here, the best advice is to keep a close watch on your fields and report to us if you suspect its presence. The following will help you suspect it. We say "suspect" because it must be observed under the microscope for positive identification.

Appearance: This aphid is small, being about half the size of the pea aphid which is quite common in alfalfa fields now. It is pale yellow, with four rows of black dots on its back and one on each side of its body. They are both winged and wingless. Wings are clear except for dark veins. There are other aphids having black dots on the back, so other characteristics must be checked for identification.

Where Found: Usually first found on alfalfa plants on borders, levees, ditches and in volunteer plants. It prefers alfalfa as a host but also attacks burr clover and sweet clover (yellow blossom). It does not attack ladino, red clovers, nor sour clover (white blossom).

Damage: In heavy infestations, large amounts of honeydew are deposited, primarily on stems and lower leaves which turn yellow and drop. The stems and surrounding ground surface turns black as a result of fungus growth that feeds on the honeydew. The aphid can kill new stands and seriously affect established stands. There are indications that defoliation of the alfalfa plant affects seed yield. However, there has been no definite experience on this.

Control: The fact that this aphid has just been found does not necessarily mean that it just arrived in the area. It may have been here last year but kept under control by predators. This is apparently what has happened in Kern County where it was first reported in January 1954 and to date no economic infestation has developed.

Principal predator is the ladybird beetle. Control measures are included in the enclosed bulletin. Treatment of alfalfa with toxaphene for lygus control will also control the yellow clover aphid. Systox used for mite control will also do the job. It is possible that predators will keep this aphid under control. For this reason treatment is not advised unless there is evidence of damage by this aphid.

3. ALFALFA ISOLATION

The following statement includes recent changes in interpretation of isolation requirements:

"Beginning in the fall of 1954, though not retroactive on isolation conditions previously established, the following rules shall apply:

1. The certified alfalfa seed grower shall have complete jurisdiction over any isolation strip planted with alfalfa. Evidence of jurisdiction shall be an affidavit of control of the isolation strip. This may be a letter from the person owning the crop in the isolation strip stating that the certification applicant has access to the land, permission to control volunteers and prevent the crop from reaching the seed stage.

2. The isolation strip shall be described in the application to grow certified seed, but listed as a separate acreage on the application. (for example : 160 + 5 isolation). Isolation strips shall be subject to regular field inspections, and field inspection fees paid for the acreage involved.

3. An isolation strip or any acreage failing to meet isolation requirements must not be allowed to reach the seed stage."

Any isolation strip planted to alfalfa must be planted with the same variety and class of seed as the seed field. Seed tags must accompany application.

4. CONTROL OF ALFALFA PLANTS IN ISOLATION STRIP

Certification standards specify that there be no alfalfa plants in the 500 foot barrier around a field. In order to pass your field inspection, the isolated plants which occur along roads, railroad rights of way, ditchbanks or in neighboring fields should not be allowed to bloom. The easiest time to control them is now while the soil is moist by cutting them off with a shovel, 3 or 4 inches below the crown. Later it will take repeated spraying with weed oil or hoeing.

This provision also applies to new plantings when seedlings (from planting seed) become established outside your head ditch, along roadways, or otherwise outside the regular boundaries of the field. These plants are considered to be volunteers if they are not part of the actual field and must be controlled. Discing these areas before the seedlings become established is a better method than repeated oiling or hoeing.

5. ONE GROWER NUMBER FOR SEVERAL FIELDS.

If you have several fields of the same variety you may wish to file these under one application and thereby have them under one grower number. The advantage of this is that it is simpler to arrange for harvesting inspections when moving from one field to another and back again in order to harvest portions of the fields which are maturing unevenly. Also, it may not be necessary to clean the harvester out when moving to another field if both fields have the same grower number. This, however, is up to your agricultural inspector and you should check with him. We would not recommend this procedure where there is a possibility of trouble with dodder, morning-glory, Johnson grass or other noxious weeds. This suggestion is late for many of you who have already filed, but it may be well to keep in mind for next year.

6. SORGHUMS

You are reminded that starting this year registered seed must be planted to produce certified. Seed stock must also have been treated for seed borne diseases, particularly smut. Isolation requirement is 660 feet.

7. DEADLINES

Although you have been urged to file your applications on alfalfa and clover by May 2, to give us adequate time to process them, you may still file up to May 31 without penalty. After June 1, applications will be accepted for 30 days, however, fees are doubled. Also applications may be rejected if received after the regularly scheduled field inspections. Inspections for Fresno County are scheduled for the weeks of June 13 and 20. Late inspections or reinspections are going to be difficult to schedule this year because of the increased acreage. Your best bet is to get your fields in tip-top shape as soon as possible.

The deadline for application on beans, sorghums and rice is July 1.

8. RESEEDING

Reseeding in alfalfa or clover to fill in skips or thicken a stand is allowed only in first year stands and must be done before a stand has produced seed.

If a seed lot different from the original planting is used, it is necessary that you notify us and furnish us the tags from the new lot. This information will be entered on the application form.

9. If you have not already done so, you should be making arrangements for bees now to avoid delay later. They should be placed in fields when the alfalfa reaches about 25% bloom. Two to three stands per acre scattered through the field are recommended.

10. IRRIGATION

Keep new stands growing actively until about June 15, as though you were growing hay. Luther Jones states thereafter for good seed yields, alfalfa plants must be approaching stress but not allowed to reach that point. For older stands a slow even growth is desired.

Sincerely,

Armen V. Sarquis

Armen V. Sarquis
Farm Advisor

P. S. - SUDAN 23

A letter just received from Burt Ray says that since there is no Registered seed stock of Sudan 23 available, Certified seed stock of this variety will be accepted as planting stock to produce certified. This will also be true for 1956 plantings. Registered seed will be available and required in 1957.

A.V.S.