## Instructions for Filing Permanent Records on Agronomy Projects

Each project leader should compile a report on all experiments conducted under the project each year. One copy should be filed with the Record Clerk. This copy will be kept in the departmental library and will serve as a permanent record of the work done on this project.

Annual reports should be prepared with at least the following objectives in mind:

- 1. It should enable the project leader "to take stock" on his projects at the end of each year. It should greatly simplify the preparation of annual Experiment Station reports, news articles, publications, etc.
  - 2. For the benefit of workers who may take over the work of projects later on. Changes in personnel on projects are inevitable. The report should be prepared in such a manner as to enable a new worker to take over projects with the least possible loss.
  - 5. For the benefit of staff members and others who may have occasion to study the work of the project. If the work is worth anything at all, it should be worth preserving for future reference. While much of the data eventually are published, there are few projects on which all the data which should be preserved will wind up in published form.

Since the projects in agronomy cover a rather wide range, the records of the projects that should be preserved will vary considerably in both kind and detail. It appears that from this standpoint it would be well to divide the projects into two broad groups.

# Group I - Broading projects

Paul H. Harvey

These projects deal with relatively large numbers of entries. Material under study is constantly changing and consequently much detail may be gathered which need not be preserved permanently. For projects of this nature the following outline is suggested:

Since most projects are cooperative with B. P. I., the same report can be used for the State record as is submitted to the B. P. I. These who have not been proparing complete annual reports may see the suggested B. F. I. outline in Dr. Harvey's office.

The following general topics should be included in the report:

- Fundamental data location, cultural practices, croping history, soil type, soil tests, etc.
- II. Introduction generalizations on year's work.
- III. Climatic data may nr may not be necessary for every location.

IV. Experimental data

A. Breeding

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- 1. Breeding nursery (might include greenhouse work)
  - (a). Reasons for initiating each line or sub-line of work
- Preliminary testing a summary table for each test and a table of the analysis summary would be sufficient. Data from all plots may be included, if desirable.
- 3. Advanced testing should have summary of each experiment; if same test is in more than one location or more than one year, a combined summary might be included.
- 4. Increase of seed stocks worthwhile on new selections as a record of seed quantity.
- B. Genetic studies
- C. Pathological studies
- D. Entomological studies
- V. Summary and or conclusions

Each leader should use his own judgment as to how much narrative material to use along with the table. Usually the reports will be more useable if they are kept as concise as possible just pointing out the most important items or the unusual thing which one might need to keep in mind. Other sub-headings may be filled in as the need arises. A few good pictures or diagrams may also be helpful.

# Group II - Fertility and Management projects

These projects usually handle fewer number of entries than Group I and tend to carry the same form over a longer period of time. Most of the data taken are of such a nature as to be desirable in the permanent file of the project. For this type of project the following outline is suggested. Printed forms are already available to handle much of the data from these project.

As in the case of the Plant Breeding group, projects that are cooperative with B. P. I. should use the same report for the departmental record as is submitted to B. P. I.

- I. Printed Experiment Station form bearing:
  - A. Project, leader, location, field number, nature of projects, etc. Location should be as complete and exact as possible.

B. Field diagram

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- C. Outline of treatments
  - Comparisons intended and reasons for making them
- II. (On back of above form)
  - A. Field history
  - B. Record of work, etc.
- III. Record of soil tests (Departmental forms)
- IV. Climatic data (Where advisable)
  - V. Data sheets (Departmental form)
    - A. Data by plots (This covers measurements of any kind, yields, counts, analyses, etc.)
    - B. Treatment means
    - C. Analysis of variance
    - D. L. S. D.'s
    - E. Accumulated averages (For experiments conducted for more than one year or at more than one location)
- VI. Discussion and summary of results
  - A. For individual locations

Where an experiment is conducted at more than one location a brief discussion and summary may be placed on the back of the data shect. This should include any conclusions that the leader cares to make and any comments, impressions, etc., that he feels should be recorded.

B. For groups of experiments or whole projects

This should be a narrative report of the work done. It will be up to the individual to determine the amount of detail going into this. This is the place to preserve the thoughts, opinions, and impressions of the individual who conducted the work.

#### Record Clerk

Miss Anderson will serve as Record Clerk for the Department. She will have the reports bound and file them as they come in. Each project leader will work out a schedule for his reports and file it with Miss Anderson. She in turn will call to the attention of the research staff any records that are overdue.

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Miss Anderson's job will be to work with the project leaders in keeping the records complete. She will relieve the research staff of as much of the routine of record keeping as possible.

# List of Reports

Just as a reminder, the following are the reports that are normally expected during each year:

- Complete report on each project (for the permanent files). All other reports in most cases will be derived from the above report.
  - A, Popular style annual Experiment Station report.
  - B. Inspector's report on projects (for office of Experiment Station).
  - C. Report for Branch Station Superintendents (for experiments conducted on branch station farms).

These may be prepared in either of two ways, depending upon judgment of the project leador:

- 1. Extra copies of cortain parts of the annual departmental report.
- 2. Summaries prepared especially for the Branch Station Superintendents.
- D. News articles, publications, etc.

RECORDS COMMITTEE

MEMORANDUM TO AGRONOMY STAFF:

# Subject: Identification of field experiments.

Purpose: The following set of symbols is to identify a given experiment on one definite plot of land. The division of crops into "breeding and fertility" is purely arbitrary and is made for the sake of simplicity. Many experiments will be neither breeding nor fertility and may be given numbers under either one, depending upon the project leader involved.

> CF - Corn Fertility C - Corn Breeding CtF - Cotton Fertility Ct - Cotton Breeding PF - Peanut Fertility P - Peanut Breeding IPF - Potato Fertility F - Pastures and Forage Crops GF - Small Grain Fertility G - Small Grain Breeding SF - Soybean Fertility S - Soybean Breeding St - Strawberry TF - Tobacco Fertility T - Tobacco Breeding

The symbols are to be used in conjunction with numbers to designate each field experiment. For example: fertility experiments with the small grains will be identified by the letters, "GF". Experiments started this season might be designated "GF1", "GF2", "GF3", etc. If the <u>same experiment</u> is continued next year on the <u>same plots</u>, it will continue to bear the <u>same number</u>.

Where the same experiment is conducted at different locations either in the same year or in different years a number should be assigned to each location.

Rotation experiments may bear the number and designation of either crop involved. For example: a fertility experiment with a peanut-cotton rotation could be given a "PF" number, or a "CtF" number but should be cross-indexed in the list on file with the record clerk.

When numbers become large enough in a given crop designation series to become cumbersome, it will be possible to start over at the beginning of the season.

Field designation numbers should always appear on the following:

- 1. Forms carrying field map and outline, field history and operation record.
- 2. Soil or plant samples.
- 3. All data sheets.
- 4. Annual summary and field notes.
- 5. Any other records of that particular experiment which may become a part of the record of that experiment.

Each project leader should file with the record clerk a complete list of numbers and descriptions of his experiments and should add new experiments to the list as rapidly as they are assigned numbers.

Ralph W. Cummings, Head, Agronomy Department.

November 6, 1944

Momorandum to: E. W. Cummings J. A. Rigney P: H. Harvey/ W. H. Rankin

Attached is a proposed outline, part of which you have already seen concerning preparation and filing of annual reports in the department. Please look this over in order that we may use it as a basis for discussion in preparation of a memorandum on this subject to be issued to the department in the near future.

I hope that we can get together perhaps Saturday morning, the eleventh, to discuss this. I will get in touch with you individually concerning this meeting.

Very truly yours,

W. W. Woodhouse, Jr., Chairman, Records Committee.

Attachment

### Suggestions for Filing Permanent Records on Agronomy Projects

Each project leader should compile a report on all experiments conducted under the project each year. One copy should be filed with the record clerk. This copy will be kept in the departmental library and will serve as a permanent record of the work done on this project.

Since the projects in agronomy cover a rather wide range, the records of the projects that should be preserved will vary considerably in both kind and detail. It appears that from this standpoint it would be well to divide the projects into two broad groups.

Group I - Breeding projects

Those projects deal with relatively large numbers of variables. Material under study is constantly changing and consequently much detail data may be gathered which need not be preserved permanently. For projects of this nature the following outline is suggested:

Since most projects are cooperative with B. P. I., the same report can be used for the State record as is submitted to the B. P. I. Those who have not been preparing complete annual reports may see the suggested B. P. I. outline in Dr. Harvey's office.

The following general topics should be included in the reports

- Fundamental data location, cultural practices, eroping history, soil type, soil tests, etc.
- II. Introduction . generalizations on year's work.

a. Reasons for intesting each line of work.

III. Climatic data - may or may not be necessary for every location.

IV. Experimental data

- A. Breeding
  - Breeding nursery (might include greenhouse work).
    Preliminary testing a summary table for each test and a table of the analysis summary would be sufficient. Data from all plots may be included, if desirable.

- 3. Advanced testing should have summary of each experiment; if same test is in more than one location or more than one year, a combined summary might be included.
- 4. Increase of seed stocks worthwhile on new selections as a record of seed quantity.
- B. Genetic studies.
- C. Pathological studies.
- D. Entomological studies.
- V. Summary and or conclusions.

Each leader should use his own judgment as to how much narrative material to use along with the tables. Usually the report will be more useable if they are kept as concise as possible just pointing out the most important items or the unusual thing which one might need to keep in mind. Other sub-headings may be filled in as the need arises. A few good pictures or diagrams may also be helpful.

#### Group 2 - Fertility and management projects

These projects usually handle fewer number of variables than Group 1 and tend to carry the same form over a longer period of time. Most of the data taken are of such a nature as to be desirable in the permanent file of the project. For this type of project the following outline is suggested. Printed forms are already available to handle much of the data from these projects.

As in the case of the Plant Breeding group, projects that are cooperative with B. P. I. should use the same report for the departmental record as is submitted to B. P. I.

I. Printed Experiment Station form bearing:

- A. Project, leader, location, field number, nature of project, etc. Location should be as complete and exact as possible.
- B. Field diagram.
- C. Outline of treatments.

. II. (On back of above form)

A. Field history.

B. Record of work, etc.

III. Record of soil tests (Departmental forms)

IV. Climatic data (where advisable)

V. Data sheets (Departmental form)

- A. Data by plots (This covers measurements of any kind, yields, counts, analyses, etc.)
- B. Treatment means.
- C. Analysis of variance.
- De L. S. D.'s
- E. Accumulated averages (for experiments conducted for more than one year or at more than one iccation).

VI. Discussion and summary of results

A. For individual locations

Where an experiment is conducted at more than one location a brief discussion and summary may be placed on the back of the data sheet. This should include any conclusions that the leader cares to make and any comments, impressions, etc., that he feels should be recorded.

B. For groups of experiments or whole projects

This should be a marrative report of the work done. It will be up to the individual to determine the amount of detail going into this. This is the place to preserve the thoughts, epinions, and impressions of the individual who conducted the work. Annual reports should be prepared with at least the following objectives in minds

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- For the benefit of the worker preparing the report it should enable the project leader "to take stock" on his projects at the end of each year. It should greatly simplify the preparation of annual Experiment Station reports, news articles, publications, etc.
- 2. Workers may take over the work of projects later on. Changes in personnel on projects are inevitable. The report should be prepared in such a manner as to enable a new worker to take over projects with the least possible less.
- 3. Staff wombers and others who may have occasion to study the work of the project. If the work is worth anything at all, it should be worth preserving for future reference. While much of the data eventually are published, there are X few projects on which all the data which should be preserved will wind up in published form.

It is hoped that sufficient flexibility has been provided in this outline to enable each project leader to report his project in a satisfactory manner.

Miss Anderson will serve as record clork for the department. It will be her job to work with the project leaders in keeping the records complete and in taking as much of the routine of record keeping off of the shoulders of the research staff. Memorandum to the Department of Agronomy:

Some simple, uniform system of identification for field experiments is needed in keeping permanent records in the department. The following set of symbols has been proposed:

> CF - Corn Fertility C - Corn Breeding CtF - Cotton Fertility Ct - Cotton Breeding PF - Peanut Fertility P - Peanut Breeding IPF - Potato Fertility F - Pastures and Forage Crops GF - Small Grain Fertility G - Small Grain Fertility S - Soybean Fertility S - Soybean Breeding St - Strawberry TF - Tobacco Fertility T - Tobacco Breeding

It is suggested that these be used in conjunction with a simple numbering system to designate each experiment in the department. For example: FFl would be given to the first peanut fortility experiment started this year (or to one started in previous years but still underway on the same land). Thereafter, all yield data, scil samples, etc., from this experiment would bear that symbol.

Please check over this proposal and give me your comments by March 18, in order that some decision can be reached in advance of the spring season.

Sincerely yours,

W. W. Woodhouse, Jr., Chairman, Records Committee.

March 9, 1944.