AGRICULTURAL EXTENSION SERVICE

State of North Carolina

PLAN OF WORK
19 47

Period covered December 1, 1946 to November 30, 1947
(Month) (Month)

Name of Project AGRICULTURAL ENGINEERING EXTENSION

Covering work to be done by* D.S.WEAVER, H. MELLIS, J.C.FERGUSON,
C.L.MCCASLAN AND W.J.RIDOUT, JR.

Percentage of time to be devoted to project: D.S.WEAVER 50%
OTHERS, FULL TIME

Date submitted: DECEMBER 19, 1946. Signed: _____
Project Leader

Date approved: _____, 19___. Signed: _____
State Director of Extension Work

Date approved: _____, 19___. Signed: _____
Director of Extension Work U. S. Department of Agriculture

*If phases of project are divided between two or more workers, indicate assignment to each.

PLAN OF WORK - 1947

AGRICULTURAL ENGINEERING EXTENSION

D. S. WEAVER, IN CHARGE, AGRICULTURAL ENGINEERING EXT.
(Rural Housing, Farm Buildings)

H. M. ELLIS, SPECIALIST (Erosion, drainage, irrigation, general)

J. C. FERGUSON, SPECIALIST (Farm machinery, cotton gins)

C. L. McCASLAN, SPECIALIST (Hay driers, cotton gins)

W. J. RIDOUT, JR., SPECIALIST (Rural electrification)

I. O. SCHAUB, DIRECTOR

NORTH CAROLINA AGRICULTURAL EXTENSION SERVICE

NORTH CAROLINA STATE COLLEGE OF AGRICULTURE AND ENGINEERING

OF

THE UNIVERSITY OF NORTH CAROLINA

AND

UNITED STATES DEPARTMENT OF AGRICULTURE, COOPERATING

STATE COLLEGE STATION

RALEIGH, NORTH CAROLINA

INDEX

1946

COOPERATIVE EXTENSION WORK IN AGRICULTURE AND HOME ECONOMICS
U.S. Department of Agriculture and State Agricultural College Cooperating

SUGGESTED OUTLINE FOR ANNUAL PLANS OF WORK
OF SUBJECT MATTER SPECIALISTS

Indicate under Sections 1 and 4 how the work in this project has been and is to be further integrated into a broad State Extension program of work. Specific suggestions are given in this outline for listing and tabulating information in order to encourage definiteness and brevity.

1. ANALYSIS OF PROJECT SITUATION: State briefly facts showing project work needed; important changes and trends using pertinent data from Census, farm and home records, surveys, post-war planning reports, research, outlook material, county and State planning committee reports, etc. Show adjustments, especially to post-war needs.

   What additional research is most needed.

2. MAJOR PROBLEMS: List without discussion based on situation.

3. NUMERICAL GOALS FOR CALENDAR YEAR: To indicate volume of work and possibility of reaching goals, compare in parallel columns the most important goals with results accomplished in previous year, grouped preferably by major phases of projects. List without discussion:

   (a) Activity Goals: Such as number of training meetings, demonstrations, etc.; number of Extension agents and voluntary leaders to be trained.
   (b) Result Goals: Such as number to adopt improved practices; increased acreage, or other measurable units to show specific or material results.

4. METHODS OF PROCEDURE: Under appropriate headings discuss the most important methods to be used, especially in planning with and training county Extension agents and leaders. Indicate, for example: effective motivating appeals and systematically planned demonstrations; new or unusual techniques to be used in teaching, including visual aids; how materials and services will be made available to facilitate adoption of recommended practices; assistance to be given in 4-H Club work; and methods to be used for evaluating project results.

5. COOPERATION: List in column (1) the names of State, Federal, and other agencies or other specialists that will cooperate; column (2) assistance to be given, and column (3) assistance to be received from the agency or individual. Include only definite cooperation agreed upon.

6. PUBLICATIONS, VISUAL AND OTHER TEACHING AIDS: List titles and approximate number of copies to be made available.

7. CALENDAR OF WORK: In the first column might be listed principal activities mentioned under Section 4; in the second, approximate total number of days to be given to each; and in the columns for months use stars or dashes to show approximate weeks when major activities will be carried on. A separate calendar of work should usually be attached for each specialist.

8. OUTLINE MAP: Show distribution of work contemplated.

PLAN OF WORK - 1947

FARM BUILDINGS

By

David S. Weaver, Part-Time Specialist

It has been estimated that one-third of the total value of farm real estate in North Carolina is invested in farm buildings, including farm houses. With increased diversification many farms are very much handicapped in efficient production because the existing buildings are not properly designed, located nor equipped. The examples are dairy barns, poultry houses, sweet potato storages, and refrigeration facilities. There being no farm building specialist in the Extension Service, the work that can be done must be handled by specialists in other fields and consequently little emphasis can be put on this important part of our state agricultural program. / The work that can, and probably will be done in farm buildings extension in 1947 will consist primarily in supplying the home demonstration agents and county agents with blue print plans of needed farm structures. The Extension Service has approximately 350 practical farm buildings and farm equipment plans which are supplied free of charge to the farmers of the state. These plans are constantly being revised with the assistance of the specialists in other extension projects. New plans, wherever possible and where needed are added to this list.

The change in building materials occasioned by the shortage of good lumber has brought some problems into agricultural building programs not heretofore encountered. The interest on the part of the farmers in using concrete block, cinder block, brick and tile is very great. Most of our plans show lumber construction and we are attempting, with limited personnel, to design these same buildings, using masonry products. About 10 such changes are planned for 1947 if drafting personnel is available.

The shifting from cotton to more diversified agriculture has created a demand for hay barns, dairy barns, poultry house, hog houses and equipment, corn cribs and granaries. In addition, new ideas in tobacco curing have created changes in design of tobacco barns. We will attempt to keep the Extension workers informed on these matters.

The rural housing situation in North Carolina is, if possible, more critical than ever before. The tax books of the various counties show an average value of rural dwellings of $455 and urban dwellings of $1501. Both of these are too low, but in the case of rural dwellings, the figure is alarming. In other words, we are housing our future citizens in a building which has a per capita value less than the per cow investment in a new, modern, dairy barn. This is a difficult problem to solve inasmuch as the capital is relatively large. The second obstacle is the general acceptance of conditions as they are, with very little real urge to change them.

A third obstacle to the solution of this problem is the lack of a well thought out practical plan combining educational, social, and financial factors. Some thought and time will be put upon the solution of this problem, cooperating especially with the Home Management specialists and the Home Demonstration agents in the counties.

Freezer lockers are relatively new to North Carolina, yet the possibilities for their development are very great. Numerous meetings with persons considering the promotion of freezer locker projects in their communities, as well as with interested farmers and farm women will be held wherever possible. With only about 15 completed locker plants and a potentiality of several hundred, this field offers great possibilities for leadership and its value is unquestioned.

RURAL HOUSING

I. Situation:

With poor maintenance over many years, poor construction methods, and the interruption of normal building and repair, by the national defense program, rural housing is a major problem in North Carolina.

The 1940 census revealed the following figures concerning rural houses in this state.

1. 22.8% of dwellings had more than 1.5 persons per room.
2. Only 6.8% had running water.
3. " 4.2% " toilets in the structure.
4. 40% needed major repairs.

Understanding the need for a housing program in this state, we are pioneering in this field. Because there is no precedent for such a program as it is hoped to be carried out in this state, the best procedure and methods employed will evolve during the first year. About 50 counties have requested assistance with their housing problems so far and many more requests are expected as the agents learn of available assistance.

II. Major Problems:

1. Present acute shortage of building materials.
2. Education of extension agents and prospective builders and remoderlers in house planning and the use of new building materials.

III. Goals for 1947:

Activity Goals: Other than training meetings for Home Demonstration agents, no meetings have been planned. Others will be held in response to requests. As requests come in meetings can be arranged with the farmers.

Result Goals:

A national survey by COUNTRY GENTLEMAN showed that 16% of the farm families plan to build new homes as quickly as material is available. A survey in Alabama of 150 families by a home agent showed that 16.5% plan to build new homes in the next five years, and that over 60% plan to remodel. The rate at which a supply of building materials will be available will be the main factor in determining the number of new houses built and the number remodeled this year.

IV. Method of Procedure:

1. Demonstrations of prefabricated building materials.
2. Picture studies in planning and construction methods, using lanterns.
3. Model demonstration.
4. Explanations or lectures.
5. Observation of model homes or homes which have certain features that can be used as models.
6. Charts and graphs.

V. Cooperation:

Joint meetings with Miss Pauline Gordon, Home Management Extension Specialist; Mr. John Harris, Landscape Extension Specialist, and Mr. W. J. Ridout, Jr., Rural Electrification Extension Specialist will be held with county groups requesting assistance, in information closely related to housing.

-- PLAN OF WORK - 1947 --

F A R M D R A I N A G E

By

H. M. Ellis, Agricultural Engineering Ext. Specialist

One of the most outstanding problems in land improvement in North Carolina today is that presented by inadequate drainage. Economically, it is hard to justify the use of hand labor for ditching, but for most of our wet lands that has been the method employed in the past. Now, with the scarcity of labor and the high wages paid for that which is available, the average farmer has for the past several years left his ditches to take care of themselves. As a result, bottom pastures have become bogs, and once fertile crop lands adjacent to these areas have become too waterlogged to crop. Open field ditches, from lack of maintenance, have lost much of their usefulness and large areas of what once were good crop land are now only second-rate, as a result.

Ditching equipment is slowly coming into the picture, but too slowly to change the complexion of the problem for several years to come.

Before the war, North Carolina farmers were rapidly increasing their use of drain tile, but drain tile is practically unobtainable now, and even if it were plentiful there would still be a need for many open drains.

One phase of the drainage problem is an ever increasing interest in the production of livestock, and this makes improved pastures a necessity.

The Coastal Plains section (1/6 of the land area of the State) is poorly drained and crops on large areas of cultivated land are lost one out of every four or five years. But this is not the only part of the state suffering from inadequate drainage for there are sections throughout the Piedmont and Mountain regions where yields are low and occasionally crops are lost, while many good acres are producing only willows and rushes.

In view of these facts and because of an unusually heavy demand for assistance from county agents in their plans of work, most of one man's time will be given to this phase of the program during 1947.

SPECIFIC SOLUTIONS

1. Improvement of surface drainage systems:

   A. Conducting ditch blasting demonstrations, both for blasting new ditches, and for reworking existing ditches.

   B. Assistance in the offering of recommendations, and in helping to organize projects which affect more than one land owner.

   C. Demonstrations to show advantages of bed drainage and v-drains, under certain conditions.

2. Sub-surface drainage:

   A. Tile drain planning and installation demonstrations.

PLANNING AND TEACHING ACTIVITIES:

85 specialist's days in field, assisting county agents in conducting county programs.
15 " " " office in connection with drainage program.
65 county agents to be assisted.
50 ditch blasting demonstrations to be conducted by specialist.
50 (estimated) " " " " planned " " but not conducted by him, such as neighborhood projects that will be conducted by crews which have attended educational demonstrations.
12 tile drainage demonstrations.
10 educational meetings other than the blasting demonstrations.

RESULT GOALS

It is expected that approximately 4500 will participate in the drainage program conducted by extension agents, and that the drainage on 45,000 acres of land will be improved. It is felt that this is a conservative estimate, if the national situation is favorable and if nitro-glycerin dynamite is available in sufficient quantity.

COOPERATION

Close cooperation is maintained with the Production and Marketing Admr., and the Soil Conservation Service. The former offers payments for approved drainage practices, and a member of the Agr. Eng. Department is on the committee to draft their specifications. This responsibility is accepted as a privilege because the pay incentive is an added inducement for high quality work. Representatives of Soil Conservation Service are invited to participate in all planned demonstrations and we cooperate with them in carrying on the educational phases of their program.

SOIL CONSERVATION

By

H. M. Ellis, Agricultural Engineering Ext. Specialist

From data compiled by the North Carolina Agricultural Experiment Station and the North Carolina Extension Service during April 1945, the following figures were taken:

Total area in acres, 1940 census,	31,451,480	acres
Non-erosion, or little erosion	15,053,975	"
Slight erosion (less than 1/3 original surface soil lost)	7,350,692	"
Moderate (between 1/3 and 2/3 of original surface soil lost)	6,075,303	"
Severe (over 2/3 original surface soil, plus some subsoil - including gullied land)	2,971,510	"

Due to the nature of the soils, slopes, and to cropping practices in the Piedmont Section - which comprises about 1/3 of the area of the State - this area has suffered most from erosion. In 10 of the worst eroded Piedmont counties about 25% of the area has been abandoned. These figures alone clearly indicate the need for educational and project work.

The major problem in soil conservation is improper land use. While proper land use is the one big answer to the problem there are, of course, many reasons why this remedy cannot be applied suddenly. For instance, a tobacco section could not be suddenly converted to a plan that called for close cover crops on eroding, rolling cultivated land.

The Extension Agricultural Engineering Dept. is concerned with the educational program of the engineering phases of all soil conservation programs within the State. These phases are:

1. The design of farm water disposal systems.
2. Terrace construction with heavy equipment.
3. " " " light "
4. Maintenance of terraces.
5. Construction and maintenance of terrace outlets.

The long time goal is to retire badly eroded land from cultivation to trees, or pastures, and to terrace rolling cultivated land. Farmers must first be made to realize the benefits and the practicability of proper land use. They must also be taught to maintain their terraces with a minimum of labor, and should be taught not to assume that terraces constitute a complete erosion control plan.

Since 1936, one member of this Department has spent the most of his time on a soil conservation program. We do not feel that the problem is solved, but the county programs are sufficiently well organized, and the county agents are well enough informed that they can continue their good program without so much attention from this

pepartment as formerly. For this reason very little field work is being planned by the specialist. Justification for this decision is that the agents show on their plans that they are carrying the program on and are making fewer requests for the attention of a specialist. Therefore, the work of this specialist will be concentrated on a much more complete drainage program than has been possible heretofore.

PLANNING AND TEACHING ACTIVITIES:

12 specialist's days in the field
10 " " " " office
55 agents participating in program.
6 method demonstrations of terrace construction and maintenance with farm owned equipment.
3 circular letters on terracing program.
4 news articles.
3 conferences with Production & Marketing Administration compliance officials.

The result goals for 1947 will be 7,000 farmers constructing terraces, 14,000 contour farming, and maintaining terrace systems, and an additional 30,000 acres terraced.

The method of procedure will be much the same as it has been for the past 11 years. More attention and more emphasis will be placed on terrace maintenance and more time will be given to the educational side of the conservation program.

COOPERATION:

This Department will cooperate with the Production and Marketing Administration in assisting with the preparation of specifications for terraces in connection with their practice payment program, and in helping them to coordinate their program with other soil conservation programs in the State.

We will continue to assist in coordinating and maintaining close cooperation between the educational work carried on by county agents and the work being done by the Soil Conservation Service. Field demonstrations, in every case possible, are planned jointly with local representatives of the Soil Conservation Service.

WATER SYSTEMS, FARM PONDS AND IRRIGATION

By
H. M. Ellis, Agr. Eng. Ext. Specialist

Because of requests from the county agents on their plans of work, a few specialist's days have been planned in each of these three phases of our program, but no concentrated effort toward a major program has been made.

Water Systems: Five water systems meetings were requested and these will be conducted. Many additional special requests for assistance will be received during the year. In general the agents are well qualified to render assistance in this phase of work and requests to this department are for special meetings on problems. When equipment and materials are available, promotional meeting will be conducted. At this time there is little prospect that such meetings would be required in the coming year.

Farm Ponds: A recent survey of farm ponds in the state has been made, but the summary has not been prepared, and so results cannot be given at this time. As an indication of what is being done, however, one county reports over 200 farm ponds already constructed.

While very little work was planned for this phase, many county agents, especially in the Piedmont Counties, will devote considerable time to it during 1947. Small contractors, and some farmers who have the necessary equipment, are building large numbers of farm ponds. The agent's place in this program, will, of necessity, be educational, but farmers must be taught the engineering principles of construction of dams and the management of ponds if this practice is to take its proper place.

The Production and Marketing Administration has included a payment of 10¢ per cubic yard of dirt moved in constructing dams for farm ponds constructed in 1947, in accordance with their program.

Irrigation: Interest in irrigation is steadily increasing and with the scattered demonstrations we now have, more and more farmers are recognizing its benefits. Tentative plans had been made for a concentrated program in this work for 1947, but in view of assistance requested by agents it was considered advisable to continue with the established practice of rendering assistance by making surveys and recommendations for installation of systems through requests.

Ground work will be laid in 1947 for educational demonstrations and planned meetings for the following year.

4-H CLUB WORK

By
H. M. Ellis, Agricultural Eng. Ext. Specialist

For the past several years assistance has been given counties that requested help in conducting classes at 4-H Club Camps. It is rightly considered an important phase of our program, in that it presents an opportunity to teach a large number of boys and girls useful lessons.

Probably our most successful handicrafts project has been to teach the proper care and use of rope, and how to make various splices.

Twenty counties made formal requests for assistance at their camps, on their plan of work, and 32 days have been set aside for this work, but until camp dates are fixed, nodefinite plans can be made.

Each boy and girl at the camps where this project is given will be taught to make a crown splice, an eye splice, an eye loop and a short splice. They will complete an adjustable rope halter, made of 3/8" rope, to take home with them

GENERAL FARM ENGINEERING PROBLEMS

By
H. M. Ellis, Agricultural Engineering Ext. Specialist

SITUATION: This is a very important phase of our program, and yet it is one for which very little planning can be done. There is a real need for assistance and guidance in handling many farm problems of an engineering nature which face us on each trip to the field. Safety hazards and farm sanitation are two of these special problems which call for considerable work.

SOLUTION: General farm problems for which we have requests for aid do not lend themselves to planned demonstrations. The time we give is usually in connection with other work, except those for which special help is asked, and that require more time than we can give on regularly planned visits. Fencing, land clearing, farmstead planning, unexpected emergencies, such as flood control surveys, etc., are some of these and we have set aside time for field trips to assist with these problems. This work will be planned as the occasion arises.

PLAN OF WORK - 1947

By
J. C. Ferguson, Agricultural Eng. Ext. Specialist

FARM MACHINERY - SITUATION

North Carolina farmers are rapidly mechanizing their farm operations to meet the labor shortage that now exists and to reduce over all costs of crop production. During the past several years farm machinery has been produced on a very limited scale due to scarcity of materials, emergency demands and labor conditions, therefore, the supply has been inadequate to meet the demands of farmers. However, this condition is improving and it is expected that within another year the supply will approach normalcy.

It is generally recognized that farmers of North Carolina are not utilizing their tractors and other power machinery to fullest advantage. Many farmers who own tractors use them only for the heavier work of preparing land still depending on work stock for planting and cultivating. Such practices create a situation in which either the work stock or tractor stand idle during a part of the crop producing season, and hourly cost of tractor operation runs excessively high.

Inexperienced operators and careless maintenance materially shortens the life of power equipment. Because of the scarcity of tractors and power machinery, implement dealers in many instances have failed in their service to farmers. Their ability to sell any and all equipment that they could procure from manufacturers has lessened the competitive spirit. Consequently sales have not been followed up to see that best results were obtained from newly purchased equipment, and other services which would normally be rendered willingly and without cost to the farmer have largely disappeared. This condition has left the farmer more or less on his own to solve his problems of mechanized farming, resulting in disappointments, inefficiency, and expensive delays and repairs. Farmers are learning that to use tractor equipment to best advantage their fields should be enlarged and consolidated, by improved terracing, tile drainage, and other means.

Probably not more than 20% of the farm tractors in North Carolina are used for planting and cultivation. The scarcity of equipment is one factor, however, the lack of skill and patience to use this more complicated machinery is probably a more important factor.

Great strides have been made in the use of tractors for producing and harvesting wheat and other small grain crops, also haying operations with tractor mowers, side delivery rakes, and pick-up balers, are showing rapid progress.

Due to inexperience of both farmer and implement dealer, machinery has been bought and sold which is not best adapted to the farmers' needs. Each farm presents a problem within itself as to the size, crops grown, location and system of operation in the selection of equipment.

North Carolina farmers are now operating more than 27,000 farm tractors and approximately 5,000 combines. Comparing tractor population

of North Carolina with other states of equivalent size, the number is relatively low. However, this condition may be explained by the fact that the average farm in North Carolina consists of only 27 acres of farm land, much of which is tenant operated and grown to row crops, which have not lent themselves too readily to tractor farming. With the advent of pneumatic, wheel type, all purpose tractors and the further development of row equipment, farmers are beginning to recognize the adaptability an d are steadily changing over to power methods.

OBJECTIVES OF A LONG TIME PROGRAM:

1. To reduce over all production costs.
2. To expedite the general use of more power machinery on North Carolina farms.
3. To further acquaint farmers with the possibilities and approved methods of mechanized farming.

GOALS FOR 1947:

1. To conduct county and community demonstrations in the most effective and economic use of power machinery.
2. To conduct tractor schools or clinics with 4-H Club boys.
3. To advise farmers in selection of equipment.
4. To assist farm groups in maintenance and repair of power equipment.
5. To assist in arrangement of machinery exhibits at county and state fairs, cooperating with local dealers.
6. To prepare timely newspaper and radio material.

PROCEDURE AND METHODS OF TEACHING

1. Field demonstrations in adjustment and most effective use of equipment. (Demonstrations to be conducted in cooperation with local implement dealers where possible.)
2. Local meetings and conferences.
3. Motion pictures (USDA and manufacturers)
4. Educational bulletins.

METHODS OF MEASURING RESULTS:

Comparison of farm statistics as to production and increased efficiency.

PLAN OF WORK - 1947

By

J. C. Ferguson, Agricultural Eng. Ext. Specialist

COTTON GINNING - SITUATION:

Cotton production methods are on the eve of drastic and far-reaching changes. We are at the beginning of an extensive shift to mechanized production of cotton and other crops.

Cotton ginners in North Carolina generally recognize the trends and are already in process of converting and rebuilding their gin plants to meet the demands of mechanically harvested cotton. During the past ten years the number of active gins has decreased rapidly, from approximately 1,000 to slightly more than 600. This transition has been due to several causes, namely, fewer acres planted to cotton, competition from more progressive ginners, and the inability of obsolete equipment to properly condition and gin the longer staple, more roughly harvested cotton.

During 1946 at least 25 completely new, modern gin plants were installed, replacing either burned or obsolete establishments. These plants represent an investment of over $500,000, by North Carolina ginners. Repairs to other gins probably amounted to $250,000.

With this large investment and the evident interest on the part of ginners to do a better job of ginning, incomplete statistics for 1946 indicate that more than 10% of the current crop will be lowered in grade by rough preparation.

The quality of cotton in the past has depended largely on the producer's ability and willingness to properly havest and handle the crop. However, with prevailing practices of harvesting and hauling directly to the gins from the cotton fields, without benefit of storage, greater demands have been made on the ginner to partially restore and preserve some of the quality factors lost in the careless methods employed by the producer.

Much educational work has been done with farmers toward better harvesting and handling practices, but with apparently minor results, therefore, the last opportunity available is at the gin as cotton is concentrated, where special effort can be made in the way of good machinery, consisting of adequate drying, extracting, and cleaning equipment, followed by properly maintained and operated gins.

During the summer of 1946, 13 cotton gin operator schools were held throughout the state in which detailed instructions was given regarding repair and operation of cotton gin machinery. However, attendance at these schools represented generally the more progressive establishments and the element of ginners to which the instruction would have been most valuable, did not attend.

Cotton ginners have a tremendous influence upon their customers and the far-sighted ginner has exercised this influence to

best advantage regarding production and associated practices, along with the Extension Service and other agencies. This method of disseminating information and encouraging better practices among cotton growers, will be continued, but it is believed that more immediate and tangible results may be had from a concentrated effort toward universal improvement of machinery and cotton gin operation.

OBJECTIVES OF LONG TIME PROGRAM:

Through educational methods encourage better harvesting and handling of cotton. Improve facilities for conditioning, cleaning and ginning. Intensify the interest of ginners toward producing the highest possible quality in the ginned lint.

GOALS AND PROCEDURE FOR 1947:

Conduct cotton gin operator schools throughout the cotton producing areas of the state.

Confer with individual ginners regarding repair, replacement, and selection of new machinery.

Meet with organized community groups in discussion of proper harvesting and handling practices.

Prepare timely news articles and radio material on cotton harvesting, handling and ginning.

METHODS AND AGENCIES OF INSTRUCTION:

Schools for cotton gin operators.
Ginning demonstrations, cooperating with representatives of manufacturers of gin machinery.
Film strips, bulletins and mimeographed material.
Personal visits to ginners prior to, and during ginning season.
Grade and preparation statistics (Smith-Doxey & statistical gins).

OTHER AGENCIES COOPERATING:

USDA Cotton Ginning Investigations.
B.A.E., B.P.I., U.S.D.A.
N.C. Agr. Exp. Station
N.C. Dept. of Agr.
N. C. Cotton Ginners' Association
Cotton Cooperatives
Cotton buyers and factors.

METHODS OF MEASURING RESULTS:

Grade and staple statistics.
Surveys of ginning equipment and results.

PLAN OF WORK - 1947

By

C. L. McCaslan, Agricultural Eng. Ext. Specialist

In making the 1947 plan of work, all the plans of work from farm agents were studied and a certain number of days are allotted to take care of their requests. However, it is hard for an agent to plan the exact number of days that will be devoted to each phase of work.

In light of past experience, a number of requests come in for additional assistance, so I am setting up a certain number of days to take care of these anticipated requests.

In our planned farm visits we frequently come in contact with farmers who have engineering problems other than the specific problem for which the visit was planned. In such cases time is taken to give technical advice and guidance.

Some cotton gin improvement work will be done in cooperation with Mr. J. C. Ferguson, of this department. After the rush of the hay drier installation season is over, I will give what time I can to the cotton program.

Plans are now made to hold a training school for other cooperating agencies. In this school the main object is to acquaint those of the cooperative REA, power companies and machinery dealers, with our recommendations and actual figuring out of problems.

BARN HAY DRIERS

The 1945 census shows the acreage planted to tame hay in North Carolina as 1,212,000 acres. This is the second crop in point of acres in our state. It is grown in every county of the State and is the most important single feed in our expanding dairy and cattle industry.

While hay is of great importance to the cattle industry and to work stock, the quality produced varies more widely in feeding value than any other one item in the feed ration.

In North Carolina, according to the head of the Extension Dairy Department, there are 25 counties which have a cash income of more than $500,000.00 each, from dairies, and many others which have dairy incomes of over $250,000.00. As we are gradually growing into dairying and the production of more beef cattle, farmers are becoming more interested in growing more and better hay.

Climatic conditions for producing high quality hay in this state are good, but the climate for producing good hay, is not good for curing and saving high quality hay. The types of hay cover a wide range,

grass, soy beans, clover, cereal, lespedeza and alfalfa. Losses in field curing range from partial to complete loss of leaf and green color to the complete loss of the crop during adverse weather conditions.

There has been a marked increase in requests for assistance in the planning and construction of barn hay driers. The greater part of my time will be given to this work. I have planned to visit the counties requesting assistance, and in company with the agent or assistant agent, to visit the farmers. On these visits the needs of the farmers will be discussed, buildings will be inspected and measured so that correct sizes of blowers and electrical equipment may be recommended.

1947

PLAN OF WORK FOR RURAL ELECTRIFICATION

By W. J. Ridout, Jr., Agricultural Engineering Extension Specialist

I. SITUATION

During 1946 the lack of materials, including the materials to build rural electric distribution lines in North Carolina, overshadowed the actual work that was done and the farm people that were connected. Actually, there were more farms served in 1945 than in any other year in the past according to the Rural Electrification Administration. In North Carolina, according to the latest report of the North Carolina Rural Electrification Authority, there were 45,802.44 miles of rural line serving 246,168 customers. It has been estimated that approximately 65 per cent of the customers served by rural lines are farmers who derive over 50 per cent of their income from that farm. By calculating, we find that in North Carolina to date we have at least 50 per cent of our farms electrified. The utilities, cooperatives, and municipalities have built a considerable mileage of rural lines the latter part of 1946, but the farmer is not being served due to the scarcity of such items as transformers. Many of the power suppliers have preferred not to start any construction until all materials are on hand to complete a job, and as a result their warehouses are filled to capacity with building materials just waiting for maybe one or two scarce items. If our power suppliers can get these scarce items in 1947, our per cent of farms electrified should pass the 60 per cent mark by the latter part of the year.

Most of the Electric Service Organizations in North Carolina are finding themselves in the same position as a majority of the farmers are in today with reference to inadequate wiring. Due to the unexpected acceptance and utilization of electricity on the farms, practically every transformer in North Carolina located on a single phase rural line is loaded to its utmost capacity. Therefore, the Electric Service Organizations in North Carolina are making every effort to serve as many farmers as possible in the least amount of time working with this increasing problem of furnishing adequate service to the farms that are already enjoying the advantages of electricity.

II. EXTENSION PROCEDURE AND PROBLEM SOLUTIONS

A. Safe and Adequate Wiring

During 1946 about half the Rural Electrification Specialist's time was devoted to the holding of safe and adequate wiring meetings on a county level, and preparing leaflets and bulletins dealing with the subject. It is felt that this work should again in 1947 demand a large per cent of the Specialist's time. It is the basis for the satisfactory operation of all electrical appliances.

The following are methods that will be used in teaching safe and adequate wiring in 1947:

1. County agricultural workers education. Special emphasis will be put on the training of County Extension and County Vocational Educational Workers with the help of local representatives of Electric Service Organizations.
2. County and community meetings with farm people who are receiving electric service immediately.
3. Encourage wiring contractors to do adequate wiring, as well as safe wiring.
4. Encourage a rigid inspection.
5. Distribute existing leaflets and bulletins through County Extension Workers and Electric Service Organizations to farmers about to receive electric service.
6. Complete preparation of a detailed wiring bulletin started in 1946.

B. Practical and Economical Utilization

It is anticipated that much electrical as well as other types of equipment will become available in 1947. Much of this equipment is just what the farmer should be using on his farm. On the other hand, there is certain equipment that should not be purchased by the farmer until his needs have been analyzed. The farm freezer or storage cabinet is a typical example. A particular farmer might think that a small storage cabinet would fill his needs until his needs have been analyzed and it is found that a larger storage cabinet with a small quick freezing compartment is the unit that will do his job best for him. Other equipment such as electric brooders, feed grinders, milking machines, dairy refrigerators, and hay driers should not be purchased and installed, or be built by the farmer until his needs have been properly analyzed. This is an Extension job.

This service will be rendered to the farmer by:

1. County and community meetings.
2. Local dealer education--attempt to acquaint the dealers with the farmers individual needs.
3. News articles, leaflets, and bulletins.

C. 4-H Club Activities

The Rural Electrification Specialist is particularly interested in the 4-H Better Methods Contest. During 1946 considerable time was devoted to this work and 4-H Club camps, but it has been found that a good deal more time will have to be devoted to the Better Methods Contest in 1947 if satisfactory results are expected.

It is believed that the Electric Service Organizations in cooperation with local Extension personnel and electric dealers can render a valuable service on a county level. It is hoped that through the cooperation of all these organizations we will be able to create more local interest in the contest, and as a result teach the 4-H Club boys and girls more about the use of electricity on the farm.

Job breakdowns and other helpful information will be prepared and furnished to all 4-H Club boys and girls participating in this contest.

III. EXTENSION LITERATURE AND ILLUSTRATIVE MATERIAL

A. The following are Extension and other informational materials to be used in 1947:

1. Using Electricity on North Carolina Farms.
2. Wiring and Lighting the Farm Home.
3. Plan No. 87--Have Electrically Equipped Dairy Barns
4. Electricity on the Poultry Farm (mimeographed)
5. Electric Brooding for Chicks (mimeographed)
6. Selection of Electrical Equipment (mimeographed)
7. Care and Repair of Electrical Equipment
8. A Home-Made Electric Brooder (mimeographed)
9. The Lamp Brooder
10. List of Approved Electric Fences (mimeographed)
11. Commercial publications where applicable

The following is a list of material that will be used by 4-H members in 1947:

1. 4-H Club Manual, including among others the following projects:

   a. Making an extension cord
   b. Selecting an I.E.S. lamp
   c. Making an electric lamp from a kerosene kamp
   d. Making an electric brooder
   e. How to read a meter and compute an electric bill
   f. How to make a small motor portable
   g. How to make a home-made yard light
   h. Electrical current, wire sizes and fuses

B. The following leaflets and bulletins are being prepared, or will be prepared in 1947:

1. An Electric Pig Brooder
2. Safe and Adequate Wiring
3. Welding on Rural Lines
4. Job Breakdowns for 4-H Club Boys and Girls
5. Wire Size Selection Charts
6. Pulley Size Selection Charts

IV. REQUEST FOR WORK BY COUNTY EXTENSION WORKERS

Due to the uncertainty of rural line construction, the County Extension Workers cannot request meetings on adequate wiring for specific dates. They have been advised against holding meetings in areas where it has not been determined by the Electric Service Organizations that the community in question will not receive service in the immediate future, therefore, the counties requesting wiring meetings on the following page is by no means a complete list for the year.

A PLAN OF SPECIALISTS' WORK AT THE STATE LEVEL

Agricultural Engineering 1947

Line of work _____ 194__

Type of work and number of days for each

Write in month and specialist's name under each month	Preparation of bulletins	Preparation of educational materials	Preparation of news and radio material	Group conferences in State and out	Training schools	Office conferences and correspondence	Preparing plan of work	Preparing annual report	Work up field notes	Cooperative work with U.S. Service organizations	Annual leave	Days allotted to office work	Days allotted to field work	Days reserved for allotment later	Total days for month
WEAVER		1		2	1	3	5				10		1	0	23
ELLIS		1		4		5	5				5	2			23
FERGUSON				1	0	1	3				8	4	6		23
MCCASLAN	3	2	1	2		4	2			2		2	3	6	25
RIDOUT		2	1	1		6		6				5	4	1	26
WEAVER				1	6	2		2½					14½	0	26
ELLIS		2	1	1		4		3					5	10	26
FERGUSON		1	2	2		2		2	3			3	10	1	26
MCCASLAN	2	3	1	2		3		3		3		3	3	4	26
RIDOUT	1		1	2		6						8	4	2	24
WEAVER		1	1	1		2½		4					14½		24
ELLIS		1	1	1		3		2				3	8	5	24
FERGUSON				1	4	1			1			4	13		24
MCCASLAN	2	1	2	2	6	4						1	2	3	23
RIDOUT															

December 1946

January '47

February

A PLAN OF SPECIALISTS' WORK AT THE STATE LEVEL

Line of work Agricultural Engineering 1947

Type of work and number of days for each

Write in month and specialist's name under each month	Preparation of bulletins	Preparation of educational materials	Preparation of news and radio material	Group conferences in State and out	Training schools	Office conferences and correspondence	Preparing plan of work	Preparing annual report	Work up field notes	Cooperative work with Ext. Serv. Organizations	Annual leave	Days allotted to office work	Days allotted to field work	Days reserved for allotment later	Total days for month	
WEAVER	2	1	1	2		6						5	6	3	26	March 1947
ELLIS		2	1	2		3						2	14	2	26	
FERGUSON		1	1	1		4					3	2	7	8	26	
MCCASLAN			1	1		1			3			2	16	2	26	
RIDOUT	3	2	1			3				2		3	4	8	26	
WEAVER	3		1	1		6						6	8		25	April
ELLIS		1	1	1		2						3	17		25	
FERGUSON		1	1	2		4						1	10	6	25	
MCCASLAN						1			5			4	13	2	25	
RIDOUT	2	1	1	2		2				2		4	3	9	26	
WEAVER			1	2		6						6	10	1	26	May
ELLIS		1	1	2		2						2	16	2	26	
FERGUSON			1	1		5					3	1	11	4	26	
MCCASLAN			1			2			3			3	15	2	26	
RIDOUT	2	2	1	2		3				1		2	5	8	26	

A PLAN OF SPECIALISTS' WORK AT THE STATE LEVEL

Line of work Agricultural Engineering 194 7

Type of work and number of days for each

Write in month and specialist's name under each month	Preparation of bulletins	Preparation of educational materials	Preparation of news and radio material	Group conferences in State and out	Training schools	Office conferences and correspondence	Preparing plan of work	Preparing annual report	Work up field notes Coop.work with Electric Service Organizations.	Annual leave	Days allotted to office work	Days allotted to field work	Days reserved for allotment later	Total days for month
WEAVER			1	2		2				4	5	10	1	25
ELLIS		2	1	1		1					2	16	2	25
FERGUSON			1	1		4					2	5	12	25
MCCASLAN		1		1		2			4		3	11	3	25
RIDOUT	1	2	1			4				2	5		10	25
WEAVER			1	2		2				2	7	10	2	26
ELLIS		1	1	1½		2					2	16½	2	26
FERGUSON		1	2	1		4				3		5	10	26
MCCASLAN		1	1	1		1		4			4	9	5	26
RIDOUT	2	1	2	2		3			3	5		1	7	26
WEAVER	2		1	2		2					5	12	1	25
ELLIS						1				12		12		25
FERGUSON		1	1	1		3					2	12	5	25
MCCASLAN		1		1		1			4	4	4	7	4	26
RIDOUT	3	1	1		10	4					2	2	2	25

June 1947

July

August

A PLAN OF SPECIALISTS' WORK AT THE STATE LEVEL

Line of work Agricultural Engineering, 194 1947

Type of work and number of days for each

Write in month and specialist's name under each month	Preparation of bulletins	Preparation of educational materials	Preparation of news and radio material	Group conferences in State and out	Training schools	Office conferences and correspondence	Preparing plan of work	Preparing annual report	Work up field notes	Cooperative work with Elec. Serv. Organizations	Annual leave	Days allotted to office work	Days allotted to field work	Days reserved for allotment later	Total days for month	
WEAVER	4		1	1		2						9	6	2	25	September 1947
ELLIS		2	1	2		2						4	9	5	25	
FERGUSON		1	1	1		3						2	10	7	25	
MCCASLAN		1		1		2			5			4	7	5	25	
RIDOUT	2	1	1	2		4				3		2	2	10	25	
WEAVER			1	1	10	4						4	6	1	27	
ELLIS		2	1	1		2½						6	9½	5	27	
FERGUSON		1		1		4						3	14	4	27	
MCCASLAN		1	1	1		2			4		4	4	5	5	27	October
RIDOUT	3	1	2			5				1		4		11	27	
WEAVER			1	1		4	4					9	4	2	25	
ELLIS		1		6			6						6	6	25	
FERGUSON		1	1	1		3						3	6	10	25	
MCCASLAN				10		1						4	6	2	23	November
RIDOUT	2	1	1	8						1		3		7	23	

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work ~~AGR. ENGINEERING~~ 1946

Write in counties to be served for the month DECEMBER 1946	Description of work to be done in Counties	Days devoted to work by					Total days to County
		D.S.WEAVER	H.M.ELLIS	J.C.FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	
Person	Farm building materials	1					
Union	Community house	1					
Sampson	Drainage survey		1				
Wayne	Barn hay drier recommendations				1		
Halifax	" " " "				1		
Beaufort	" " " "				1		
Randolph	" " " "				1		
Wake	" " " "				1		
Guilford	Planning hay drier school.				1		
		2	1		6		
JANUARY '47							
Carteret	Freezer locker plant	1					
Davidson	Dairy barn materials & planning	1					
	~~Hold 1-day schools for instructors~~ of drainage course for ~~training AAA ass't.~~drainage supervisors, from eastern counties.		6				
Camden	Ditch blasting demonstration		2				
Pasquotank	" " "		1				
Hyde	" " "		2				
Craven	" " "		1½				

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work ~~AGR. ENGINEERING~~ 194~~7~~

Write in counties to be served for the month JANUARY 1947 CONTINUED	Description of work to be done in Counties	Days devoted to work by					Total days to County
		D.S.WEAVER	H.M.ELLIS	J.C.FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	
New Hanover	Ditch blasting demonstration		2				
Person	" " "		1				
Johnston	" " "		1				
Harnett	" " "		1				
Washington	Drainage surveys & recommendations		1				
Onslow	" " "		1				
Pender	" " "		1				
Robeson	Cotton gins			1			
Scotland	" "			1			
GASTON	" "			1			
Cleveland	" "			1			
Rutherford	" "			1			
Harnett	Checking delinting cotton seed				1		
Rutherford	Installing cotton seed delinter				2		
Wayne	Barn Hay Drier recommendations				1		
Beaufort	" " " "				1		
Edgecombe	" " " "				1		
Halifax	" " " "				1		
Hyde	" " " "				1		

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month	Description of work to be done in Counties	Days devoted to work by D.S.WEAVER	H.M. ELLIS	J.C. FERGUSON	C.L.MCCASLAN	W.J. RIDOUT,JR.	Total days to County
January 1947 continued							
Vance	Barn hay drier recommendations				1		
Wake	" " " "				1		
Sampson	4-H Better methods contest					1	
Bertie	Safe and adequate wiring					1	
Hyde	" " "					1	
		2	14½	5	10	3	
FEBRUARY							
Davie	General engineering	1					
Robeson	Farm Bldg. materials	1					
Mecklenburg	" " "	1					
McDowell	Farm Bldgs.		1				
Lee	Terrace construction dem.		1				
Anson	Ditch blasting demonstration		1½				
Richmond	" " "		1				
Scotland	" " "		1				
Robeson	" " "		2				
Union	" " "		1				
Montgomery	" " "		1				

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month February 1947 Continued	Description of work to be done in Counties	Days devoted to work by D. S. WEAVER	H. M. ELLIS	J. C. FERGUSON	C. L. MCCASLAN	W. J. RIDOUT, JR.	Total days to County
Cleveland	Ditch Blasting Demonstration		2				
Polk	" " "		1				
Caldwell	" " "		2				
Lee	Farm machinery			1			
Robeson	" "			2			
Wayne	" "			2			
Edgecombe	" "			1			
Warren	" "			2			
Anson	Farm buildings				1		
Rutherford	Cotton seed delinting				1		
Pender	Barn hay drier recommendations				2		
Edgecombe	" " " "				1		
Nash	" " " "				1		
Davie	" " " "				2		
Gaston	" " " "				1		
Iredell	" " " "				2		
Surry	" " " "				3		
Wake	" " " "				1		
Alleghaney	" " " "				1		
Sampson	House wiring - water supply					1	
Davie	Safe and adequate wiring					1	
		3	14½	8	16	2	

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month MARCH 1947	Description of work to be done in Counties	Days devoted to work by D.S. WEAVER	H. M. ELLIS	J. C. FERGUSON	C.L. MCCASLAN	W.J. RIDOUT, JR.	Total days to County
Franklin	Freezer locker meeting	1					
Caldwell	General engineering	1					
Vance	Rural housing meeting	1					
Alleghaney	Ditch blasting demonstration		2				
Davidson	" " "		2				
Surry	" " "		2				
Davie	" " "		1				
Stokes	" " "		1				
Rockingham	" " "		1				
Caswell	" " "		1				
Nash	" " "		1				
Edgecombe	" " "		1				
Lenoir	" " "		1				
Greene	Tile drainage demonstration		1				
Rockingham	Farm Machinery			2			
Robeson	Cotton Production meetings			1			
Scotland	" " "			1			
Cumberland	" " "			1			
Sampson	" " "			1			
Wayne	" " "			1			

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month MARCH 1947 Continued	Description of work to be done in Counties	Days devoted to work by D.S.WEAVER	H. M. ELLIS	J. C. FERGUSON	C. L. MCCASLAN	W. J. RIDOUT, JR.	Total days to County
Cumberlan d	Barn hay drier recommendations				1		
Harnett	" " " "				1		
Alexander	" " " "				1		
Caldwell	" " " "				1		
Gaston	" " " "				1		
Union	" " " "				1		
Chatham	" " " "				1		
Randolph	" " " "				1		
Buncombe	" " " "				2		
Catawba	Recommending Checking old driers. new ones.				2		
Iredell	" hay " & farm bldgs.				2		
Henderson	" barn " " " " "				2		
Craven	Safe and adequate wiring					1	
Nash	Proper use of electrical equip.					2	
Union	Electrical hot beds					1	
		3	14	7	16	4	

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work Agr. Engineering 1947

Write in counties to be served for the month APRIL 1947	Description of work to be done in Counties	Days devoted to work by D.S.WEAVER	H.M.ELLIS	J.C.FERGUSON	C.L.MCCASLAN	W.J.FIDOUT,JR.	Total days to County
Rutherford	Drainage survey		2				
Vance	"		1				
Durham	"		1				
Alamance	"		1				
Chatham	"		1				
Ashe	"		2				
Watauga	"		1				
Wilkes	"		1				
Lincoln	"		2				
Madison	"		1				
Yancey	"		1				
Mitchell	"		2				
Wayne	"		1				
Caswell	Farm machinery meetings			1			
Bladen				1			
Bertie				1			
Edgecombe				1			
Clevelan d				1			
Robeson				1			
Halifax	Cotton production meetings			1			
Nash				1			
Cleveland				1			
Mecklenburg				1			
Johnson	Barn hay drier recommendations				1		
Wayne	" "				1		
Davidson	" "				1		
Stokes	" "				1		
Buncombe	" "				1		
Burke	" "				2		
Macon	" "				2		
Sampson	Checking h.driers & rec.new ones				1		
Catawba	" " "				1		
Rowan	" " "				1		
Forsyth	Barn hay drier rec.& build barn				2		
Haywood	Forced ventilation tobacco barn				1		

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month	Description of work to be done in Counties	Days devoted to work by D.S.WEAVER	H.M.ELLIS	J. C. FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	Total days to County
APRIL 1947 Continued							
Iredell	4-H and Adult Rural Elec.					1	
~~Jackson~~	~~Elec. farm equipment~~					1	
McDowell	Rural elec. education					1	
		0	17	10	15	3	
MAY 1947							
Anson	Rural housing meeting	1					
Watauga	General engineering	1					
~~Jackson~~	~~Water system survey~~		2				
Transylvania	Ditch blasting demonstration		1				
~~Henderson~~	" " "		1				
Rutherford	" " "		2				
~~Rowan~~	" " "		1				
Bertie	Farm pond survey		1	2			
~~Hertford~~	" " "		1				
Chowan	Drainage "		1				
~~Washington~~	" "		1				
Iredell	Terracing		1	2			
~~Cabarrus~~	"		1				
Stanly	Farm buildings		1				
Hoke	Farm machinery			2			
Warren	"			2			
Edgecombe	2			2			
Rutherford	"			1			
Cleveland	"			1			
Halifax	"			2			
Wake	"			1			
Catawba	Checking hay drier installation				1		
Alamance	" " " & rec. new ones.				1		
Craven	Barn hay drier recommendations				4		
Cumberland	" " " "				1		
Johnston	" " " "				1		

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month	Description of work to be done in Counties	Days devoted to work by					Total days to County
		D.S.WEAVER	H.M.ELLIS	J.C. FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	
MAY 1947 Continued							
Scotland	Barn hay drier recommendations				1		
Mecklenburg	" "				2		
Richmond	" "				1		
Davidson	" "				1		
Guilford	" "				2		
Robeson	Better wiring school					1	
Alleghaney	"					1	
Cherokee	"					1	
Haywood	Rural elec. education					1	
Madison	Safe and adequate wiring					1	
		2	16	11	15	5	
JUNE 1947							
Mecklenburg	General engineering	1					
New Hanover	Farm buildings	1					
Clay	Water systems		2				
Cherokee	" "		1				
Graham	Drainage surveys		1				
Swain	" "		2				
Gaston	4-H Camp - handicraft classes		2				
Bertie	"		2				
Edgecombe	"		2				
Lenoir	"		2				
Harnett	Farm Machinery			1			
Robeson	"			1			
Sampson	"			1			
Mecklenburg	"			2			
Iredell	Barn hay drier installation				2		
Wayne	" "				1		
Pitt	" "				1		
Guilford	" "				3		
Cleveland	" recommendations				1		
Mecklenburg	" "				1		
Richmond	" "				1		
Alamance	" "				1		
		2	14	5	11	0	

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work ~~AGR. ENGINEERING~~ 194~~7~~

Write in counties to be served for the month JULY 1947	Description of work to be done in Counties	Days devoted to work by D.S.WEAVER	H.M.ELLIS	J.C.FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	Total days to County
Halifax	Tile Drainage		1½				
Gates	Ditch blasting demonstration		1				
Martin	Terracing		1				
Pitt	Water systems		1				
Cleveland	4-H Camp - handicrafts classes						
Polk	" "						
Sampson	" "						
Alamance	" Time to be "		1	2			
Durham	" ~~allotted after~~ "						
Rockingham	" camp dates "						
Stokes	" are known. "						
Chowan	cotton gins			1			
Catawba	"			1			
Montgomery	"			1			
Anson	"			2			
Wayne	Check barn hay driers				1		
Chowan	" peanut drier				1		
Cleveland	Barn hay drier recommendations				2		
~~Guilford~~	~~" " "~~				~~2~~		
Rowan	" " installation				3		
~~Yancey~~	~~Safe and adequate wiring~~					1	
		0	16½	5	9	1	
AUGUST ~~1947~~							
~~Greene~~	~~4-H Camps - handicrafts classes~~						
Perquimans							
~~Bladen~~	Time to						
Carteret	be						
~~Craven~~	allotted						
Duplin	after		12				
~~Lenoir~~	camp						
Onslow	dates are known						
~~Pamlico~~	~~12 days~~						
Harnett	Cotton gins			1			
~~Sampson~~	" "			2			
Scotland	" "			2			

A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work Agr. Engineering 194~~7~~

Write in counties to be served for the month	Description of work to be done in Counties	Days devoted to work by					Total days to County
		D.S.Weaver	H. M. Ellis	J. C. Ferguson	C. L. McCaslan	W. J. Ridout, Jr.	
AUGUST 1947 Continued							
Wayne	Cotton gins			1			
Wilson	"			1			
Northampton	"			2			
Anson	"			1			
Cleveland	"			2			
Johnston	Barn hay drier recommendations				1		
Lenoir	" " "				1		
Davidson	" " "				1		
Rowan	" " installation				2		
Guilford	" " "				2		
Union	Elec. S.potato curing house and " corn drying					2	
		0	12	12	7	2	
SEPTEMBER							
Madison	Housing meeting	1					
Jackson	Freezer-locker plant	1					
Yadkin	Terracing		1½				
Forsyth	"		1				
Guilford	"		1				
Caswell	Farm buildings		1				
Beaufort	Ditch blasting demonstration		1½				
Pitt	Water		1				
Wake	"		1				
Wilson	Drainage		1				
Cumberland	Cotton gins			1			
Anson	" "			2			
Gaston	" "			1			
Halifax	" "			2			
Northampton	" "			2			
Johnston	" "			2			
Johnston	Barn hay drier recommendations				1		
Union	" "				1		
Alamance	" "				1		
Davidson	" "				1		
Bertie	Safe & Adequate wiring					1	
Forsyth	Elec. Equip. & lighting					1	
		2	9	10	4	2	

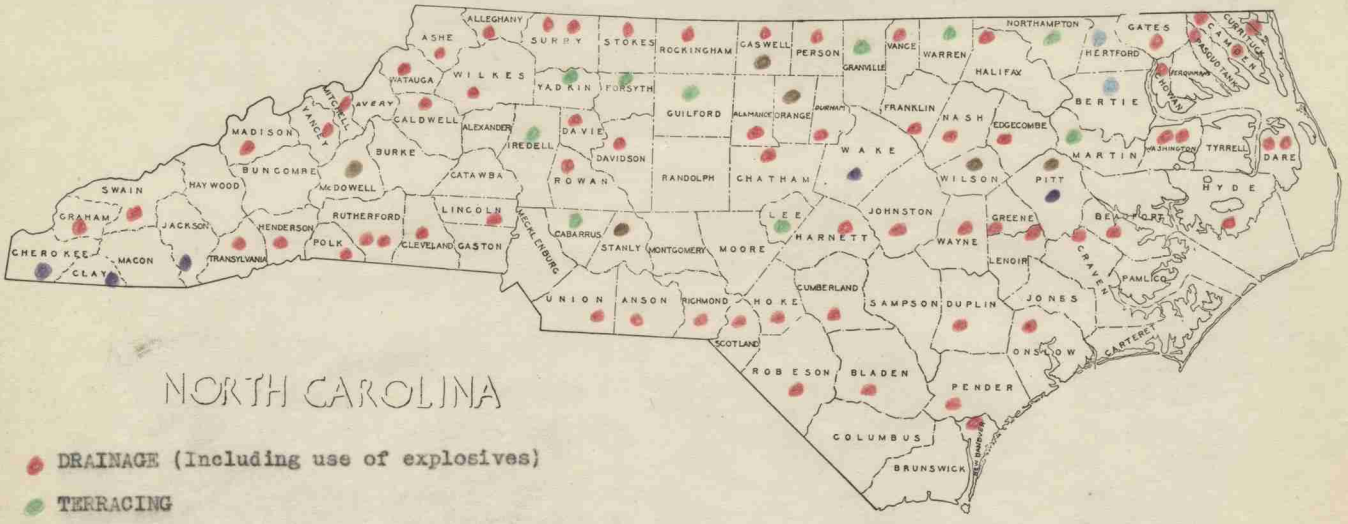
A PLAN OF SPECIALIST'S WORK AT THE COUNTY LEVEL

Line of work AGR. ENGINEERING 1947

Write in counties to be served for the month	Description of work to be done in Counties	Days devoted to work by					Total days to County
OCTOBER 1947		D.S.WEAVER	H.M.ELLIS	J.C.FERGUSON	C.L.MCCASLAN	W.J.RIDOUT,JR.	
~~Harnett~~	~~General engineering~~	1					
Johnston	Rural housing	1					
~~New Hanover~~	~~Fire prevention~~	1					
Mecklenburg	Housing	1					
~~Camden~~	~~Drainage~~		2				
Currituck	"		1				
~~Dare~~	"		2				
Cumberland	"		1				
~~Bleden~~	~~Ditch blasting demonstration~~		1				
Hoke	" " "		1				
~~Robeson~~	~~Farm machinery~~			2			
Wayne	"			2			
~~Halifax~~	"			2			
Cleveland	"			2			
~~Mecklenburg~~	"			2			
Iredell	Cotton gins			2			
Rutherford	"			1			
Polk	"			1			
Scotland	Barn hay drier recommendations				1		
		4	8	14	1	0	
NOVEMBER							
Scotland	Community house	1					
Granville	Terracing		1				
Warren	"		1				
Northampton	"		2				
Franklin	Ditch blasting demonstration		1				
Duplin	" " "		2				
Orange	Farm buildings		1				
Surry	" Machinery			1			
Bertie	" "			1			
Craven	" "			1			
Columbus	" "			1			
Lenoir	" "			1			
Pamlico	" "			1			
Davie	Check barn hay drier installation				2		
Surry	" " " "				3		
Wake	" " " "				1		
		1	7	6	6	0	

H. M. Ellis - 1947

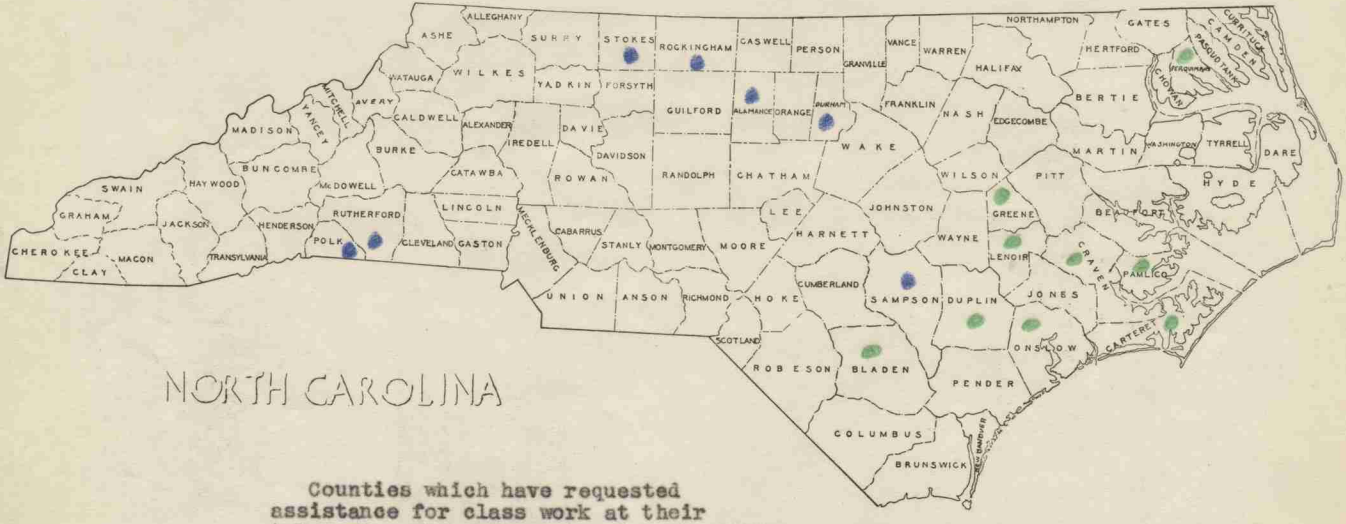
Days Planned In Counties According to Requ ests Made by Agents in Annual Plan of Work



NORTH CAROLINA

- DRAINAGE (Including use of explosives)
- TERRACING
- WATER SYSTEMS
- FARM PONDS AND IRRIGATION
- BUILDINGS

(Above does not include 24 days planned at 4-H Camps)



NORTH CAROLINA

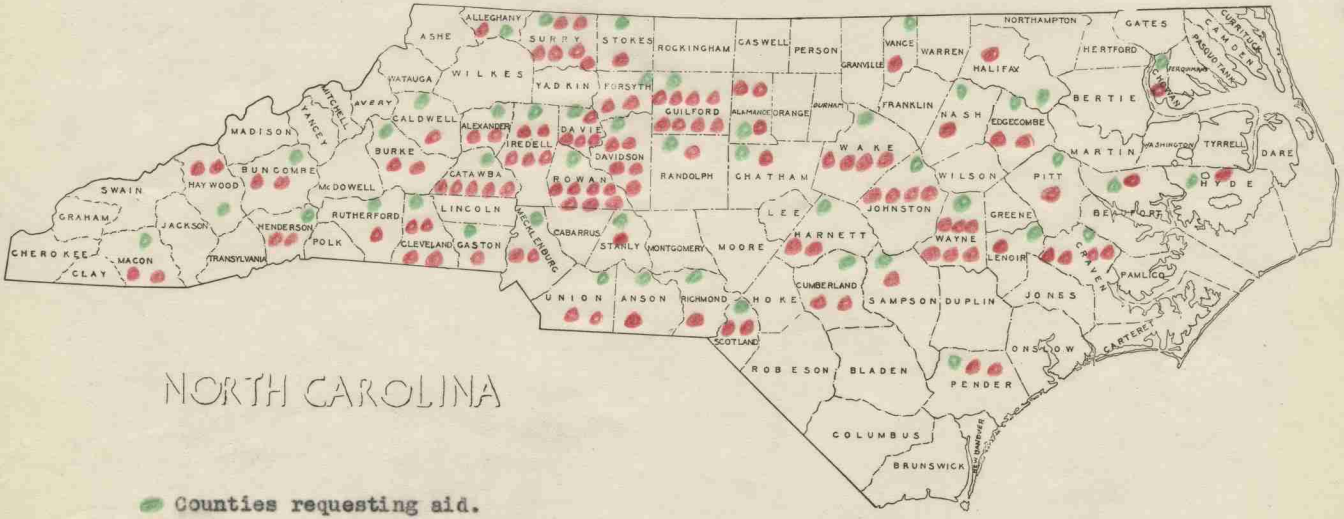
Counties which have requested assistance for class work at their 4-H Camps. D. S. Weaver and H. M. Ellis will conduct this work.

JUNE

JULY

AUGUST

Work Planned for 1947 - C. L. McCaslan



NORTH CAROLINA

Counties requesting aid.

Days allotted.