TEACHER EDUCATION IN AGRICULTURE - A FORWARD LOOK

Prof. Joe P. Bail

Beginning as early as 1958 and continuing today, a critical review of the program in agricultural education in New York State, including course offerings, teacher preparation, and curriculum content, has been underway. Several major changes have taken place during this time which are particularly significant in the development of programs designed to meet the needs of workers in agricultural occupations - both on-the-farm and off-the-farm. A brief listing follows.

1958-59 - A specialized offering in agriculture at the high school level titled agricultural mechanics. Parenthetically, it may be added that horticulture has been a regular offering in some schools since early 1930's.

1958-59 - Research project to identify off-farm occupations which require competency in agriculture. (Syracuse Economic Area - Professors Tom and Hill).

1958-60 - Preliminary series of proposed state courses of study in specialized areas.

1960-63 - Series of proposed teaching units to accompany state courses of study.

1964 - New definition of Agricultural Education in New York to include five specialized areas: Farm Production and Management, Agricultural Business, Agricultural Mechanization, Conservation, and Ornamental Horticulture.

1964-65 - Comprehensive Study of Off-Farm Agricultural Occupations in New York State. (Professor Cushman and et.al).

1965 - Courses of study for each specialized area developed.

1966 - Modification of Cornell program to train teachers of agriculture in the five specialized areas. Approved September 1, 1966.

We shall speak of the last development only since it is the particular concern of this article.

Members of the Joint Staff in Agricultural Education (supervisors and teacher trainers) were constantly reviewing the undergraduate teacher preparation program throughout the period. A number of conclusions were evident:
1. Specialization of course offerings at the high school level.

2. Selection of student teaching centers must reflect course specialization.

3. Flexibility must be provided in order to plan the most meaningful teacher training program.

4. Recruitment of prospective teachers must be broadened.

As a result of these observations, the present program of teacher education in agriculture was approved by the Joint Staff in Agricultural Education and submitted and approved by the State Department of Education.

CERTIFICATION REQUIREMENTS FOR TEACHERS OF AGRICULTURE IN NEW YORK STATE*

I. Provisional Certificate

A. The candidate shall have completed a four-year curriculum leading to the baccalaureate degree including:

1. 18 semester hours in professional courses approved for public school teaching of agriculture as follows:
   (a) eight to ten semester hours in the body of knowledge which established the social, philosophical, and psychological foundations of educational theory and practice;
   (b) eight to ten semester hours in the skills which include methods and materials of teaching agricultural subjects and supervised observation and practice teaching.

2. 36 semester hours in technical agriculture courses in accordance with the following.

<table>
<thead>
<tr>
<th>Course</th>
<th>Minimum</th>
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<tbody>
<tr>
<td>Agricultural Economics</td>
<td>6</td>
</tr>
<tr>
<td>Agricultural Engineering</td>
<td>6</td>
</tr>
<tr>
<td>Crops and Soil Science</td>
<td>6</td>
</tr>
<tr>
<td>Additional semester hours for validating certificate in one of the special fields below**</td>
<td>12</td>
</tr>
</tbody>
</table>

   (a) Agricultural Business
      Accounting and Business Management | 6
      Other courses in this special field | 6

   (b) Agricultural Mechanization
      Agricultural engineering in addition to those above | 12

* Effective September 1, 1966.
** Successful candidates are endorsed in one or more of the specialities listed.
<table>
<thead>
<tr>
<th>Course</th>
<th>Semester Hours</th>
</tr>
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<tbody>
<tr>
<td>(c) Conservation</td>
<td></td>
</tr>
<tr>
<td>Conservation, forestry and wildlife</td>
<td>12</td>
</tr>
<tr>
<td>Management</td>
<td></td>
</tr>
<tr>
<td>(d) Farm Production and Management</td>
<td></td>
</tr>
<tr>
<td>Feeding, breeding and management of dairy cattle</td>
<td>9</td>
</tr>
<tr>
<td>Crops in addition to those above</td>
<td>3</td>
</tr>
<tr>
<td>(e) Ornamental Horticulture</td>
<td></td>
</tr>
<tr>
<td>Ornamental horticulture, floriculture and landscaping</td>
<td>12</td>
</tr>
<tr>
<td>Electives</td>
<td>6</td>
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</tbody>
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3. 12 semester hours chosen from the fields listed under Item 2 and/or courses in agronomy, agriculture bacteriology, agricultural drawing, animal husbandry, animal physiology, apiculture, dairy science, entomology, extension teaching, food science, horticulture, plant breeding, plant pathology, pomology, poultry, rural sociology, vegetable crops.

4. To validate the certificate in more than one of the special fields, the candidate must complete the required 12 semester hours listed for each field in which validation is desired.

B. **Time Validity** - The provisional certificate shall be valid for ten years from date of issuance.

II. **Permanent Certificate**

A. The candidate shall have completed a four-year curriculum leading to the baccalaureate degree and in addition, 30 semester hours in approved courses including 15 semester hours in agricultural education and/or technical agriculture. The total program of college and post-college preparation shall include the preparation required for the issuance of the provisional teacher's certificate.

B. To validate the certificate in more than one of the special fields, the candidate must complete the required 12 semester hours listed for each field in which validation is desired.

**Advising of students who plan to teach agriculture at the public school level.**

At the undergraduate level, two alternatives are available:

(a) The student may advise with a staff member in any department of the College of Agriculture.

(b) The student may advise with staff members in the Division of Agricultural Education, Department of Education.
If alternative(s) is chosen, the counsel of a staff member in agricultural education must be sought to assist in planning the professional education part of the program. Assignment to a student teaching center is the sole responsibility of the agricultural education staff. Selection of such centers, either in Central Schools, Area Vocational Schools, or City School Districts is delegated to the Joint Staff in Agricultural Education. (As prescribed in the State Plan for Vocational Education.)

The flexibility and freedom provided in this plan has greatly increased student interest in teaching agriculture. The opportunity to major in any of a number of fields at the undergraduate level and still meet certification standards has contributed greatly to this interest. The use of specialized titles at the high school level has also resulted in a broader acceptance of agriculture as a field of study for pupils of this age level. College staff members in the technical areas of agriculture now feel more a part of the teacher education program. They are also more prone to listen to the inservice and instructional materials needs expressed by former students, now teaching in the specialized areas. Altogether, the changes made have greatly improved the image as well as understanding of the program in agricultural education.

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