Conclusions/Recommendations

Below are several conclusions/recommendations based on the data collected with the questionnaire:

- 1. Over one-third (35%) of the faculty members in the College of Agriculture who responded to the questionnaire had five or less years of teaching experience. There would seem to be a sizable number of faculty members who could still be in the formative stages of developing a teaching style and may benefit most from a program to improve teaching.
- 2. A substantial percent (65%) of the teaching faculty in the College of Agriculture have less than a 50 percent teaching appointment, thus indicating that faculty have many other commitments.
- 3. Only 16.3 percent of the respondents have been certified to teach indicating they have completed the education courses for their degree. This indicates a large percentage of faculty members have not had the opportunity to take education courses they could apply directly to improve their teaching.
- 4. Three courses in education could have potential interest if offered as faculty improvement opportunities.
 - These are: 1) Strategies for Teaching methods, 2) Electronic Media audio/visual aids, and 3) Curriculum Development and Evaluation.
- 5. Almost 78 percent of the respondents reported that their student evaluations indicated their teaching was effective, but needs improvement. This should confirm that there is an interest in improving teaching.
- 6. A significant number of faculty said they would like to utilize Ag Communications more in the development of visuals (71.6%), utilize peer classroom observation (63.4%), and utilize video-tape review of teaching (60.0%). These three activities might be considered by RIAC or the Office of Resident Instruction as potential faculty development opportunities.
- 7. The respondents indicated that a financial incentive program to reward excellent teaching (68.5%) would be somewhat to extremely helpful. More research is necessary to determine what might serve as incentives to improve teaching.
- 8. The responses in Table 6 (College of Agriculture response to barriers to successful faculty development programs) raise the fact that nearly one-third of the faculty in the College of Agriculture feel teaching can only be developed through experience (28.2%); excellence in teaching or research is inevitably at the cost of neglecting the other

- (30.8%); members of the academic community possess adequate knowledge of learning theory and motivation (27.3%); therefore, anyone involved in planning and developing faculty development programs must proceed with caution and understanding.
- 9. The tone of the responses to the questionnaire indicated that there is a positive atmosphere in the College of Agriculture to begin a faculty development program. This program should provide the opportunity and incentive for teaching faculty members to improve their teaching.

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Stressed Agricultural Producers' Educational Needs for Seeking Off-farm Employment

Philip Buriak and Rich Whitacre Abstract

Agricultural producers and their spouses were surveyed to determine educational and training needs and delivery systems congruent with needs and schedules of those seeking off-farm employment. Instructional topics were identified. Programs targeted to this group should be offered in an interim semester. November through March, in evening sessions lasting 4 to 8 hours.

Background

The United States Department of Agriculture reported in 1985 that more than four percent of all farmers were in such poor financial condition that they would be forced out of farming in 1986, eight percent were in "critical" financial condition, and an additional thirty percent were having moderate to serious financial difficulties. Declining agricultural exports, continued high real interest rates, and declining farm assets are some of the economic factors that have led to

Buriak is an associate professor in Agricultural Engineer at the University of Illinois and Whitacre is a professor at Illinois State University.

this current farming dilemma (Drabenstott & Duncan, 1984). Rural poverty and underemployment continue to be principal economic concerns (Tweeten, 1985). Moreover, the present administration has made it clear that the current level of price supports to agricultural producers will come to an end. The 1985 Agriculture and Food Act was comprised of lower government support prices and reductions in grain reserve and acreage control programs.

The outcome of the combined effects of the economic downturn, the reduction in government support, and increased debt loads and production setbacks, is farmers leaving agriculture as a full-time occupation, or seeking part-time employment to supplement farm income. Farmers and their spouses have been forced into a job market for which they have been ill prepared (Kutlowitz, 1985). Sumner (1982) concluded, "the responsiveness of farmers to off-farm wage opportunities has important implications for resource adjustments to changing economic and social conditions" (p. 508). In addition, Sumner also found that men with some vocational training related to nonfarm work were more likely to work off their farms. Agricultural education can assist producers and their spouses as they search for part or full-time employment alternatives by determining their needs and designing programs to satisfy these needs.

Purpose

The purpose of this study was to identify educational needs of those producers and their spouses interested in obtaining off-farm employment as well as delivery systems and times most congruent with their schedules. Previous research indicated that a demand for off-farm employment does exist (Buriak, Whitacre, and O'Rourke, 1985).

Procedures

A descriptive census study (N = 5280) of agricultural producers and their spouses was conducted in three counties in central Illinois. A needs assessment survey instrument was subsequently developed using the total design method (Dillman, 1978), and validity was assured by a panel of experts. Reliability (alpha = 0.90) was then calculated using item samples (Nunnally, 78). Illinois Farm Bureau membership lists served as the frame for the investigation. Since all targeted producers may not have been Farm Bureau members, frame error was a possibility. Surveys were mailed and follow-up letters were sent. Low response rates were anticipated. To increase confidence in results, a non-respondent sample was selected and surveyed. No appreciable differences in responses were observed when results were compared to those of initial respondents; thus findings were generalizable to the population surveyed. Percentages were used to summarize the data.

Results

Of the 5,280 surveys mailed, 797 or 15% were returned. The executive secretaries of the county Farm

Bureau Associations assisting with the investigation indicated that return rates of 4 to 5 percent for countywide surveys were common.

Demographic data showed 88 percent of the producers to be married males, the majority over 30 years of age. The predominant enterprise was grain/soybean, on farms 100-1000 acres. Thirty-seven percent of the producers had never been enrolled in high school programs of vocational agriculture.

Both the producer and spouse responses indicated that education in the areas of computer operations (82 percent of the respondents), accounting (81.5 percent), business management (79 percent), and office management (77 percent), 'may be necessary' or 'would definitely be necessary' to obtain off-farm employment. Writing and speaking skills (71 percent) and technical training (73 percent) were also considered important areas of education by producers and their spouses. Courses in the liberal arts ranked as the least desirable.

Courses conducted from November through March best fitted the work schedules of producers and their spouses. Virtually no interest was shown for courses offered during other months. Respondents also showed a strong preference (70.5 percent) for class sessions 4-8 hours in length, meeting once or twice a week in the evenings. Approximately one-quarter (26.5 percent) of the respondents chose weekdays, 8:00 a.m. to 12:00 noon as an appropriate time for class meetings. There was little support for weekend programs. Tuition costs did not appear to be a concern. Nearly one-half of the respondents indicated they would enroll in classes at existing tuition rates. An additional 40% would enroll if tuition costs were reduced by 50% or 25%.

Thirty-nine percent of the producers indicated they would enroll in a class or classes to increase their employability, with an additional thirty-nine percent indicating they would probably enroll. Spouse responses mirrored thoses of the producers. An important percentage (18 percent of the producers and 27 percent of the spouses) were interested in pursuing a college degree.

Conclusions and Recommendations

Many agricultural producers and their spouses are interested in obtaining part-time or full-time off-farm employment to supplement declining farm incomes. Further, this same group has identified specific instructional areas believed to be important and is receptive to enhancing employability by participating in educational programs congruent with perceived needs. Programs targeted to this group should be offered in an interim semester, November through March, during the evenings, with each session lasting 4-8 hours.

Perceptions of potential employees regarding education and training needs for off-farm employment have been identified. Perceptions of potential employers could be equally important in the design of educational programs. A second needs assessment study conducted with central Illinois businesses with

objectives similar to this investigation has been recommended and is currently in the design stage. Information from the business survey will be correlated with producer/spouse results, for use in the design of a non-degree certification program to enhance off-farm employability of agricultural producers and their spouses.

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Linking Liberal Arts and Agriculture Through Landscape Design

Mary Haque, William F. Steirer, Jr., J.A. Brittain, Dianna D. Hassell

As agriculturalists, most of us are working toward more visibility for our profession, and as teachers, we are constantly looking for ways to stimulate our students. Interdisciplinary teaching on theme projects is a very exciting approach to achieving both of these goals.

Landscape design students at Clemson University recently had the opportunity to link agriculture and liberal arts when the W.K. Kellogg Foundation sponsored what is called the "Agricultural Literacy Program." Thirteen colleges and universities across America have participated in this program. As one of these, Clemson University was funded \$100,000.00 to be spent in three phases over a period of 3 years, beginning in 1984 and ending in 1987.

The purpose of the agricultural literacy program is to enhance the awareness of faculty, students, and the public about agricultural, food related and human nutrition issues. The program is designed to support curriculum development and improve interdisciplinary exchanges between Liberal Arts and Agricultural Sciences through competitive mini-grant projects awarded to faculty in related academic areas. Potential topics for modules or new courses that were identified by Kellogg officials include plant health, land use and soil erosion, urban sprawl and land use policies, diet and nutrition, water resource depletion as well as preservation of prime farm land.

Two projects linking liberal arts and agriculture through landscape design were completed by history and horticulture students working together at Clemson University. These two projects, entitled "Agricultural Footpath to Pendleton" and "The Clemson Centennial Footpath" both displayed a "Visibility for Vegetation" and an "Agricultural Awareness" theme.

First Kellogg Project

The first Kellogg project with a visibility for vegetation emphasis was entitled "Footpath to Pendleton." Pendleton is a small town located 4 miles from

Haque, Steirer, Brittain and Hassell are members of the Department of Horticulture. Clemson University, SC 29634.

Clemson, SC. It has several points of historic significance, including the Farmer's Hall, which was built around 1814 and which became the meeting hall of the Pendleton Farmer's Society in 1826. The Farmer's Society still owns the Hall and still meets there on a regular basis, making it the oldest Farmer's Society Hall in continuous use in the nation.

Within the four mile distance between Clemson campus and the Farmer's Hall in Pendleton are vegetable and flower gardens, pastures for grazing livestock, agronomic and horticultural research plots, a forest arboretum, soil erosion control experiments, and forest management activities. Dr. Jere Brittain suggested that a network of British-style footpaths connecting these features to the main campus could provide convenient exercise and recreational opportunities while raising the visibility of the vegetation and enhancing awareness of food and agricultural issues among students, faculty, community residents and visitors. In a preliminary Kellogg proposal, Dr. Brittain points out that

Ancient footpaths in England typically meander through pastures, woods, and meadows, connecting country villages by a vigorous walk of an hour or two. Development of such rural intervillage footpaths is usually precluded by the difficulty and expense of obtaining rights-of-way through private lands. A Clemson to Pendleton Footpath System could be developed almost entirely on university property. Fort Hill, near the center of Clemson Campus, and Farmer's Hall at Pendleton are important historical sites in S.C. agriculture. Linkage of these sites by rural footpaths would offer an elegant combination of the oldest traditions and newest field technology in agriculture.

Working from Dr. Brittain's concept, Dr. Theda Perdue and Dr. William Steirer from History and Professor Mary Haque in Horticulture wrote a formal Kellogg proposal which was funded. As with other Kellogg grants, the interdisciplinary aspects of exposing liberal arts students to agriculture and agriculture students to liberal arts were paramount. Two classes, History 313 (The History of South Carolina) and Horticulture 308 (Landscape Design)