UNIVERSITY OUTLOOK PROGRAMS: A REVIEW AND SOME SUGGESTIONS*

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Conducting an outlook program appears to be simple. The aim of outlook is to accurately predict future economic conditions and to rapidly disseminate this information to producers, agribusiness firms and/or consumers, to help them make intelligent production, purchasing and marketing decisions. But those involved know that the appearance of simplicity in conducting an outlook effort is deceiving. Outlook work is frustrating—sometimes gratifying—just as often, humiliating.

The focus here is upon outlook programs in agricultural economics department of the land-grant universities. The role of USDA in outlook work is discussed only in the context of its support of state efforts.

The argument which follows takes as given that the need of market participants for agricultural outlook information is presently great because of unstable prices of farm commodities. It is further assumed that the demand for outlook services will continue to be strong in the foreseeable future, based on prospects for continued instability in the agricultural sector.

Based on a survey of the outlook programs of 15 agricultural economics departments, it is concluded that universities have increased their commitment to outlook in response to this increased need.

Following a description of the manner in which departments typically conduct outlook programs, two troublesome questions are raised regarding legitimacy of outlook within the framework of the educational mission of the land-grant university. It is concluded that a shift in program focus and a strengthening of program content are needed. Finally, some suggestions are offered which might help bring about these program changes.

HISTORY AND CURRENT STATUS OF OUTLOOK WORK

It is germane to trace the origins of outlook programs. Too often programs are continued in a traditional manner for no more important reason than their historic existence. And outlook is almost as old as extension itself.

The genesis of outlook, the first crop reports, were issued in 1841 through the Patent Office. When the Department of Agriculture was established, statistical reporting was put on a continuing basis. The first monthly crop report cited the condition, as of May 1863, of 19 crops in 21 Northern states and the Nebraska Territory [9]. Outlook *per se* began in 1923, when the Department invited a group of leading economists and statisticians to Washington to interpret the first intentions-to-plant report of the BAE in light of economic conditions expected in the coming year [3]. This was the first Outlook Conference and came during an earlier period of price instability. From that time hence, agricultural economics departments have joined USDA and other agencies in appraising economic prospects and furnishing farmers with this information.

Outlook work has recently been placed in a high-priority position nationally. In February 1974, The Extension Committee on Organization and Policy (ECOP) stated: "To help cope with wide price

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fluctuations and market uncertainty, an improved system of outlook and market intelligence is needed from farmer to consumer" [7].

Extension seems to hold its progress in meeting this challenge in high regard. Its outlook programs, strenthened in response to a market-oriented agriculture and changed supply-and-demand conditions, were summarized on page one of the Extension Service's "1974 Highlights" report—ahead of programs dealing with the energy crises; ahead of those dealing with employee health and safety, pest management, point and nonpoint pollution problems [13].

And well it might place outlook in such a position. Based on a survey of 15 agricultural economics departments,[1] one can only conclude that university resources devoted to outlook are considerable and the quantity of output, mind-boggling.

The 15 agricultural economics departments surveyed:

—printed outlook materials in 1975 that would stretch over 4,000 miles.

—made presentations in 1975 to a total number of people that would have filled a large football stadium.

—distributed 46 outlook leaflets, reports and articles an average of 5.5 times a year, with a total circulation of 4.5 million.

—conducted, by faculty, over 500 outlook meetings. Total attendance at these meetings was over 30,000.

—furnished specialist back-up for over 250 outlook meetings conducted by local or area extension personnel.

—presented outlook talks at 650 other meetings where topic of meeting was broader than outlook alone.

—made about 600 outlook radio tapes.

—aired over 100 outlook television programs on commercial or educational stations.

Faculty resources committed directly to outlook programs in 1970, 1974 and 1975 are summarized in Table 1.

In 1975, a total of almost 4,000 man-days were spent on outlook—an average of about 1.1 SMY per department.[2] By comparison, departments surveyed expended 3,730 and 2,780 man-days on outlook in 1974 and 1970, respectively, for an increase in resources committed of 38 percent over this five-year period. Averaging the individual percentage increases in manpower committed, one finds that the average department has about doubled faculty resources involved in outlook since 1970.

TABLE 1. FACULTY RESOURCES COMMITTED TO OUTLOOK PROGRAMS, 15 AGRICULTURAL ECONOMICS DEPARTMENTS, 1970, 1974 AND 1975

	Total Man Days			Average Per Department			Percent Increase	
	1975	1974	1970	1975	1974	1970	1974-75	1970-75
9 Southern Departments	1086	899	490[a]	121	100	61[a]	21	91[b]
6 Midwestern Departments	2891	2831	2290	482	472	382	2	26
All	3977	3730	2780	265	249	199	7	38[b]

[a]Eight departments.

[b]Based on departments reporting 1970 data.

The "Typical" Outlook Program

There are numerous variations in outlook programs of the departments surveyed. Many of these differences are related to the amount of staff input into the programs, which ranged in 1975 from about 0.1 SMY to 4.4 SMYs. Despite variations in program size, a number of common threads run through most programs.

In the typical program, the bulk of the effort falls short into a span of perhaps two months, sometime between early fall and early winter. Usually following the appropriate regional outlook conference, a major outlook publication is prepared and given broad circulation. This may take the form of a special outlook issue of a regularly scheduled (usually monthly) departmental publication, a separate publication or even an insert or special issue of a popular private farm magazine. Also during this period, a number of local or area outlook meetings are conducted. All but one of the departments surveyed conduct such outlook meetings, ranging in number from eight to 100. For most of the year, however, outlook activity is at a relatively low ebb.

Of the 15 departments responding to the questionnaire, 13 rate outlook work as "one of our highest-priority Extension programs aimed at commercial agriculture"; and the other two report that it is "of considerable importance."

USDA reports are the main source of projections and forecasts made by the majority (nine) of departments surveyed. Second in importance as a source of

[1]Questionnaires were mailed to 13 departments in the southern region and 10 departments in the Midwest. Nine responses were received from the southern departments and six from those in the Midwest.

[2]Assuming 240 days equals an SMY.

projections are in-house judgmatic appraisals. Such "guesstimates" were ranked first by the other six departments responding. Private forecasts and futures markets are the next two most commonly used sources of information. Econometric models rank a distant last.

Since USDA provides the primary source of outlook information for state programs, it is appropriate to point out several recent actions of the Department which have greatly improved its outlook support. Examples include the new USDA periodical, *Agricultural Outlook*; availability of chart enlargements for transparencies; changing the date of the National Outlook Conference; and making SRS and ERS outlook-oriented reports available on the day of release by means of the Computerized Management Network. Several of these actions appear to be identical to proposals made by Daly 10 years ago [5].

Differences in Outlook Programs of Southern and Midwestern Departments

Although there are many similarities among outlook programs, there are also some differences. Several appeared to break over regional lines and may have implications for efforts in the South.

Major differences were related to program size and organization, and characteristics of agriculture in the two regions. In 1975, the average midwestern department committed four times as many faculty resources to outlook as the average southern department. The outlook program in half of the midwestern schools surveyed was coordinated by an outlook committee. In the southern departments, one man was responsible for coordinating the outlook thrust in most cases and, in two instances, actually conducted most of the work. In a sizable number of both southern and midwest departments, individual specialists have ongoing outlook responsibility for their assigned commodities.

For five of the six midwestern programs, outlook is viewed as a joint marketing-farm management responsibility. In six of the nine southern schools, either the marketing or the farm-management staff handles the bulk of the work.

In all but one of the midwest departments, the research staff takes an active role in either developing or presenting outlook, or both. This is the case in only two southern departments. Since, in a number of southern universities, Extension is administratively separate from Research and Teaching, this difference might be anticipated.

The final difference in programs stems from a fundamental contrast in agriculture in the two regions. Departments surveyed were asked to denote, among 18 commodities or commodity groups, whether outlook efforts in their states needed *major*, *some*, *little* or *no* emphasis. Southern departments, on the average, said that 7.0 commodities warranted major emphasis, and 4.6 needed some emphasis. In contrast, midwestern departments stated that 5.5 commodities were given major emphasis and 4.0, some emphasis. This simply serves to point out the more diversified nature of agriculture in the South.

EDUCATIONAL AND PROFESSIONAL SHORTCOMINGS

Despite the fact that outlook is one of our oldest programs, that it is given high priority by ECOP, that Extension applauds itself for its accomplishments, that outlook programs are highly visible and much needed today by decision-makers, and despite the fact that we allocate millions of dollars and scores of personnel annually to outlook work; there are troublesome questions that need to be raised about the current conduct of these programs. Stated more harshly, certain aspects of outlook work can be called an educational and a professional failure. From one who has been involved in outlook over five years, this is not just an indictment; it is also a confession.

The Educational Failure

One key issue revolves around whether outlook is an educational or service activity. Most outlook work can be characterized as supplying information bits, meeting requirements of a service (the act of helping or benefitting). It does not meet requirements for being education (impartation of knowledge). *Webster's Unabridged Dictionary* makes the distinction clear in quoting F. Harrison: "I look with sorrow on the habit . . . of making a considerable part of the education of the place to turn to the art of serving up gobblets of prepared information . . . It is the business of a university to . . . impart solid knowledge." If outlook is a noneducational service, is it not then a role that more properly belongs to other agencies, public or private? This is not to imply that universities will not always be doing some service work. Some are required by law to perform service functions, including outlook-oriented work. Others, such as Texas A & M and now Florida, have set up centers to handle service functions paid for, at least in part, by users. In the general case, however, educational institutions are obligated to take a skeptical view of noneducational services and to de-emphasize or divorce themselves from them whenever possible.

There is additional rationale for de-emphasizing outlook. Our "competition" may be doing a better job of providing this service than universities. The USDA's *Agricultural Outlook* is written at the

layman's level, is attractive, and is available to the public at an annual subscription rate of less than $20. Private forecasts, some excellent, have multiplied rapidly and are available free or at a price that is no barrier to most commercial farmers. Outlook information abounds in popular farm magazines. Such sources have repeatedly shown to be much more widely utilized by producers in planning than has Extension [6, 10]. Of course, university economists are major contributors to outside sources and would undoubtedly continue to contribute outlook information to private sources, regardless of whether an active outlook effort was conducted in a department.

In view of the questionable educational nature of outlook, the increasing availability and quality of alternative sources of information, and the apparent credence that farmers place in such sources, it would be easy to argue that departments of agricultural economics should abandon the outlook arena, freeing up scarce staff resources for dealing with other pressing problems of the agricultural sector.

Taking a narrow view of outlook, as we commonly picture it, the above argument has merit. But this is just the problem. We take too narrow a view of outlook programs.

An effective outlook program must be viewed as a four-stage process:

(1) Gather relevant data.
(2) "Milk" that data to form a forecast or projection.
(3) Integrate the forecast with its implications for alternative purchasing, production and marketing strategies of clientele.
(4) Disseminate the information.

In the common conceptualization of outlook, the vital third step is often omitted. Steps 1, 2, and 4 are necessary conditions for having an outlook program. Such a three-stage program is primarily a service activity. Steps 1, 2, 3 and 4 are both necessary and sufficient conditions for a broad-based educational program—a program that should be placed near the top of our priority lists for meeting the educational needs of managers in the agricultural sector now and for the next several years. Today's instability means that vast educational programs are needed to furnish clientele with the tools for deciding what and how much to produce; and when, where and how to market products through existing channels. A broader and longer-run category of educational needs lies in the area of managerial decisions and related policy issues dealing with the creation of new marketing systems that counteract both instability and inequities inherent in the present system.

University outlook programs are educationally justified only if they are a subset of a broader effort, which might be termed Market Intelligence and Managerial Decisions. A few institutions have explicitly recognized this tie-in. Several others have implicitly made outlook work part of a broader four-stage process. But most still regard outlook programs and those designed to impart knowledge about production and marketing alternatives as largely unrelated efforts.

The Professional Failure

Stanton has reminded us that "Continuing education should be based on scholarship and research" [11]. The survey reported here has pointed out that many outlook programs have little or no research back-up. And most outlook efforts are devoid of scholarship. Instead, subjective, sometimes fuzzy, usually qualitative reasoning is used to produce a quantitative projection. A number of respondents to the questionnaire confessed that internal forecasts were based on the SWAG method.

An example of the means by which outlook forecasts are commonly made is the highly sophisticated technique termed the "lost horse" method of forecasting [2]. In this approach, a number of people sit around a table; and the leader queries, "Okay, where do you think cattle prices will be next fall?" Each participant guesses; and after some discussion, individual forecasts are integrated to form a consensus prediction. The name of this technique stems from the type of reasoning required to make the individual guesses. Visualize a lonely cowboy, afoot, surveying a vast empty landscape and asking himself, "Now where the hell would I go if I was a lost horse?"

Quantitative techniques are used far too little in state outlook work, considering the resources that universities have put into econometric model building and recent advances in forecasting techniques.

There are several arguments that may be offered in defense of this charge. As has been pointed out by King, state models have not been designed for continued update, prediction and evaluation. Nor have we exposed our predictive models to the same scrutiny as have our counterparts in General Economics with their macro models [8]. Moreover, most econometric model building has not been initiated with prediction as a primary goal. Some has had a purely methodological focus. Other models may have been useful in pinpointing underlying economic structures but fail as predictive tools.

Another defense that may be offered is that since predictive models have failed economists badly in recent times, perhaps we are better off to continue to rely on subjective appraisals for outlook work. King's

admonition should be heeded. He states, "Although it is evident that the econometrician faces severe tests in such times as these, the nonquantitative economist is apt to be in worse shape."

This plea for increased reliance upon quantitative analytical tools as a basis for outlook predictions should not be misinterpreted. Useful forecasting models for outlook work are likly to be rather stark in their simplicity. Cromarty sums it up well [4]—"Models that help management are not presented in the framework of two-stage least squares or geometric-distributed lag with two lag parameters and a first-order autoregressive scheme." Useful outlook models are simple; they model partial systems; they allow for subjective judgment and intuition but are not based on them. Bottum, in an earlier article, pointed out the need for greater accuracy in outlook by combining the best tools available in the profession with judgment. What is needed, he continues, are individuals who can combined the science and the art of forecasting [1].

In fact, it is misuse, not use, of the "lost horse" technique that is the problem. There is logic behind the reasoning—to find the horse, i.e., price, acreage, GNP, etc.—go where it was last seen and think like a horse. The technique actually implies a need to fill in gaps in analytical forecasts with intuitive reasoning. But the *Business Week* article which describes the technique continues, "If there were a state licensing board for economists, a forecaster caught [simply guessing] would be convicted of malpractice and sentenced to run a checkout register in a supermarket for the rest of his days."

It may still be argued that academic institutions should turn the forecasting phase of outlook over to USDA. This survey reveals that we mainly echo USDA projections anyhow. Yet, there are compelling reasons why we should not abandon our work in forecasting.

Some of these reasons have been pointed out by Timm [12]. Outlook patterns vary by states and by regions within states. Severe short-run dislocations can exist in localized areas. State economists are in a far better position to anticipate and explain them. State specialists are better equipped to probe deeply into the intricacies of the marketplace. University agricultural economists alone combine the expertise to develop forecasts with knowledge of local market conditions and particular information needs of clientele.

Another problem with reliance on USDA forecasts is that, perhaps for good reason, USDA outlook reports are not explicit as to the model used [8]. In fact, while some ERS forecasts are based on sophisticated models, others are about as subjective in nature as are predictions made in state programs.

Finally, it has been pointed out by Cromarty that the usefulness of forecasting models depends not just on results but on ability to evaluate and objectively incorporate extraneous forces over time. Only those who develop and accept responsibility for results understand a forecast's strengths and weaknesses, its failures over time and the likelihood that failures will be repeated [4]. In short, we must subjectively or statistically be able to place confidence limits on our projections; and we cannot do so unless we make our own or unless USDA shares the mechanics of making its forecasts.

WHERE DO WE GO FROM HERE?

Reviewing, outlook is a major program for almost all departments represented in this Association. Nationally, efforts are massive. Despite the size of this program thrust, two value judgments have been expressed here about weaknesses in current efforts. The first shortcoming is failure to offer an educational program and, instead, offer a service. This weakness can be shored up by subordinating outlook to a thrust of broader scope, perhaps titled Market Intelligence and Managerial Decisions.

The second weakness is failure to utilize available tools of our trade in developing forecasts. There are several defenses for this allegation. Nevertheless, we must plead guilty as charged. This weakness will be a more difficult one to remedy.

This may be particularly true for departments in the southern region. Limited staff size of most of them, compounded by bleak prospects for additional resources, will make it difficult to intensify efforts in the forecasting phase of outlook. As shoddy as present efforts are, they are at least the most efficient, time-wise. An obvious implication is that research people need to be more heavily involved in outlook—particularly in the forecasting phase. Midwestern universities have been much more successful in tapping research resources in their outlook programs. Intensified efforts to design, maintain and evaluate predictive models may bring about the need for more joint Extension-Research appointments. Such efforts also call for a year-round outlook effort, not just a two-month crash program.

The diversity of agriculture in the South may also frustrate efforts to strengthen outlook work. There is simply a bigger job to do and fewer resources with which to do it. An alternative might be formation of a regional task force staffed by several research and extension professionals to tackle the job of model building and maintenance, and dissemination and interpretation of results to cooperating

universities. Such a group would have an ongoing responsibility, although effort could be scaled down after original design and validation of models was completed. This writer's opinion is that the effort would have greater prospects for success if attacked on a functional basis; that is, one outlook effort to forecast conditions for all important commodities in the region. Alternatively, however, existing regional extension- and/or research-commodity committees might expand their efforts to include development of working forecasting models.

The first stage of the process of developing outlook—collection and reporting of data—is viewed as a function of USDA, and a function well performed. The most pressing current data gap is probably in the international- and foreign-trade area.

The final phase of the outlook process, dissemination, has been mentioned only incidentally thus far. As with all Extension programs, we need to find ways to make our results reach more people more quickly and more efficiently. This problem is no different from any Extension program except that because of the perishability of outlook information, time is more critical.

According to survey results presented here, departments rely heavily on mass-media dissemination techniques and are reaching large numbers of decision-makers through direct contact at outlook meetings. Such time-efficient techniques should continue to be stressed.

The primary problem with dissemination lies in getting out the printed word. Time elapsed from final typing to release of outlook publications of the 15 departments surveyed averages two full weeks—ranging up to 42 days for certain publications.

To paraphrase a typical outlook statement: The demand for outlook is strong. Yet the outlook product universities are supplying is often not an educational product. Existing technology is seldom incorporated into the outlook-production process. The consumers of our product are relying heavily on alternative sources of supply. But if we adjust the type of product we are supplying, the long-term outlook for outlook is bright.

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