

## Farm Management For Better Living

by

Dr. E. H. Hartmans  
Extension Economist in Farm Management  
University of Minnesota

In 1953 a new important feature has been added to the adult farmers education program in our state. Through a grant of the Hill Family Foundation, "The Cooperative Farm Management Study and Service" has come to existence and with this project, the local schools, the Minnesota State Department of education and the University of Minnesota have joined forces in setting up a coordinated program of teaching, research and extension in farm management. This program has now been in effect for well over one year and all of you participating in it have probably formed some general ideas about it.

Considering this development it seems a very opportune time to explore with you what contribution farm management can make in helping farm people solve their problems and reach their goals. For those of you who had a year of experience this talk may clarify some of the problems raised in your mind and for those who are not participating yet, it may give an extra stimulus for actively taking part in this work in the future.

I like to make clear in advance, however, that this talk is not meant to be of a promotional character, but will merely give an analysis of the facts as they are confronting us. In the light of these facts and conclusions you will have to give in your work the place to farm management it deserves. In order to place farm management in the right setting I like to discuss with you first some general observations which have troubled many people for a long time in the adult farmer educational field.

Why is it that some farm improvements are readily accepted, why are others not or very slowly accepted even though they are just as important to the farmer as the first and are given the same emphasis in educational work? Why for instance are only 3% of the cows in Minnesota being tested under the DHIA program but why have 100% of the farmers accepted hybrid corn? Or to apply it to a broader field, why is grassland production as compared to crop production on a much lower level of efficiency? Is it because research has not given it equal attention or educational people have not given it an equal place in their teaching? No, I don't believe that is the answer. In order to derive an answer we have to explore what the goals are the farmer and his family are working for, the goals which are helping them to obtain interest in education and research. What are these goals? Generally speaking, I think, these goals can be summarized under two main headings:

1. The attainment of as high an income as possible with the available resources of land, labor and capital. Most people will pursue that goal, not just for its own merits but in order to acquire those things which constitute a high standard of living, a nice home, with modern facilities, education for their children, recreation etc. In other words the maximization of income is only an intermediate goal necessary, however, for the final goals of the family. Some people, but in our time fortunately enough only few, see the treasure in the old chest is their final goal and live poor but die rich. For them income is the final goal in itself.

2. The second goal which is not commonly mentioned but which it seems to me has a strong influence on the farmers actions is what I would like to call the "leisure" goal. I don't mean leisure only in the sense of doing nothing but also of doing chores and farm practices in a more easy way. In some cases the farmer will thereby consciously not maximize his income; in other cases he may do this subconsciously or without knowing it.

If we keep these two goals in mind which I will explain more fully in the course of this talk I believe we can find our explanation for the great differences not only among farms but also in the general application of efficient farm practices and techniques. And here is my explanation:

It is my belief that the practices which directly contribute to one of these two goals or which in other words are directly related to these goals are readily accepted and put into practice under our present setup of education and extension. Practices which are farther removed from the farmers' goals are more slowly accepted. They are first accepted by farmers with a broader agricultural education or a better managerial capacity and greater understanding of the farm organization or with plainly a more intelligent mind. Let me explain this with some examples: When a farmer uses a better yielding proven variety in crop production such as hybrid corn it directly increases the yield of the crop which can be sold and transferred into money, since it is directly related and very close to the income goal, the advantage of hybrid corn, serving his income goal is very easily understood and quickly applied by the farmer. Disease and weed control in cash crop production are other practices; close to the income goal and directly related to it. Again here farmers are apt to apply the newest techniques quickly and generally.

To mention a field which is certainly related to the income goal but is in many cases closer to the leisure goal, I believe farm mechanization is a good example. The purchases of a particular modern machine may reduce labor cost to the extent that it increases total income, but very often at the same time a particular farm practice is easier done. The goal of doing things easier, which not only means doing less back-breaking work but also doing things at a time that the farmer wants them to be done, have in my opinion definitely contributed to a large extent to the tremendous mechanization taking place in American Agriculture over the last 25 years. In many cases the leisure goal is pursued to the extent that net income is unfavorably affected. Another example of the leisure goal is the waste accepted in some farm operations, with the simple justification of too much work, although a thorough analysis may lead to the conclusion that a laborer paid \$25.00 a day to do a particular job would have been favorable to the income goal. However, we have to recognize that the leisure goal at that point was much closer to the farmer than the income goal and hence was followed more easily. I could give here many more examples which illustrate the relation between the closeness to the two goals, and the aptness to do a certain practice, however, I trust that those mentioned here have sufficiently explained what I mean. Now let's turn to some examples farther removed from the goals. I have mentioned already pasture or forage production either for the benefit of maintaining or improving soil fertility or for providing a cheaper ration to roughage consuming livestock.

Pasture in itself is not easily sold on the market. It is not a cash crop. If it is kept for soil rotation reasons only, it certainly is very far removed from the eventual income goal. Our observations in the field show continuously that very few farmers have an adequate crop rotation program. A letter received last week from an agent in southern Minnesota states "It is rather interesting to find that only one of 18 better than average farms visited had a definite crop rotation."

In order to market forage crops such as grasses and legumes, they first have to be fed through livestock and transferred into animal products. Forage in other words, contributes indirectly to the income goal and is rather far removed from it.

Because of its competition with cash crops it is on many farms, one of the poorest developed and utilized parts of the farm business. While the farmer thinks that he is following his income goal he may actually not be doing this at all. However, the road from roughage production via utilization through live stock is too long and has too many uncertainties that he rather prefers a cash crop. I mentioned the keeping of DHIA records as something very slowly adapted. These records provide no direct income but out of these records which actually cost the farmer money, he can draw conclusions to his breeding practices which over a long run period will improve his herd and increase his income. The same is true for farm management records. The records in itself are often a burden to the farms, but they will provide him very effective information for the farm unit; information which may induce him to change his farm organization or farm practices. You may have wondered all along why I presented this analysis to you? How does all this reasoning tie in with my topic? Well here is the answer.

Farm management or farm planning and farm organization has the purpose to tie all the sections of the farm together and put them in the right perspective. Farm management has the task to improve the decision making processes of the farm family by learning how to develop and evaluate alternatives. Unfortunately many extension teachers have had difficulty themselves of grasping the concept of the whole of the farm and home business as contrasted with its parts. Farm management teaching requires not the presentation of isolated established facts to be accepted by the voice of authority. No, it requires to put those established facts into a pattern of analysis and operation by which the farmer not only sees the contributions of the actions close to his goals, but sees equally sharp the contributions of all other actions. He will then not just act by authority but by conviction in his own mind.

It is very readily understood that this type of work, of establishing family goals and courses of action for obtaining such goals under the particular circumstances can hardly be done on a mass basis. Out of the primary objections of helping farmers to make decisions under their special circumstances follows automatically that the personal contact between farmer and advisor is almost indispensable. No two farmers and no two farms are alike, which immediately calls for an individual approach of the problem. However, it is doubtful whether we ever will have extension set up that can reach each individual farm. But here is where the vocational agriculture teacher can make his greatest contribution.

As I see it, it is the task of the agricultural teacher either in dealing with adults or young people to make them realize that the farm is a growing concern, it is a business and thereby a business which is organic in its construction. It has, however, all the aspects of an industrial business. The farmer has to be a production newspaper, a labor manager, a business manager, a banker, an administrator, a salesman. In industry, however, each of these jobs is assigned to a specialist, a person specially appointed for that job. On a farm, the farmer has to do all these jobs alone and thereby having the additional problems of dealing with a living organism which is not the case in industrial processes. That is what makes farming so difficult!

The farmer is the poor fellow who in education and extension, through talks,



press and radio is flooded with technical and economic information on parts or sections of his farm business, yet he is left alone to do the coordinating job. That job he has to learn through farm management teaching. We have to show him how to go about in setting up his farm plan, how to evaluate alternatives and how to evaluate the practices he is doing. The teacher and extension worker, however, faces a difficult task if he wants to do a good job. He himself, in the first place has to be able to make this organic unit in such a way that either maximum income is realized or anything else the farmer wants to maximize. This requires not only a knowledge of the technical input-output relations, it also requires an evaluation of economic alternatives. To illustrate this with a simple example, it means that he not only should know how the yield per Acre will increase by increasing applications of fertilizer which is a technical relationship, but at the same time at what level of application he will maximize profit which is determined by price relationships. He actually should go farther and determine at the same time, whether the money spent on fertilizers (if that is the only money he has available) should not be used some other place in the farm business where the money increases farm income to a greater extent than in the application of fertilizer. I know that all this sounds very complicated, yet the farmer has to make exactly these types of decisions often with very little help.

If we consider all these facts, is it surprising that he pursues in the first place those things which are most simple related and closest to his goals? If we want to assist the farmer in farm management matters it will require that we in the first place meet the qualifications of a practical farmer ourselves. With this I mean that we should be able if confronted with a farm, with or without the help of subject matter specialist to manage that farm so that it, under normal conditions, will provide the highest income. It means that we must know current agricultural conditions and the details of customary farm practices. A thorough training in technical agriculture is a first prerequisite. We must have the ability to appraise each new technology and fit it into the business of farming. Over and above this knowledge and practical experience we need a good economic insight. We must be familiar with the principles of farm management and the fundamentals of economics. These principles are not a working tool in itself but have to provide the framework of thinking and the direction of action and advice. It means that this "ideal man", which probably is very seldom embodied in one person will have the qualification of a real generalist. Farm management is the task of the generalist, which each farmer is supposed to be.

As I said before it is logical that only the best farmers have the time or the natural ability to keep up to date on changes in economics and technical relationships, and apply changes in their farm operations under their particular circumstances. Most farmers will need a helping hand of people in extension work who can devote full time on studying such changes and in studying methods to apply such changes in each farm to the greatest advantage. The agricultural teacher has, as one of his tasks, to make the farmers realize the scope of his problems and thereby create the need for more personal assistance in solving his problems.

People in education and extension are realizing more and more the problems discussed in this talk and at the present time there is a strong feeling towards giving more personal service to the farmer. Whether such service should be given on a free basis or whether the farmer should pay for such service is a matter of administrative policy.

With the "Cooperative Farm Management Study and Service" you have created a set-up to tackle problems of farm management in the field and at the same time gather the necessary information to do a better teaching job. The fact that the state department of education has taken the initiative for this service is a tribute to their advanced thinking and is a demonstration of recognizing the problems confronting the farmer today.

You have noticed that I regard the planning part of the farm as an organic unit, as the most important task of farm management. Farm records are not farm management but farm records are a tool - and an important one - to judge the practical execution of a farm plan on an individual basis. Through his farm analysis the farmer may get suggestions as to the changes to be made in his farm organization.

A method of analysis, widely used in farm management work is the direct comparison method. According to this method changes in farm organization and management of an individual farm based on the experiences of a larger number of other farms following the same type of farming, the most successful farmers being the example. As a starting point this method of using records may have merits, but only in drawing the attention to certain differences among farms, certainly not to indicate the necessary changes. There is no proof that the farm practice of the most profitable farms will maximise or even increase the income of an individual farm. Especially the comparison with group data as the average of the group or the average of the most profitable one-third etc. have to be used very carefully. Such data often obscure the true relationships of the factors involved. Across the board recommendations are in opposition to economic principles and underestimate the individual management problem. The managerial ability varies from farm to farm, family goals or institutional factors may be involved etc. Group data, however, are useful for indicating trends and levels of technical output not, however, for getting individual planning standards.

It is my observation in working in the field that the most successful farmers are always real individualists with a personal thinking and personal plan. In our teaching we have to develop and assist this individual approach. We have to give the farmer the frame of thinking and the means to develop his own plan. We have to make him understand that farming is a complicated business of which all parts should be fitted in an organic pattern. We have to make him recognize that planning this business is the first thing to start with and that in this planning process the assistance of other people may be needed. We have to give him an understanding of the basic principles of alternative use. All this you should be able to do better by taking part in farm management work, now within the reach of your own organization.

If we look upon farm management in this way it should be the most powerful tool to help farmers not only to obtain a greater income but consequently all those things which constitute a better living for the farmer and his family.

I would like to finish this talk by briefly mentioning what was accomplished in Vermont with a dozen farms after 6 years of individual farm planning, as compared to what happened on a dozen other very similar farms where instructual farm planning had not been undertaken. The sygnificant point is that, while the farms in both groups had the same labor income in 1946; \$1552 for group I, the planning group, and \$1551 for group II, the non-planning group. In 1952, the farms in group I had a labor income of \$4565 while the farms in group II had had a labor income of \$2623. Without going into the details of the changes brought about, a difference of almost \$2000 more family income was the pay-off for farm management. Something similar to this might happen in our own work. You can answer for yourself whether it is worthwhile.