TRENDS IN THE UTILIZATION OF FIELD SURVEYS

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Without a doubt, more use is being made of information on soils and other physical land factors than ever before. This information has become basic in the development of a few important agricultural programs. Others use it when it is available. If the inventories were up to date and available for all areas included within the scope of their operations, all programs dealing with the land would use them. Such widespread use and demand for soil information indicates that a new trend in field surveys has developed. Trends come as a result of changes in conditions and in the environment influencing the object. Occasionally, environments change rapidly, producing correspondingly rapid trends, but more often they follow cycles involving several years. The development of streamlining in automobiles and railroad trains is an example of a trend resulting from the introduction of the airplane as a mode of transportation in which streamlining was essential. Likewise, science has its trends and the soil survey is no exception. The widespread use of soil science in practical agricultural programs in recent years has influenced the development of the science.

The first federal appropriations made for soil survey field work came as a result of the belief that the type of soil had an important bearing on crop production. Specifically, tobacco production was encountering difficulties in yield and quality and soil survey field work was started to determine if remedies could be found in the soil. Sufficient information of value came from this early survey to justify continuing field work in other areas where there were problems of crop production. Gradually the idea of making a nation-wide soil survey emerged under the direction of Milton Whitney and his associates.

Interest in field surveys developed slowly but one state after another eventually entered into cooperation with the federal government to carry on this work. The following resolution passed at the first annual business session of the Soil Survey Workers in November 1920, “resolved that, concerted action be taken to give the soil survey more publicity,” indicates what a struggle field surveys were having for recognition and, therefore, justifies its continuation. This is a definite trend toward greater use of survey information.

However, this resolution, and the action which followed, definitely created a greater demand for information about the soil. Undoubtedly, many more gained more of an appreciation of the importance of soil in agriculture as a result of the campaign. We will remember Bulletin II, of the American Soil Survey Association, entitled, “The Value of the Survey,” which was published for the purpose of increasing the interest in field surveys. But, it can not be said that more widespread interest in the soil survey was immediately created.

However, now the problem is to supply demands for surveys. This recent change came about largely as a result of an appreciation of the need for land use programs, to be sound, must be based on a physical inventory of the land itself. The total appropriations for field work and the area covered are several times greater than ever before. The importance of the soil survey is no longer a question. Administrators recognize the need for its basic information and, therefore, justify its continuation.

This increased demand for surveys has not only focused attention on some of the difficulties that have existed for some time, but has created new problems. The need for more detail and more intensive mapping and the addition of factors other than the soil itself, in order to supply all the information needed for farm conservation planning, are some of the new problems. But perhaps the greatest problem is in the very great demand for more information than is available. Thus, we are faced with the problem for greater production and must examine our problems critically to make available funds and personnel more efficient.

Reviewing the writings of those who have been closely associated with surveys in the past, it is clear that the two fundamental elements involved in surveys have been clearly outlined for many years but have never been rigidly carried out. So, we must clarify our thinking and reorganize our efforts in order to be more efficient. Dr. Marbut stated just twenty years ago that the soil survey had two fundamental elements involved in surveys have been clearly outlined for many years but have never been rigidly carried out.