GENERAL PROGRAM

Progress of the Soil Survey of the United States Since 1899

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It is impossible to give proper consideration to the development and progress of the United States Soil Survey without knowing something of several individuals, including Milton Whitney, who established it and gave direction to it for 30 years. Dr. Whitney, or "Professor" Whitney, as he was commonly known, even during his long service with the Department of Agriculture, was a remarkable man. While he made mistakes, as every man of action does, he possessed an originality and an aptitude which marked him as a man of distinction. It was my good fortune to have known him and to have worked under his general direction in the old Bureau of Soils in 1901, the year of its founding. Seven years previous to that, the soils work had been organized as a Division of Soils, which was first established in the National Weather Bureau.

Whitney's special training was in the fields of physics and chemistry but he was also much interested in geology. He came to the Division of Soils from the position of soil physicist at the Maryland Agricultural Experiment Station. He was chief of the Bureau of Soils from 1901 to 1923, at which time this bureau was discontinued. All the soils work, including that of the soil survey, was organized under a new bureau, that of the Bureau of Chemistry and Soils and later, as you all know, the soil survey was transferred to the Bureau of Plant Industry, now the Bureau of Plant Industry, Soils, and Agricultural Engineering.

Since Whitney was interested particularly in soil physics and had a good understanding of geology, the very early surveys gave much emphasis to the parent material along with the texture, color, and thickness of the surface soil and subsoil layers, as they were then called. However, he soon went beyond the parent material and the physical characteristics of the soil and subsoil and began to see soil classification in its broader aspects.

Whitney deserves a very high place among the early soil scientists of the country. Few men indeed would have had the vision, the originality, and the particular training required for laying the foundation for what has come to be the most comprehensive system of soil classification and mapping in the world. On this fiftieth anniversary of the inauguration of the United States Soil Survey, it is highly fitting to pay homage to its originator.

As one of a comparatively few men now living who had the privilege of working under Whitney, it is a great privilege to pay my respects to him, a system of which he was the originator. He was a character,—outwardly austere and dignified, but in his inner life a most lovable man. We can today look back at his work in the field of soil classification and realize the great service, but I should like to mention some of the early county soil maps carried only four to six types and at first, all alluvial land along streams was classed merely as meadow land. It's certainly from this early classification to that of today, a county map carries 40 to 60 or even more types.

In recognizing the pioneer work of Whitney, credit should also be given to the long and faithful service of the early field man. After all, these were the men who collected the field data and who gave their lives in working out the system of classification. It is, of course, impossible to mention all of those men who did great service, but I should like to mention some of the very early field workers I knew personally, as J. A. Bonsteel, W. E. Hearne, T. D. Rice, Macy Lapham, J. E. Lapham, J. Garn, G. N. Coffey, C. N. Mooney, and E. O. Fippin. A little later came H. H. Bennett and others who followed during the early years. All of these men had much to do in developing the early system of classification and in carrying out the large numbers of this period.

It might be noted that the field men were isolated, and did not have the stimulation coming from association with other agricultural scientists.