Thank you for using eradoc, a platform to publish electronic copies of the Rothamsted Documents. Your requested document has been scanned from original documents. If you find this document is not readible, or you suspect there are some problems, please let us know and we will correct that.



Report for 1935



Full Table of Content

Crop Production

Rothamsted Research

Rothamsted Research (1936) *Crop Production*; Report For 1935, pp 21 - 21 - **DOI:** https://doi.org/10.23637/ERADOC-1-67

21

yet farmers did not suffer as much as in some of the earlier ones. There can be little doubt that one important reason lay in the better research, educational and advisory services now available.

THE WORK OF 1935.

During the season 1935 much steady progress has been made in all departments of the Station, and some of the old work has reached a definite stage where it could be regarded as sufficiently advanced for final publication and a new direction could be given to the programme. The examination of the 50 years' experimental work at Woburn (1877-1926) has been completed, and the book is now being published by Messrs. Longmans as one of the Rothamsted Monographs on Agricultural Science. Mr. Cutler and Miss Crump have rounded off a great deal of their work, and published it also as a Rothamsted monograph, "Problems in Soil Microbiology." In both cases time and resources have been set free for new lines of investigation. Mr. Samuel has completed his survey of mycological problems and drawn up a programme, on which a start has been made.

CROP PRODUCTION

During the past few years many experiments have been made to investigate the response of the more important crops to fertilisers. The results have been disseminated among farmers, fertiliser manufacturers, agricultural experts and others interested and have influenced fertiliser recipes and practice enabling farmers to obtain better crops at little if any more cost and often at less. When one recalls the fact that some £6,000,000 was spent by farmers on fertilisers in 1934-5, according to the reports of the various fertiliser associations, it is evident that a saving of a few per cent. in the efficiency of utilisation amounts to a very respectable total.

The experiments show, however, that on our present methods the farmer recovers only a part of the fertiliser used. Of the nitrogen applied, even in the most efficient fertilisers, not more than 40 to 60 per cent. is recovered, and the lower figure is more usual than the higher. Recovery of phosphate is smaller and rarely exceeds 25 per cent. even on grassland, and after residual effects have been taken into consideration. Numerous experiments are now being made to explore the possibility of a better utilisation of the fertiliser, and in the recent experiments on sugar beet and potatoes the fertiliser tests are usually combined with cultivation tests such as time of sowing, width of spacing, method of placing manure, etc. A number of these experiments are made not only at Rothamsted and Woburn, but at outside centres also, and they are rendered the more important because so far the sugar beet crop commonly fails to respond adequately to the fertilisers used, though for what reason is not yet clear. These outside experiments are much appreciated by farmers: in the Isle of Ely, for instance, the Branch of the National Farmers' Union asked us to support their application to the County Council for a County Agricultural Organiser in order that this type of work might be developed.