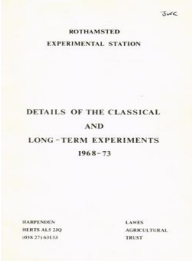
This work is licensed under a Creative Commons Attribution 4.0 International License.

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.

Details of the Classical and Long-term Experiments 1968-73


ROTHAMSTED
EXPERIMENTAL STATION

DETAILS OF THE CLASSICAL
AND
LONG-TERM EXPERIMENTS
1968-73

Full Table of Content

R/CS/24 P K to Take-all - Barley

Rothamsted Research

Rothamsted Research (1977) *R/CS/24 P K to Take-all - Barley ;* Details Of The Classical And Long-Term Experiments 1968-73, pp 76 - 77 **- DOI: https://doi.org/10.23637/ERADOC-1-193**

This work is licensed under a Creative Commons Attribution 4.0 International License.

PK AND TAKE-ALL

ROTHAMSTED WEST BARNFIELD II

(R/CS/24)

This experiment, started in 1968, is designed to study the effects of different amounts of phosphate and potash on the yield and incidence of soil-borne diseases, particulary take-all (*Gaeumannomyces graminis)* in continuous cereals (barley until 1973).

Design

1968-69: 5 x 2, in 4 randomised blocks of 10 plots
1970– 5 x 2 x 4 in 4 blocks of 10 plots split into two for N.

Treatments

All combinations of:

Whole plots (a) Phosphate (kg P_2O_5) as superphosphate

None

38
150 annually to seedbed

226
904 Six-yearly, last applied autumn 1967, half before ploughing, half after

(b) Potash (kg K_2O) as muriate of potash

37.5
150 annually to seedbed

NOTE: Rates of P and K have been slightly changed from 1974

From 1970.

Sub-plots (c) Nitrogen (kg N) applied cumulatively in successive years

38
75
113
150

Basal applications

Nitrogen: 1968 & 1969 100 kg N

Liming

1969 2.9 t ground chalk
1972 5.0 t ground chalk

Weedkillers

1968 & 1969, 1971-73 Paraquat applied to stubble in previous autumn
1968 Aminotriazole with ammonium thiocyanate in previous autumn
1969 & 1970 2,4-D with dichlorprop
1971 Ioxynil, bromoxynil with dichlorprop
1972 Ioxynil, bromoxynil, dichlorprop with MCPA
1973 Dicamba, mecoprop with MCPA

https://doi.org/10.23637/ERADOC-1-193

This work is licensed under a Creative Commons Attribution 4.0 International License.

Varieties	
1968 & 1969	Maris Badger
1970-73	Julia
Areas harvested	
1968 & 1969	0.00567
1970	0.00264 – 0.00273
Soil series	Hook series

https://doi.org/10.23637/ERADOC-1-193