# AGRICULTURAL LAND CLASSIFICATION

HARROGATE GREAT PARK
NORTH YORKSHIRE

MAFF

Leeds Regional Office

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MAP

1. Agricultural Land Classification

Agricultural Land Classification Report: Harrogate Great Park, North Yorkshire

## 1. INTRODUCTION AND SITE CHARACTERISTICS

The site is located around grid reference SE283573 approximately 5 km NE of Harrogate. It covers 50 hectares of which 97% is in agricultural use.

Survey work was carried out in March 1991 when soils were examined by hand auger borings at 100 metre intervals at points pre-determined by the National Grid.

All assessments were made using the methods described in Agricultural Land Classification of England and Wales: "Revised guidelines and Criteria for Grading the quality of Agricultural Land" (MAFF 1988).

## Land Use

All agricultural land was under permanent pasture at the time of the survey.

## Climate

Average Annual Rainfall (AAR) is approximately 818 mm. Accumulated temperature above 0°C between January and June (ATO) is 1283°C and the land is at Field Capacity for 204 days. The above rainfall and temperature values impose an overall climatic limitation of Grade 2 on land in this area.

## Relief

The site is moderately undulating with an overall slope from 116 m and in the west to 80 m along the eastern boundary. Gradient is limiting on ALC grade only around the old quarry.

# Geology and Soils

Soils are formed mainly in medium and heavy textured boulder clay and consist of medium or heavy clay loam topsoils over gleyed slowly permeable heavy clay loam or clay. Lighter soils formed of medium clay loam or sandy clay loam over similar subsoils occur in a small area in the south eastern part of the site.

#### 2. AGRICULTURAL LAND CLASSIFICATION

The ALC grades at this site are as follows:

Grade	Hectares	Percentage of Total Site Area
2	4.1	8.1%
3a	10.4	20.7%
3b	33.3	66.2%
4	1.3	2.6%
Urban	1.2	2.4%
TOTAL	50.3	<u>100%</u>

#### Grade 2

Land in this grade consists of sandy clay loam to medium clay loam topsoils over loamy medium sand to sandy clay loam subsoils. These soils are well drained and fall into Wetness Class I. Slight soil wetness and workability problems along with the overall climatic limitations are the limiting factors on land in this grade.

### Subgrade 3a

Land in this sub-grade consists of medium clay loam topsoils over sandy clay loam upper subsoils with slowly permeable medium to heavy clay loam lower subsoils. These soils are imperfectly drained and fall into Wetness Class III. Soil wetness and workability problems are the limiting factors on land within this sub grade.

#### Subgrade 3b

Land in this subgrade consists of medium to heavy clay loam topsoils lying immediately over slowly permeable heavy clay loam to clay subsoils. Profiles of this type are poorly drained and fall within Wetness Class IV. Severe soil wetness and workability problems are the limiting factors on land within this sub-grade.

## Grade 4

Land in this grade adjoins the old quarry in the centre of the site and contains slopes of 11-18 degrees. These gradients will impose severe restrictions on the use of agricultural machinery and the area is limited to Grade 4 for this reason.

Urban

This consists of the disused quarry and access track.

Resource Planning Group Leeds Regional Office May 1991