AGRICULTURAL LAND CLASSIFICATION REPORT FOR BILLINGE

Following the request for detailed information on the soils of the proposed golf course near Billinge, an Agricultural Land Classification survey was carried out in July and August 1992

Location, Altitude & Relief

The site lies north west of Billinge in between Great Houghwood Farm and Shaley Brow Farm on and below the south west facing slopes of Billinge Hill. The land lies at an altitude of 80-165 metres. The steeper slopes have a gradient limitation.

Climate & Rainfall

The main parameters used in the assessment of the climate limitations are average annual rainfall (AAR) and accumulated temperature (ATO). For this site these figures are averaged out to 963 mm and 1333°C respectively, indicating that there is an overall climatic limitation on the site to grade 2 due to the fairly high rainfall and slightly low accumulated temperatures. The field capacity days figure is fairly high at an average of 223, thus limiting the time for cultivations. The mean date of the last frost is late April.

Geology & Soils

The site is underlain by Lower Coal Measures, Boulder Clay and Shirdley Hill Sand. The soils are either clay loams over clays or lighter soils of sandy loam, loamy sand and medium sand sometimes overlying sandstone at depth.

Land Use

At the time of the survey the crops included wheat, fodder peas and a small area of potatoes.

AGRICULTURAL LAND CLASSIFICATION

Grade 2: This accounts for 9.3 hectares and 16% of the site. The soils are typically sandy loams over loamy sand over medium sand. Overall climate is the main limitation for the grade 2 land due to the slightly higher rainfall and slightly lower temperatures than average of the site as a whole. The higher than average rainfall means that droughtiness is not usually a limiting factor, except where light soils such as sandy loam only have a depth of about 50 cms, limiting the soil to grade 2. Soil wetness limits the soil to grade 2 where medium textured soils like sandy clay loam form the topsoil over lighter subsoils.

Grade 3a: This accounts for 8.5 hectares and 15% of the site. Soil wetness limits the land to grade 3a where the soils are typically sandy loams or clay loams falling into Wetness Class III with clay forming a slowly permeable layer at 50-80 cm. Occasionally soil depths of 30-44 cms and soil droughtiness provide a limitation also.

Grade 3b: This is the main grade of the site, accounting for 33.6 hectares and 59% of the site. Soil wetness is a major limitation with soils typically of sandy clay loam overlying clay which forms a slowly permeable layer within 60 cm of the surface. The gradients of the steeper slopes on Billinge Hill limit the grade to 3b over much of the north eastern part of the site. Occasionally soil depth is a 3b limitation where it is only 20-29 cms deep, lying over sandstone rock.

Grade 4: This small area accounts for 0.2 hectares and 1% of the site and is limited to grade 4 due to the gradient of 12° or more.

Non-agricultural land: This accounts for 4.7 hectares and 8% of the site and consists of woodland, old mine workings and steep slopes of grass and bracken.

Farm buildings: This accounts for 0.4 hectares and 1% of the site.

SUMMARY

Grade	Hectare	%
2	9.3	16
3a	8.5	15
3b	33.6	59
4	0.2	1
Non Ag	4.7	8
Farm Buildings	0.4	1
	56.7	100

Roy Fussell
Resource Planning Team