**Project Name:** **Chittering land resources survey**
**Project Code:** **CHT** **Site ID:** **0936** **Observation ID:** **1**
**Agency Name:** **Agriculture Western Australia**

## Site Information

| | | | |
|---|---|---|---|
| **Desc. By:** | John Bessell-Browne | **Locality:** | |
| **Date Desc.:** | 01/01/98 | **Elevation:** | No Data |
| **Map Ref.:** | | **Rainfall:** | No Data |
| **Northing/Long.:** | 6504981 AMG zone: 50 | **Runoff:** | No Data |
| **Easting/Lat.:** | 415416 Datum: AGD84 | **Drainage:** | No Data |

## Geology

| | | | |
|---|---|---|---|
| **ExposureType:** | No Data | **Conf. Sub. is Parent. Mat.:** | No Data |
| **Geol. Ref.:** | No Data | **Substrate Material:** | No Data |

## Land Form

| | | | |
|---|---|---|---|
| **Rel/Slope Class:** | No Data | **Pattern Type:** | No Data |
| **Morph. Type:** | No Data | **Relief:** | No Data |
| **Elem. Type:** | No Data | **Slope Category:** | No Data |
| **Slope:** | % | **Aspect:** | No Data |

## Surface Soil Condition

## Erosion:

## Soil Classification

**Australian Soil Classification:**
Humose Eutrophic Black Kandosol

**ASC Confidence:**
Confidence level not specified

**Mapping Unit:** N/A
**Principal Profile Form:** Um
**Great Soil Group:** N/A

## Site

## Vegetation:

## Surface Coarse

## Profile

A1 0 - 0.14 m Black (10YR2/1-Moist); ; Fine sandy loam; Moderate grade of structure, 2-5 mm, ; Rough-ped fabric; Weak consistence; Field pH 7.1 (pH meter); Many, fine (1-2mm) roots; Clear, Smooth change to -

B21w 0.14 - 0.28 m Very dark brown (10YR2/2-Moist); ; Loam; Moderate grade of structure, 5-10 mm, Polyhedral; Rough-ped fabric; Weak consistence; Field pH 7.2 (pH meter); Many, fine (1-2mm) roots; Gradual, Smooth change to -

B22w 0.28 - 0.7 m Very dark brown (10YR2/2-Moist); ; Loam; Weak grade of structure, 5-10 mm, Subangular blocky; Rough-ped fabric; Weak consistence; Field pH 7.1 (pH meter); Few, fine (1-2mm) roots; Gradual, Smooth change to -

B23w 0.7 - 1.1 m Dark brown (7.5YR3/2-Moist); ; Clayey fine sand; Firm consistence; Field pH 7.1 (pH meter); Few, fine (1-2mm) roots;

B24w 1.1 - 1.5 m Dark brown (10YR3/3-Moist); ; Clayey fine sand; Firm consistence; Field pH 7 (pH meter); Few, fine (1-2mm) roots;

B25w 1.5 - 1.65 m Dark brown (10YR3/3-Moist); ; Clayey coarse sand; 2-10%, subrounded, Quartz, coarse fragments; Field pH 7 (pH meter);

1.65 - m ; Clayey coarse sand;

## Morphological Notes

| | |
|---|---|
| A1 | charcoal lay4er at base and many fine roots |
| B21w | many fine roots |
| B22w | many fine roots |
| B23w | few fine roots |
| B24w | few fine roots |

## Observation Notes

## Site Notes

**Project Name:** Chittering land resources survey
**Project Code:** CHT **Site ID:** 0936 **Observation** 1
**Agency Name:** Agriculture Western Australia

**Laboratory Test Results:**

| Depth | pH | 1:5 EC | Exchangeable Cations Ca | Mg | K | Na | Exchangeable Acidity | CEC | ECEC | ESP |
|---|---|---|---|---|---|---|---|---|---|---|
| m | | dS/m | | | | Cmol (+)/kg | | | | % |
| 0 - 0.14 | 5.4B 6.4H | 9B | 5.76A | 3.36 | 0.34 | 0.59 | | | 10.05D | |
| 0 - 0.14 | 5.4B 6.4H | 9B | 5.76A | 3.36 | 0.34 | 0.59 | | | 10.05D | |
| 0 - 0.14 | 5.4B 6.4H | 9B | 5.76A | 3.36 | 0.34 | 0.59 | | | 10.05D | |
| 0.02 - 0.07 | | | | | | | | | | |
| 0.14 - 0.28 | 5.2B 6.9H | 4B | 4.34A | 1.86 | 0.17 | 0.53 | | | 6.9D | |
| 0.14 - 0.28 | 5.2B 6.9H | 4B | 4.34A | 1.86 | 0.17 | 0.53 | | | 6.9D | |
| 0.14 - 0.28 | 5.2B 6.9H | 4B | 4.34A | 1.86 | 0.17 | 0.53 | | | 6.9D | |
| 0.18 - 0.23 | | | | | | | | | | |
| 0.28 - 0.7 | 5.7B 7.1H | 7B | 4.67A | 3.04 | 0.12 | 0.82 | | | 8.65D | |
| 0.28 - 0.7 | 5.7B 7.1H | 7B | 4.67A | 3.04 | 0.12 | 0.82 | | | 8.65D | |
| 0.28 - 0.7 | 5.7B 7.1H | 7B | 4.67A | 3.04 | 0.12 | 0.82 | | | 8.65D | |
| 0.32 - 0.37 | | | | | | | | | | |
| 0.7 - 1.1 | 5.5B 7.2H | 4B | 1.75A | 2.05 | 0.03 | 0.4 | | | 4.23D | |
| 0.7 - 1.1 | 5.5B 7.2H | 4B | 1.75A | 2.05 | 0.03 | 0.4 | | | 4.23D | |
| 0.7 - 1.1 | 5.5B 7.2H | 4B | 1.75A | 2.05 | 0.03 | 0.4 | | | 4.23D | |
| 0.77 - 0.82 | | | | | | | | | | |
| 1.1 - 1.5 | 5.6B 7.2H | 6B | 1.22A | 2.62 | 0.02 | 0.68 | | | 4.54D | |
| 1.1 - 1.5 | 5.6B 7.2H | 6B | 1.22A | 2.62 | 0.02 | 0.68 | | | 4.54D | |
| 1.1 - 1.5 | 5.6B 7.2H | 6B | 1.22A | 2.62 | 0.02 | 0.68 | | | 4.54D | |
| 1.5 - 1.65 | 5.7B 7.2H | 11B | 0.41A | 2.96 | 0.02 | 1.04 | | | 4.43D | |
| 1.5 - 1.65 | 5.7B 7.2H | 11B | 0.41A | 2.96 | 0.02 | 1.04 | | | 4.43D | |

| Depth | CaCO3 | Organic C | Avail. P | Total P | Total N | Total K | Bulk Density | Particle Size Analysis GV | CS | FS | Silt |
|---|---|---|---|---|---|---|---|---|---|---|---|
| m | % | Clay % | mg/kg | % | % | % | Mg/m3 | | | % | |
| 0 - 0.14 | | 2.96D | | 370B | 0.179E | | | | | | 6.4 |
| 4.2 | | | | | | | | | | | |
| 0 - 0.14 | | 2.96D | | 370B | 0.179E | | | | | | 6.4 |
| 4.2 | | | | | | | | | | | |
| 0 - 0.14 | | 2.96D | | 370B | 0.179E | | | | | | 6.4 |
| 4.2 | | | | | | | | | | | |
| 0.02 - 0.07 | | | | | | | 1.00 | | | | |
| 0.14 - 0.28 | | 1.23D | | 220B | 0.07E | | | | | | 6.4 |
| 9.3 | | | | | | | | | | | |
| 0.14 - 0.28 | | 1.23D | | 220B | 0.07E | | | | | | 6.4 |
| 9.3 | | | | | | | | | | | |
| 0.14 - 0.28 | | 1.23D | | 220B | 0.07E | | | | | | 6.4 |
| 9.3 | | | | | | | | | | | |
| 0.18 - 0.23 | | | | | | | 1.10 | | | | |

**Project Name:** **Chittering land resources survey**
**Project Code:** **CHT** **Site ID:** **0936** **Observation** **1**
**Agency Name:** **Agriculture Western Australia**

| | | | | | | |
|---|---|---|---|---|---|---|
| 0.28 - 0.7 | 0.92D | 210B | 0.053E | | | 9.1 |
| 14.4 | | | | | | |
| 0.28 - 0.7 | 0.92D | 210B | 0.053E | | | 9.1 |
| 14.4 | | | | | | |
| 0.28 - 0.7 | 0.92D | 210B | 0.053E | | | 9.1 |
| 14.4 | | | | | | |
| 0.32 - 0.37 | | | | 1.30 | | |
| 0.7 - 1.1 | 0.4D | 160B | 0.022E | | | 4.3 |
| 8.6 | | | | | | |
| 0.7 - 1.1 | 0.4D | 160B | 0.022E | | | 4.3 |
| 8.6 | | | | | | |
| 0.7 - 1.1 | 0.4D | 160B | 0.022E | | | 4.3 |
| 8.6 | | | | | | |
| 0.77 - 0.82 | | | | 1.40 | | |
| 1.1 - 1.5 | 0.33D | 140B | 0.019E | | | 5.2 |
| 8.4 | | | | | | |
| 1.1 - 1.5 | 0.33D | 140B | 0.019E | | | 5.2 |
| 8.4 | | | | | | |
| 1.1 - 1.5 | 0.33D | 140B | 0.019E | | | 5.2 |
| 8.4 | | | | | | |
| 1.5 - 1.65 | 0.3D | 130B | 0.018E | | | 5.4 |
| 10.4 | | | | | | |
| 1.5 - 1.65 | 0.3D | 130B | 0.018E | | | 5.4 |
| 10.4 | | | | | | |

**Laboratory Analyses Completed for this profile**

| | |
|---|---|
| 15_NR_BSa | Exchangeable bases (Ca++) - meq per 100g of soil - Auto calculated from available |
| 15_NR_CMR | Exchangeable bases (Ca/Mg ratio) - Not recorded |
| 15A1_CA | Exchangeable bases (Ca2+,Mg2+,Na+,K+) - 1M ammonium chloride at pH 7.0, no pretreatment for soluble salts |
| 15A1_CEC | Exchangeable bases (CEC) - 1M ammonium chloride at pH 7.0, no pretreatment for soluble salts |
| 15A1_K | Exchangeable bases (Ca2+,Mg2+,Na+,K+) - 1M ammonium chloride at pH 7.0, no pretreatment for soluble salts |
| 15A1_MG | Exchangeable bases (Ca2+,Mg2+,Na+,K+) - 1M ammonium chloride at pH 7.0, no pretreatment for soluble salts |
| 15A1_NA | Exchangeable bases (Ca2+,Mg2+,Na+,K+) - 1M ammonium chloride at pH 7.0, no pretreatment for soluble salts |
| 15J_BASES | Sum of Bases |
| 15L1_a | Exchangeable bases Base saturation percentage (BSP) - Auto calculated from available using Sum of Cations and measured clay |
| 15N1_a | Exchangeable sodium percentage (ESP) - Auto calculated from available using CEC |
| 15N1_b | Exchangeable sodium percentage (ESP) - Auto calculated from available using Sum of Cations |
| 3_NR | Electrical conductivity or soluble salts - Not recorded |
| 4_NR | pH of soil - Not recorded |
| 4B1 | pH of 1:5 soil/0.01M calcium chloride extract - direct |
| 6A1_UC | Organic carbon (%) - Uncorrected Walkley and Black method |
| 7A1 | Total nitrogen - semimicro Kjeldahl, steam distillation |
| 9A3 | Total Phosphorus (ppm) - semimicro kjeldahl, automated colour |
| 9H1 | Anion storage capacity |
| P10_1m2m | 1000 to 2000u particle size analysis, (method not recorded) |
| P10_20_75 | 20 to 75u particle size analysis, (method not recorded) |
| P10_75_106 | 75 to 106u particle size analysis, (method not recorded) |
| P10_gt2m | > 2mm particle size analysis, (method not recorded) |
| P10_NR_C | Clay (%) - Not recorded |
| P10_NR_Saa | Sand (%) - Not recorded arithmetic difference, auto generated |
| P10_NR_Z | Silt (%) - Not recorded |
| P10106_150 | 106 to 150u particle size analysis, (method not recorded) |
| P10150_180 | 150 to 180u particle size analysis, (method not recorded) |
| P10180_300 | 180 to 300u particle size analysis, (method not recorded) |
| P10300_600 | 300 to 600u particle size analysis, (method not recorded) |
| P106001000 | 600 to 1000u particle size analysis, (method not recorded) |

| | |
|---|---|
| P3A_NR | Bulk density - Not recorded |

**Project Name:** **Chittering land resources survey**
**Project Code:** **CHT** **Site ID:** **0936** **Observation** **1**
**Agency Name:** **Agriculture Western Australia**