## 3. ARCHAEOLOGICAL RESULTS

The development area was improved arable fields which had been subject to regular ploughing. The homogeneous topsoil ranged between 0.3m and 0.4m in depth, overlying a clayey-silt subsoil which varied in depth between 0.1m and 0.3m. The natural substrate consisted of light brown to grey sandy clays and clayey sands, often with large sub-angular to rounded stones and shale present. A number of clay pipe field drains, orientated north/south, crossed

the site at regular intervals. Evidence of rig-andfurrow cultivation was identified during both the excavation and the evaluation (Glendinning 2013); cultivation furrows, aligned north-east to south-west and between 0.8m and 1.5m wide, were observed overlying part of the south-western corner of the inner and outer ditches, extending to the southwestern trench edge. Adverse weather conditions during the second half of the excavation led to severe waterlogging of the site and frequent flooding within the ditches.



**Illus 5** Aerial photograph showing locations of baulks and waterlogging. © West Lothian Archaeological Trust

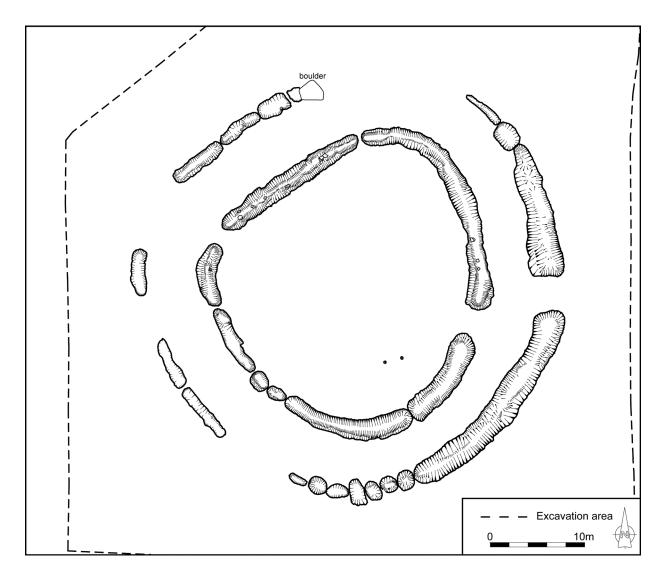
The excavation revealed the remains of a subcircular, double-ditched enclosure which measured 64m from north-west to south-east and 65m transversely, enclosing an area of approximately  $3,000\text{m}^2$  (0.3ha) (Illus 5). The internal enclosure ditch was set 7–8m inside the outer ditch and enclosed an area c 46m north-east to south-west by 44m transversely, an area of approximately  $1,600\text{m}^2$  (0.16ha).

## 3.1 Outer ditch

Of the two ditches, the outer exhibited the greater variability in its form around its circuit and was far more discontinuous than the inner ditch (Illus 6). The most complete lengths of ditch were to be found on the eastern and southern sides (Contexts 001, 021, 291 and 292). There were large gaps in

the ditch along the northern and western portion of its circuit. Apart from the eastern side, most of the ditch consisted of a number of isolated or conjoined pits or scoops (Contexts 010, 025, 036, 050, 055, 071, 075, 076, 077, 078, 082, 091, 293, 294 and 295). The depth and width of the outer ditch ranged between 0.2–1.4m and 1.0–4.65m respectively. The deepest and widest segments were found on the eastern side and the features became progressively shallower from east to west.

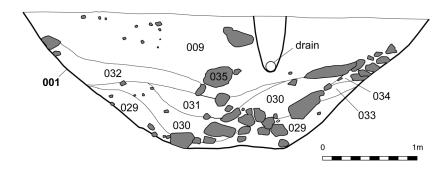
An entrance through the outer ditch, situated on the east side, was approximately 5.5m wide. Its southern terminus was c 4.2m wide and 1.4m deep with steep sloping sides and a flat base (Illus 7 & 8). The northern terminus was 4.3m wide and 1.05m deep with steep sides and a flat base (Illus 9).



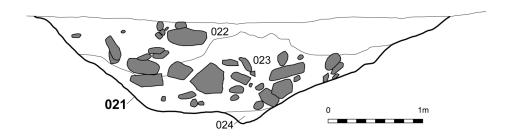
Illus 6 Site plan showing hachures. © CFA Archaeology Ltd



Illus 7 View from southern terminus of outer ditch showing Slot 001. © CFA Archaeology Ltd



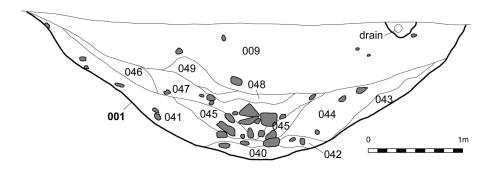
Illus 8 North-facing section of Slot 001A. © CFA Archaeology Ltd



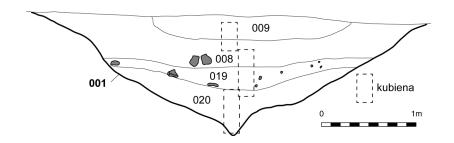
Illus 9 South-facing section of Slot 021A. © CFA Archaeology Ltd

The fills of the outer ditch were, by and large, similar in appearance, texture and compaction. The primary fills generally consisted of firmly compacted brown/grey clays (Contexts 030, 040, 051 and 057), or orange/brown/grey silty clays (Contexts 020, 041, 042, 052, 053 and 056). These were overlain by fills which generally consisted of sandy clays (Contexts 031, 032 and 043) and silty

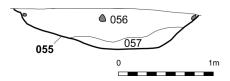
clays (Contexts 041, 042, 044 and 045), varying in colour from mid-brown/orange to orange/grey and which were loose or moderately compacted (Illus 10). The outer ditch generally contained four to five separate fills in the larger, deeper eastern side components, whereas the shallower western ditch segments contained two to three separate fills on average (Illus 9–13).



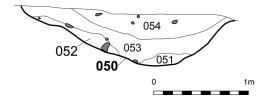
Illus 10 North-east-facing section of Slot 001B. © CFA Archaeology Ltd



Illus 11 South-west-facing section Slot 001C. © CFA Archaeology Ltd



Illus 12 North-facing section of Slot 055A. © CFA Archaeology Ltd



Illus 13 North-east-facing section of Slot 050A. © CFA Archaeology Ltd

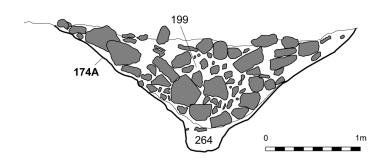
## 3.2 Inner ditch

The inner ditch was more regular in shape and form and more continuous than the outer ditch. Similarly to the outer ditch, the inner ditch consisted of a series of conjoined pits or scoops (Contexts 060, 100, 105, 110, 115, 174 and 235). The depth and width of the inner ditch ranged between 0.35–1.3m and 2.5–3.7m respectively, and its overall dimensions were fairly consistent around its circuit, apart from the south-western length which varied between 0.35m and 0.6m deep.

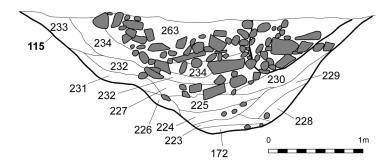
The entrance through the inner ditch, which measured c 4.1m wide, was offset from the corresponding entrance in the outer ditch, being located slightly to the south of it on an east-south-east alignment. Like the outer ditch, the deepest and widest segments of ditch were the northern and southern termini of the entrance. The northern terminus measured c 4m wide and 1.3m deep with a V-shaped profile. The southern terminus measured c 4.1m wide and 1.2m deep and had a more U-shaped profile. There was another possible entrance opposite the east-south-

eastern entrance, which measured c 3m wide. Its northern terminus measured 2.8m in width by 1.3m deep with a V-shaped profile (Illus 14). The southern terminus measured 3.7m wide by 1.2m deep with a flat base (Illus 15). The inner ditch side was steeper than the outer at c 60° and 45° respectively.

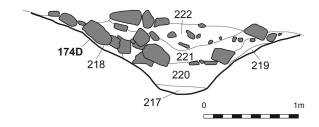
The primary fills within the inner ditch varied along the circuit but generally consisted of clays (Contexts 217, 264, 270), sandy clays (Contexts 269, 272), silty clays (Contexts 172, 220, 279, 281) or loamy silts (C280) which varied in colour from blueish grey to mottled grey/orange (Illus 16-19). The primary fills were overlain by large stones (grey siltstones and mudstones) within a matrix of sandy or silty clays (Contexts 153, 221 and 278). A greater volume of stone was found within the eastern half, including termini of the eastern entrance (Slots 174A-H, 111A-D and 115A-D), decreasing in quantity elsewhere from east to west around the circuit (Illus 20 & 21). The final deposition of the stone occurred after another period of silting.



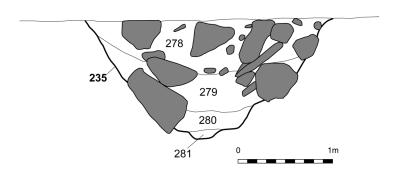
Illus 14 South-facing section of Slot 174A, northern terminus, inner ditch. © CFA Archaeology Ltd



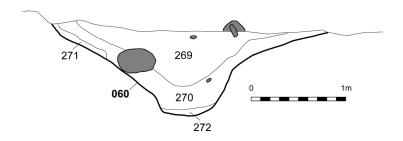
**Illus 15** North-east-facing section of Slot 115D, southern terminus, inner ditch. CFA Archaeology Ltd



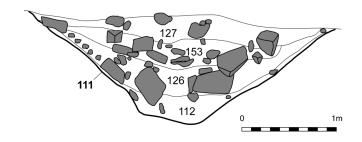
Illus 16 South-east-facing section of Slot 174D. © CFA Archaeology Ltd



Illus 17 South-west-facing section of Slot 235B. © CFA Archaeology Ltd



Illus 18 North-east-facing section of Slot 060A. © CFA Archaeology Ltd



Illus 19 East-facing section of Slot 111C. © CFA Archaeology Ltd



Illus 20 View of north-west-facing section of Slot 174G.  $\ @$  CFA Archaeology Ltd



Illus 21 View of north-facing section of Slot 174B. © CFA Archaeology Ltd

## 3.3 Post holes/pits

Two small circular possible post holes (C164 and C166) were identified within the enclosure (Illus 6 & 22). The smaller of the two (C166) was roughly circular and had a diameter of 0.23m, survived to a

depth of 0.15m and contained packing stones. The second feature (C164) was circular in shape and was slightly larger (0.25m in diameter and 0.14m deep). The fills of C164 and C166 were light brown sandy silt (C165) and dark brown sandy silt (C167) respectively.



Illus 22 Plan view of the half-sectioned possible post hole 166. © CFA Archaeology Ltd