

3. ARCHAEOLOGICAL OBSERVATIONS

3.1 Structural recording

Outline drawn records were made of the standing buildings on the site in 1989 prior to the demolition of Lower Mills. The leat channels and derelict mill wheel were also partially recorded at this period. This work was carried out by Exeter Museums Archaeological Field Unit (EMAFU), whose records are held in the EA archives. Cross sections through the leats compiled at this time are reproduced in Figure 5.

3.2 Excavations 1989-90

Excavations were carried out immediately to the east and west of the present site in 1989 and 1990 (Figs 5 and 6). These showed that deposits around two metres in overall depth occur in the Lower Mills area, overlying coarse river gravels. In places these deposits exceed 2 m in depth, particularly where water channels have scoured into the underlying gravels. The general conclusions derived from these investigations relating to the pre-1500 topographical development of the Lower Mills area have been briefly summarised in 1.2 above. For additional archaeological background information reference should be made to EA Report 96.36. For subsequent periods the cartographic and documentary sources provide the most relevant useful available information on the likely extent of historic structures.

3.3 Contamination test pits 1997

Nine test pits were dug by machine on 24 November 1997 and monitored by an EA archaeologist. It was not possible to make detailed observations since the trenches were deep and narrow, but the general sequence in each pit was recorded and a number of leat walls were identified. The observations are tabulated below in an Appendix and the pit locations are shown on Fig. 6.

4. ARCHAEOLOGICAL IMPACT

4.1 Existing levels

The existing general ground level within the eastern part of the application site, where the two new building blocks will be located, varies between about 7.40 and 8.00 m OD (with some points being above or below this range) and an average value of around 7.60 m. Much of the site is covered by concrete slabs, other parts by demolition rubble. The test pit observations indicate that modern deposits and surfacings are nowhere less than 500 mm deep and in places reach a thickness of well over a metre (Appendix).

4.2 Proposed groundworks (Figs 7-10)

It is understood that existing slabs will be removed, with the underlying deposits then being graded, if necessary, to achieve the required general formation level, which ranges between 7.15 m OD in the North Block and 7.525 m OD in the South Block.

The buildings will be founded on continuous bored flight augered concrete piles 400 mm in diameter, positioned approximately as indicated in Fig. 8, penetrating to a depth of about 8 m.