

Wykehurst Place Bolney

Method Statement for Rebuilding of Retaining Wall

Job No 24140
October 2025

METHOD STATEMENT

REMOVAL OF TREE STUMP, EXCAVATION AND REBUILDING OF RETAINING WALL WITH STONE REINSTATEMENT

1. Scope of Works

This method statement outlines the procedure for:

- Removal of a large tree stump and roots causing displacement of the existing stone retaining wall (300-600mm lean)
- Dismantling and storage of the existing stone wall in logical sections
- Excavation to accommodate a new reinforced concrete (RC) foundation
- Construction of a new reinforced concrete (RC) retaining wall including Stepoc block system
- Rebuilding the stone wall façade using salvaged original stones
- Drainage installation, backfilling, surface reinstatement and final finishes.

2. Reference Documents

- **Ellis Structures drawings:**
 - 'Retaining wall plans – existing and proposed' (Ref: 24140 / Aug 2025)
 - 'RC Foundation detail' (Drawing 24140-12,01)
- **Site photos:** pre-works condition, scaffolding layout
- **Conservation officer guidance:** for reinstating listed/historic stonework.

3. Materials and Equipment

- Excavators (5-tonne), hand tools (shovels, saws, etc)
- Lifting equipment (soft clamps, slings, scissor lift)
- Temporary shoring and scaffolding
- Concrete and reinforcement as per structural details
- Stepoc blocks (325mm)
- Geotextile membrane and MOT Type 1 sub-base
- Salvaged and replacement stone (where needed)
- Stainless steel ties for stone-to-wall fixing
- French drain system and backfill material.

4. Methodology

Step 1: Preparation and safety

- Establish site storage on level ground with vehicular access
- If needed, reinforce ground using geotextile membrane and 150-200mm of MOT Type 1
- Install edge protection, scaffolding and barriers around the work area
- Confirm isolation of underground services.

Step 2: Tree stump and root removal

- Carefully excavate around the stump and major roots
- Use lifting equipment and controlled cutting to remove stump without damaging surrounding structure
- Retain any root structures contributing to temporary wall support until later stages.

Step 3: Stone number and wall dismantling

3.1 Numbering system

- Label stones by vertical layers (A, B, C...) and horizontal position (1, 2, 3...)
 - Eg: Top left = A1, below it = B1, next stone to the right = A2, etc
- Mark all visible faces of each stone using chalk or temporary marker
- Store salvaged stones on padded timber in a logically ordered storage area.

3.2 Dismantling process

- Dismantle wall progressively in approximately 1.5m height sections:
 - **First reduction:** top 1.5m section, remove coping stones by hand
 - **Second reduction:** dismantle next 1.5m section using soft clamp digger
 - **Final reduction:** remove last 1.7m to base level.
- Form battered ends to each dismantled section for better bond during rebuild.

Step 4: Excavation

4.1 Behind wall

- Excavate approximately 1.7m behind each dismantled wall section in sequence
- Maintain approximately 2m width behind wall face
- Use 5-tonne excavator and switch to hand tools around sensitive features (eg roots, services)
- Do not remove root structures that provide temporary stability.

4.2 Final excavation for foundation

- Excavate to formation level approximately 500mm below the base of the original wall.
 - To accommodate:
 - 50mm concrete blinding layer
 - 450mm RC foundation thickness.

Step 5: RC base construction

- Lay 50mm lean mix blinding concrete
- Install reinforcement cage as per drawing 12,01
- Pour and mechanically vibrate 450mm thick reinforced concrete
- Allow curing as per engineer's guidance before proceeding.

Step 6: Stepoc retaining wall installation

- Construct 325mm Stepoc block wall on cured RC foundation in stages (~1m lifts)
- Insert vertical reinforcement bars with correct lap length before concrete pour
- Fill stepoc cores with concrete in stages to manage pressure
- Scaffolding to be adjusted as wall height increases.

Step 7: Stone wall reinstatement

- Rebuild stone wall against new Stepoc wall using original numbered stones
- Begin from lowest course, working upwards:
 - Use soft clamp or scissor lift for placing large/heavy stones
 - Rework back of stones as needed to sit flush against Stepoc wall
 - Install stainless steel mechanical ties into stone bed joints at regular intervals
- Match original coursing, face finish, and dry-set or mortar jointing (as approved by conservation officers)
- Replace damaged stones with like-for-like materials, pre-approved.

Step 8: Coping stones and final stone courses

- Reinstall coping stones in original sequence and alignment
- Ensure clean, level finish with minimal deviation
- Adjust scaffold levels as required during upper course installation.

Step 9: Drainage and backfilling

- Install French drain system behind wall, sloping to discharge at nearest watercourse or soakaway
- Surround with free-draining material (e.g. pea shingle)
- Backfill in compacted layers ≤500mm using clean site-won or imported material
- Dispose of surplus spoil off-site.

Step 10: Finishing works

- Clean stone face and remove all temporary protection and scaffolding
- Reinstall internal paving or surface finishes
- Regrade external ground and spread topsoil where disturbed
- Reseed or turf as necessary to restore natural appearance.

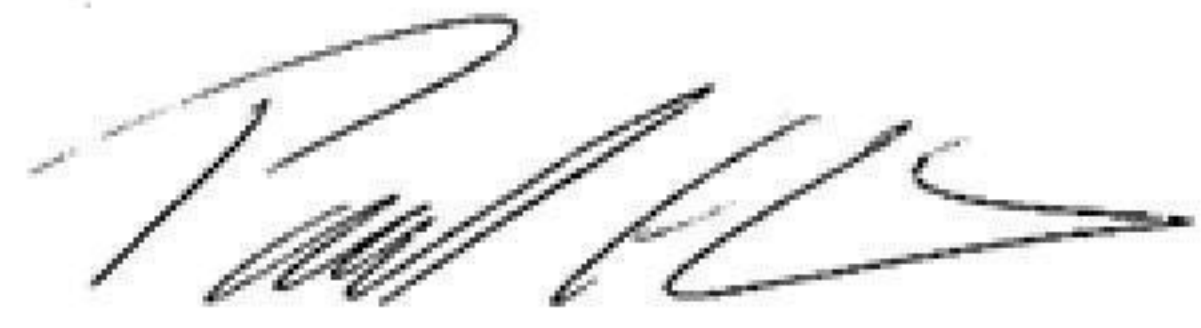
5. Health & Safety

- Works carried out under **CDM Regulations**
- PPE required: hard hats, boots, hi-vis, gloves
- Scaffolding and barriers to remain in place until works are complete and safe
- Excavations will be supported or battered to prevent collapse
- Mechanical lifting equipment used to minimise manual handling risks.

6. Quality Assurance

- All stages monitored and signed off by project engineer/surveyor:
 - Reinforcement and shuttering checks before concrete pour
 - Alignment and coursing of stonework
- Final works approved against conservation requirements.

Prepared by:

A handwritten signature in black ink, appearing to read 'Paul James Ellis', with a stylized flourish at the end.

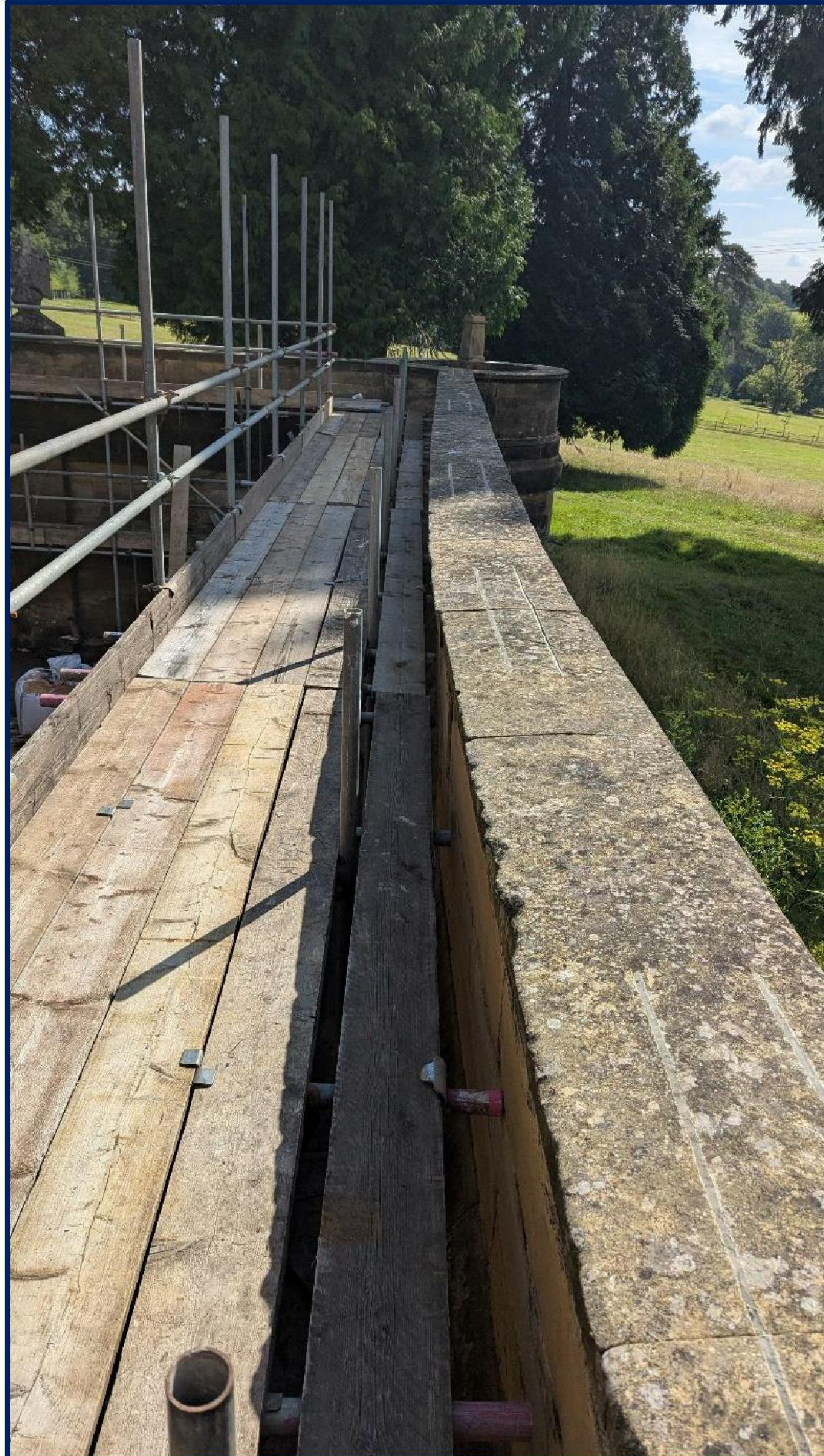
Name: Paul James Ellis MSC CENG MISTRUCTE

Date: 6 October 2025

APPENDIX – PHOTOGRAPHS



Cracking to the wall



Wall showing the bend