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Structural Method Statement for the Front Lower Ground Works To 147 Gloucester Avenue London NW1 8LA

201009 **February 2010**

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		Job No	Sheet No.	Revision
Job Title	147 Gloucester Avenue, London, NW1 8LA	Date	Made By	Checked By
Section		02/10	C.A	

CLIENT

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ARCHITECT

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CODES TO BE ADOPTED IN SCHEME DESIGN FOLLOWING PLANNING

- BS 648: 1964 – Weights of Building Materials
- BS 6399: Pt 1: 1984 – Design Loads
- BS 5950: Pt 1: 1990 – Structural Steel
- BS 5628: Pt 1: 1992 – Masonry
- BS 5268: Pt 2: 1991 – Structural Timber
- BS 8002: Retaining Wall Design
- BS 8004: Foundation Design
- BS 8007: Concrete Design Water Resisting Structure
- BS 8102: Basement Waterproofing
- BS 8110: Pt1: 1997 – Structural Use of Concrete
- CIRIA Report 139

IMPOSED LOADS

- Domestic – 1.5 kN/m^2

ASSUNED GROUND CONDITIONS AT THIS STAGE

- London Clay

INTRODUCTION

Our Client is looking to create a new extension in their front garden by cast new retaining walls into the ground. The new walls will follow along perimeter of the front boundary walls and follow the boundary line to the public footpath.

METHOD STATEMENT FOR THE PROPOSED BASEMENT WORKS

This method statement is for the purpose of the design team's design development and for the purpose of the client's planning application. The appointed contractor will be responsible for all temporary supports and for stability of the structure during the works. The contractor will have to submit their proposed method statement prior to the works commencing on site.

A Geotechnical Consultant will be employed to assist with regards to subsurface drainage in relation to the proposed works and therefore this sequence or works will not be covered by this method statement. In receipt of the site investigation works the design team will have to review the methods of waterproofing the new extension. BS8102 sets out guidance for the waterproofing of basement structures according to their use. With this in mind the use of tanked, integral and/or drained methods of waterproofing will have to be considered. These items again have been excluded from our method statement at this stage.

PROPOSED STATEMENT
Items written in italics highlight design guidelines should planning approval be granted.

See also attached drawings 201009-001 when reading this statement.

1. Employ a site investigation company to cut trial pits to ascertain the depth and profile of the existing foundations to the load bearing walls and boundary walls as indicated on the drawings.

2. The piling contractor should cut two boreholes to establish the water table level and in order to confirm the existing ground conditions so that they can design all piled foundation/walls as necessary. An internal angle of friction should also be established for retaining wall designs and an all allowable bearing pressure should be provided so that foundations can be designed. These results should be listed in an interpretive report and forwarded to the appointed structural engineer the main works.

3. Gain all the party wall awards and tree preservation awards as necessary.

4. Gain all Building Control approvals as necessary

5. Carry out a written and photographic survey of the boundary walls and internal and external surveys.

6. Erect all hoarding around the site as necessary.

7. Erect a piling platform within the front garden as necessary.

8. Install new contiguous piled walls to form the new profile of the basement works. Pile tolerance will be + or – 75mm horizontally and 1:75 vertically. *(The piled walls will have to be designed by the Contractor to act as propped cantilevers in a temporary condition. The walls will have to withstand a surcharge of 10kN/m^2 from the public footpath. In their final condition the piles wall will be restrained at their heads by a pile cap/beams that in turn will transfer lateral loads into the head of the contiguous piled wall that runs perpendicular to them.)*

9. Cut down piled walls to the relevant pile cut off level and install reinforced concrete pile caps/beams.

10. Break out the existing boundary walls and grub up existing ground slabs as necessary.

11. Install all new below ground service together with puddle flange sleeves.

12. Cast blinding and install all tanking as necessary.

13. Cast new lower ground slab. *(Ensure that the base is designed to BS8007 and check the base slab for uplift in a temporary condition.)*

14. Install tanking up the faces of the contiguous walls and cast the lining reinforced concrete walls from new lower ground slab level up to the underside of the pile caps/beams.

15. Build up the new load bearing masonry walls and tie the existing structure into the new as necessary.

16. Cast the new suspended slabs.

17. Continue with above ground tanking and install all insulation in accordance with the architect's details.

18. Complete landscaping.