P. P. O'CONNOR
Committed To Excellence

Arboricultural Method Statement
And
Tree Protection Plan

Siemens PLC
Sir William Siemens House

SIEMENS

Introduction

This Arboricultural method statement has been compiled to ensure the safe and healthy retention of all trees outlined to be retained at Sir William Siemens house, Manchester. This document describes the control measures and protection methods that must be put in place to prevent any disturbances to trees that have been outlined to be retained. The information contained in this Arboricultural Method Statement conforms to BS 5837:2005 'Trees in relation to Construction – Recommendations'

For details of trees to be retained and the locations and types of special protection methods, reference should be made to the Tree Protection Plan in Appendix 3.

Site Description

The site currently houses commercial buildings and associated car parking, a private hospital and redundant nurse's houses. The surrounding land predominately consists of residential buildings and a large cemetery situated to the North West of the site.

The tree survey identified that the site included 116 individual trees and 8 groups of trees. No trees met the requirements of category 'A' status. 63 individual trees and 3 groups of trees were identified as retention category 'B'. 48 individual trees and 3 groups were identified as retention category 'C'. The remaining 6 trees and 1 group of trees were identified as category 'U' items.

Category A	Category B	Category C	Category U
Trees of a high quality with an estimated remaining life expectancy of at least 40 years.	Those of moderate quality with and estimated remaining life expectancy of at least 20 years.	Those of low quality with an estimated remaining life expectancy of at least 10 years, or young trees with a stem diameter below 150mm.	Those in such a condition that they cannot realistically be retained as living trees in the context of the current land use for longer than 10 years.

Any tree surgery work recommended in this report should be in accordance with BS3998 2010 "Recommendations for tree work" by a competent, qualified Arboriculturalist. They must also hold sufficient public/employees liability insurance.

Root Protection Areas

Any tree retained within the design will require protection in accordance with BS5837 regardless of its initial retention category. All retained trees can be seen in Appendix 2 Tree Retention and Removal Plan. Based on the tree survey data, root protection areas (RPA's) have been determined for every retained tree. The RPA's are designed to protect at least a functional minimum of tree root mass in order to ensure that the trees survive the construction process. This protection will require trees to be fenced- off in areas equal to the RPA's plotted on the attached Tree Constraints Plan (TCP) (located in Appendix 1).

It is the responsibility of everyone engaged in the construction process to respect the tree protection measures and observe the necessary precautions within and adjacent to them.

Tree Protection Fencing

The Protection Plan (Appendix 3) shows the position of the Tree Protection Fencing (TPF). This fencing comprises of one type as detailed above, in line with BS5837:2012. Vertical banners should be erected and ground protection installed before any materials or machinery are brought onto site and before any demolition, development or stripping of soil commences.

Once erected, barriers and ground protection will be regarded as sacrosanct, and will not be removed or altered without prior agreement of an arboriculturalist and approval of the local planning authority.

Barriers should be fit for the purpose of excluding constructive activity, and appropriate to the degree and proximity of work taking place around the retained tree. On all sites, special attention should be paid to ensuring that barriers remain rigid and complete.

In most cases, barriers should consist of a scaffold framework in accordance with Fig. 2 comprising a vertical and horizontal framework, well braced to resist impacts, with vertical tubes spaced at a maximum interval of 3m. Onto this, weld mesh panels should be securely fixed with wire or scaffold clamps. Weld mesh panels on rubber or concrete feet are not resistant to impact and should not be used.

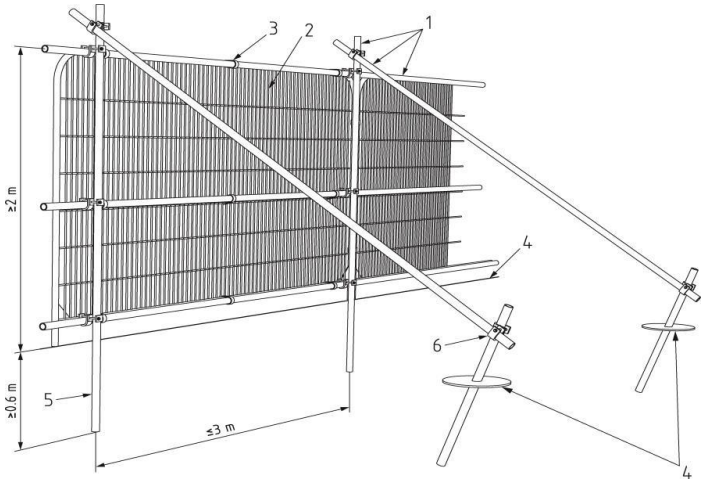
Should any alternative method of barrier construction be proposed, consultation with the developer's arboriculturalist will be obtained to clarify the efficacy of the revised design prior to informing the local planning authority and obtaining their consent. The protective barriers will be erected prior to the commencement of any site works around all retained trees and root protection areas e.g. before any materials are brought on site. Once erected all protective barrier will be regarded as sacrosanct, and will not be removed or altered without prior recommendation by the project Arboriculturist and approval by the local planning authority. Once the exclusion zone has been protected by barriers and/or ground protection, construction can commence. Signs should be fixed to the barriers with the words: 'Tree Protection Zone, No access', this can be seen in the picture below:

Fig 1. Tree Protection Zone Signage



The barrier is required to be sited in accordance with the Tree Protection Plan, please see appendix 3 once a final layout has been decided. It must ideally be constructed as per figure 2 in BS5837 and be fit for the purpose of excluding any construction activity (see diagram below). Any other fence/barrier used must be fit for the purpose.

Fig 2: The required fence specifications of BS5837:2012



Key
1. Standard scaffold poles
2. Heavy gauge 2m tall galvanized tube welded mesh infill panels
3. Panels secured to uprights with wire ties
4. Ground level
5. Uprights driven into the ground until secure (minimum depth 0.6m)
6. Standard scaffold clamps

Restrictions within Tree Protection Areas

Inside the exclusion area of the Protective Fencing, the following shall apply:

- No mechanical excavation
- No excavation by any other means without arboricultural site supervision.
- No hand digging without a written method statement having first been approved by the developer's arboriculturalist.
- No ground level changes whatsoever.
- No storage of plant or materials.
- No storage or handling of any chemicals.
- No vehicular access.
- No pedestrian access.

Ground Protection

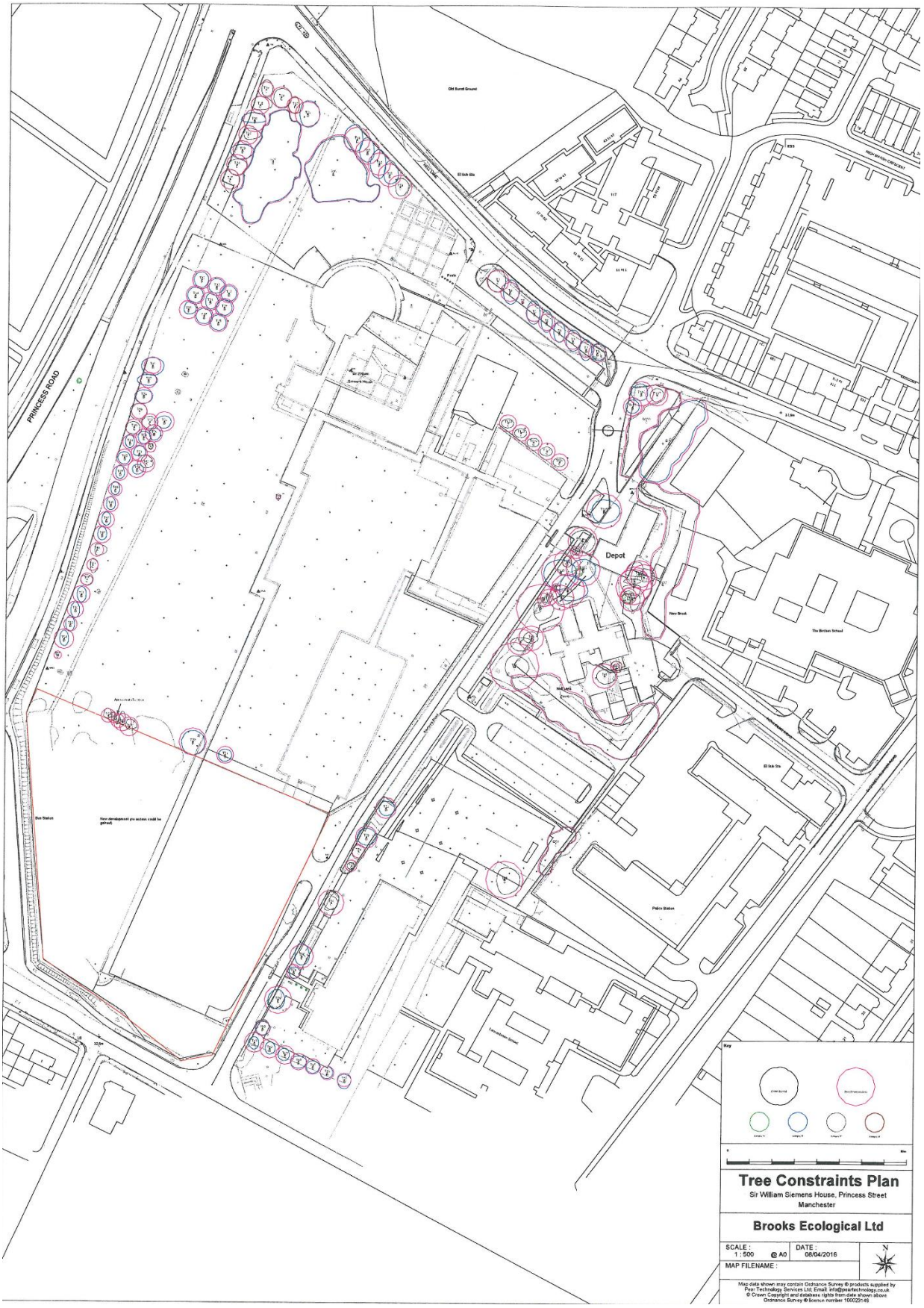
The primary method of protecting the ground when erecting scaffolding within RPA's is by installing geotextile fabric and side butting scaffolding boards on a compressible layer such as bark chippings on a geotextile membrane.

The scaffolding may be erected first with the uprights placed on spreader boards and the ground protection installed around the uprights.

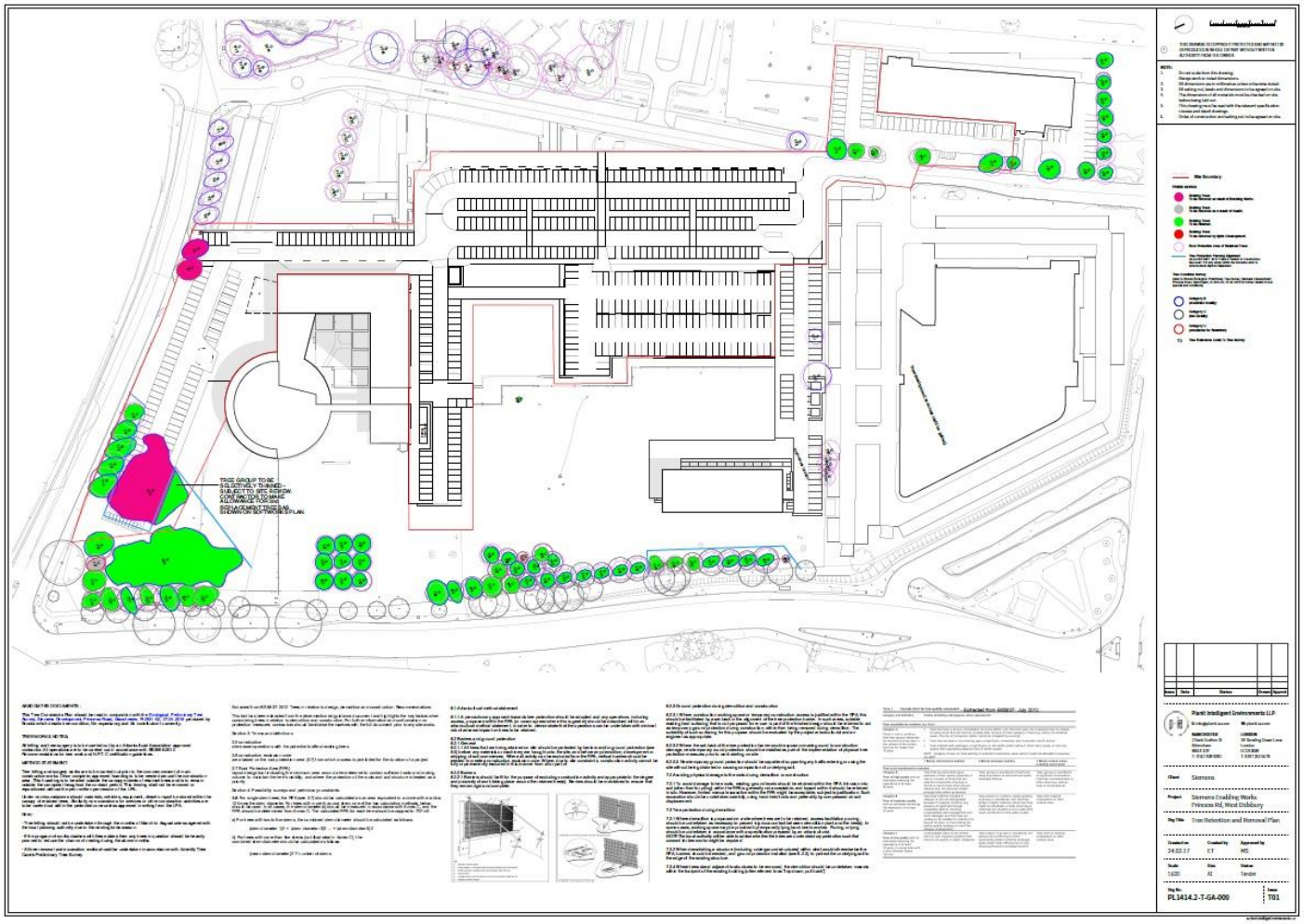
The boarding will be left in place until the building works are finished.

The ground beneath any protection boarding will be left undisturbed and will be protected with a porous geotextile fabric. If necessary, sand should be laid on the fabric to level the ground.

Appendix 1: Tree Constraints Plan



Appendix 2: Tree Retention and Removal Plan



Appendix 3: Tree Protection Plan

