Eurobuild Properties Ltd

Construction & Demolition Management Plan

65 - 67 Maygrove Road,
West Hampstead
London
NW6

Report Reference: 1053
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Contents

Executive Summary

The 65 - 67 Maygrove Road Construction Environmental Management Plan (CEMP) explains how Eurobuild Properties Ltd intends to manage demolition and construction activities throughout the phased implementation of the scheme.

The CEMP sets out the environmental control measures that Eurobuild Properties Ltd intends to observe to manage any adverse environmental effects of the construction process, to meet its own commitments to high standards and to address the requirements and aspirations of the London Borough of Camden (LBC).

The CEMP defines the specific commitments made by Eurobuild Properties Ltd, both for general site management (including working hours, site layout and appearance, security and heath and safety) and three specific environmental topics – noise and vibration, air quality (dust) and contaminated land.

The CEMP defines how these commitments would be implemented and how all the stakeholders would be consulted during the construction process, through a robust consultation procedure.

Throughout this document Eurobuild Properties Ltd will be referred to as “Eurobuild”

1 Introduction

1.1 PURPOSE

1.1.1 The 65 - 67 Maygrove Road Construction Environmental Management Plan (CEMP) explains how Eurobuild intends to implement the construction activities throughout the phased implementation of the scheme.

1.1.2 The CEMP follows the guidance set out by the "Guide for Contractors Working in Camden" (February 2008), and the Mayor of London and London Council's Best Practice Guidance on The control of dust and emissions from construction and demolition (November 2006).

1.1.3 The CEMP sets out the strategy and control measures and monitoring procedures that Eurobuild intends to observe to manage any adverse environmental effects of the construction process, to meet Eurobuild's own commitments to high standards and address the requirements and aspirations of the local authority.

1.1.4 Eurobuild is committed to the use of best practice in the management of the environmental impacts of construction. The CEMP aims to ensure that the Best Available Techniques Not Exceeding Excessive Costs (BATNEEC) as introduced in the Environmental Protection Act 1990 to cover both technologies and management techniques, are used for the control of the environmental impacts and construction. It also aims to ensure that, where appropriate, the Best Practical Environmental Option (BPEO), ensuring that least impact to the environment is achieved and that Best Practicable Means (BPM), in terms of controlling emissions and potential disturbance, is adopted.

1.1.5 The commitments made in the CEMP will be implemented by Eurobuild either directly or contractually through any sub-contractors they employ during the works.

1.2 THE SITE

1.2.1 The CEMP applies to the site of the 65 - 67 Maygrove Road development.

1.2.2 The site is located on Maygrove Road in the London Borough of Camden. Maygrove Road is situated to the east of Kilburn High Road (A5) and to the north of Iverson Road in proximity to Kilburn Underground station. The surrounding area is principally residential with terraced houses facing the site on Maygrove Road, a residential estate and Maygrove Peace Park to the rear and a recently completed residential development directly to the west of the site at 59 Maygrove Road. Northeast of the site is Maygrove Peace Park and Sidings Community Centre. There are commercial premises to the East including Maygrove House and 73 Maygrove Road, although the latter includes residential accommodation.

1.2.3 The site consists of two distinct elements; the main site area is located to the east of 59 Maygrove Road and contains a vacant commercial three storey building. The second element consists of a parcel of land to the east of the main site that was used as a car park by LBC although is now in the ownership of the client. This land fronts onto Maygrove Peace Park to the North and east.

1.3 THE SCHEME

1.3.1 The development comprises approx. a 90 unit residential scheme. Of these, a portion will be market units, with the balance being affordable units. The extent of such provision is yet to be confirmed.

1.3.2 Approximately 1,700 sqm (gross external footprint) per floor is provided with the building occupying four floor levels and a basement.
The precise mix is an assumption for assessment purposes at the time of writing. This should not be regarded as prescriptive because planning permission is ongoing.

1.3.3 The opportunity is being taken to design a landmark building, which is the visual termination of views from either end of Maygrove Road. This building confidentially highlights the apex of the bend of Maygrove Road. The response to the site has been informed by its context, particularly the development of traditional terraced properties facing the development site. The horizontal and vertical language of the elevation is inspired by traditional London terrace architecture. The design seeks to establish a horizontal and vertical variety, while maintaining a consistent overall language. Different building blocks break up the overall scale, while a variety of window types bring further articulation across the development.

1.3.4 Parking for approximately 120 bicycles and 11 disabled parking spaces will be accommodated at basement level. Access to these will be provided

from Maygrove Road. This is subject to planning permission and detailed design.

1.3.5 The design works to compliment the adjacent Maygrove Peace Park. The roofs will be planted with green and brown roofs. The communal garden will provide a series of seating spaces set within a landscaped garden. Planting will have seasonal interest and, in some species, reference will be made to the history of the Park with Japanese species. All edges of the site will be complimented with soft green edges.

1.3.6 The buildings will be of in-situ reinforced concrete flat slab construction. The elevation is assembled from quiet, dignified and crisp brick language with a variety of rhythm introduced into ordered and well detailed architecture. Variety is introduced by way of interplay between brick, timber and glazing to create both vertical and horizontal hierarchy in articulation.

1.4 THE WORKS

1.4.1 The works may be divided into the four phases described below

- Site preparation, including the demolition of existing structures and establishment of a piling mat.

- Foundation works. It is assumed that any piling that may be required would use the continuous flight auger method, with excavators, dumpers, concrete wagons and concrete pumps also being required;

- Building erection, which would involve the casting of concrete ground slabs in situ, brickworks/blockworks, scaffold erection and roofing, etc. It is assumed that any concreting works would require the use of a concrete pump, poker vibrators and power floats, as well as concrete wagon deliveries; and

- Infrastructure and **landscaping** works, including the construction/alteration of new/existing roads and external paving works.

1.5 CEMP STRUCTURE

1.5.1 The CEMP sets out a series of objectives and measures to be applied throughout the construction period by Eurobuild. It contains three sections:

- Part I (chapter 2) Construction Environmental Management Strategy. This section defines the overall strategy for managing environmental impacts that arise during the construction phase. It outlines how the CEMP would be implemented, including the liaison/consultation strategy.

- Part II (chapter 3) General Site Specific Requirements. This section sets out the requirements for managing the construction impacts of all site operations.

- Part III (chapter 4) Environmental Topic Specific Requirements. This section sets out the mitigation measures for the following topic specific issues:

- Noise and vibration
- Air quality (dust)
- Contaminated land

2 Construction Environmental Management Strategy

2.1 RESPONSIBILITIES

2.1.1 Eurobuild will retain overall responsibility for the works during all stages of construction. Eurobuild will identify an individual, with appropriate training and seniority, who will have overall responsibility to ensure that all construction activities are in compliance with the CEMP and statutory and consent obligations.

2.1.2 Eurobuild will be responsible for implementing the requirements of the CEMP, which will be updated as necessary as the design progresses and new information becomes available. All site staff will have a duty to minimise the risk of impacts to the environment from the activities on site and, therefore, environmental responsibilities will be required to be put in place at all levels within Eurobuild's team.

2.1.3 Eurobuild will be responsible for managing their Sub-Contractors and for ensuring that they understand and comply with the environmental obligations of the CEMP.

2.1.4 Eurobuild will nominate a Community Liaison Representative (CLR) who will be empowered to take action where necessary. The nominated CLR along with relevant local authority officers will form the core of a Construction Impact Group (CIG), although other members from relevant bodies and interested parties may be co-opted where appropriate.

2.2 METHOD STATEMENTS

2.2.1 Prior to the commencement of relevant site activities, Eurobuild (and any Sub-Contractors) will be required to produce Method Statements. These will include measures to implement the requirements of the CEMP in respect of particular tasks and locations.

2.2.2 At this stage, it is considered that there is no need to implement the prior consent procedure with respect to the control of construction noise and Vibration, as detailed in Section 61 of the Control of Pollution Act. However, a Section 61 application could be prepared should the local authority prefer the noise and vibration control procedure to be formalised in this way.

2.3 LIASON/CONSULTATION

2.3.1 The CIG will meet regularly throughout the construction period at a frequency to be determined or as required according to events or issues of particular concern.

2.3.2 The CLR will be the focal point for the dissemination of information and handling of any complaints. The CLR will be responsible for developing and administering a Helpline to respond to inquiries, concerns or complaints raised. All calls to the Helpline will be logged, together with the response given. Each concern/comment will be responded to rapidly and actioned in an appropriate manner. A summary of the calls/comments received and actions taken will be produced as a report for the CIG meeting.

2.3.3 The Helpline number will be clearly advertised on prominent displays of information around the site (on hoardings).

2.3.4 It is expected that the CIG and Helpline will be of most use during the early, infrastructure-heavy stages of the proposed development. The continuing need for the CIG, the frequency of meetings and the benefits of running the Helpline will be reviewed as the development progresses, to ensure that it continues to add value to the management of environmental impacts of construction.

2.3.5 Eurobuild will develop a public relations strategy with the aim of keeping residents, businesses and other local community informed about the potential impact of the works. As part of the strategy, a newsletter and/or flyers will be distributed to provide targeted information about particular impacts.

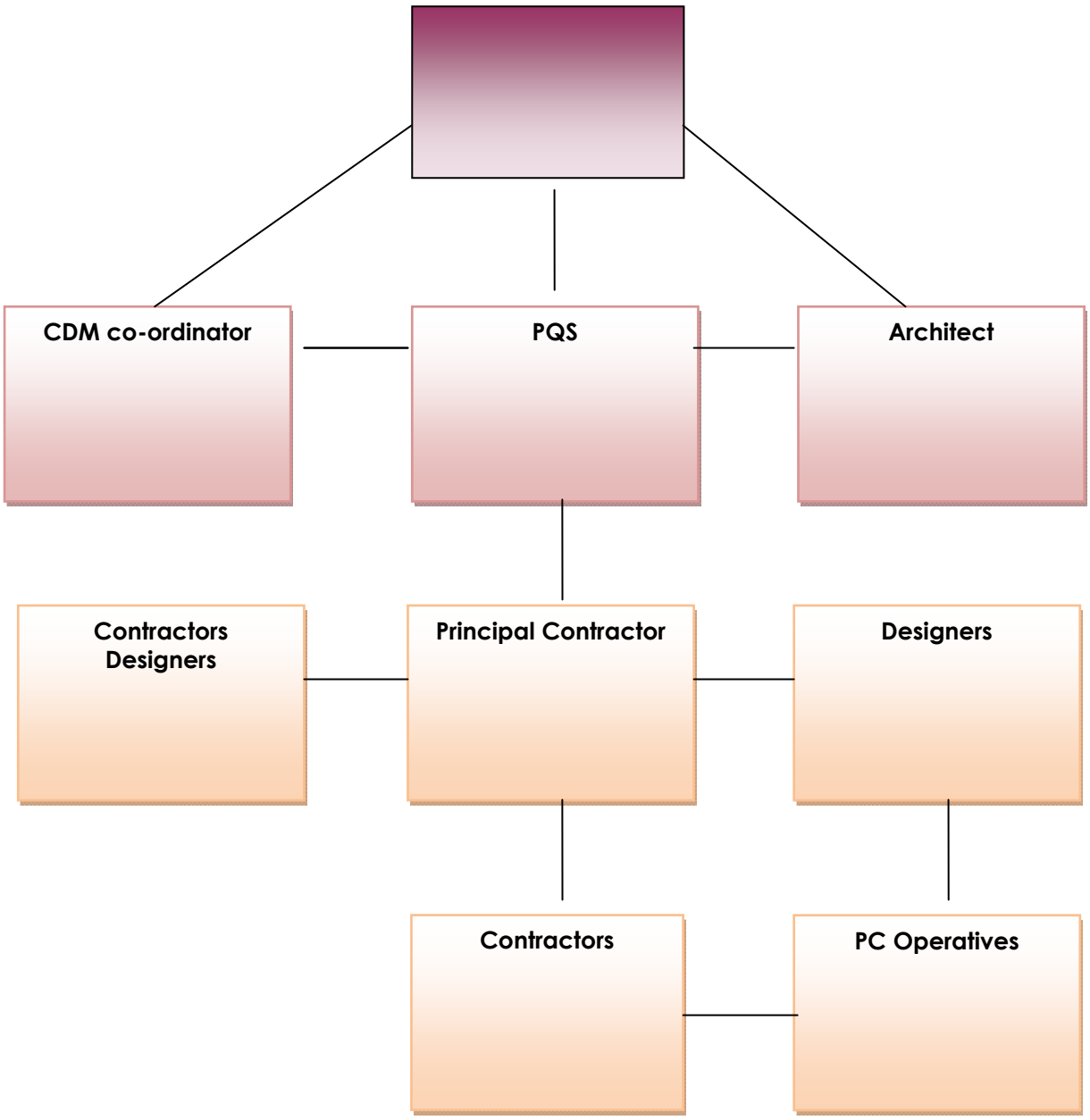
2.3.6 Prior to the commencement of any new phase of work, Eurobuild will inform occupiers of all properties which may be affected by noise, dust or vibration of the nature of the works, proposed hours of work and their expected duration. In particular, a notice will be placed in a conspicuous position informing them of the agreed hours of work (see section 3.2).

2.3.7 In all instances, publicity will include the name and telephone number of the CLR or other nominated person who is able to give further information and deal with any complaints or emergencies that may arise at any time.

2.4 MANAGEMENT OF WORKS

2.4.1 Management Structure and Responsibilities

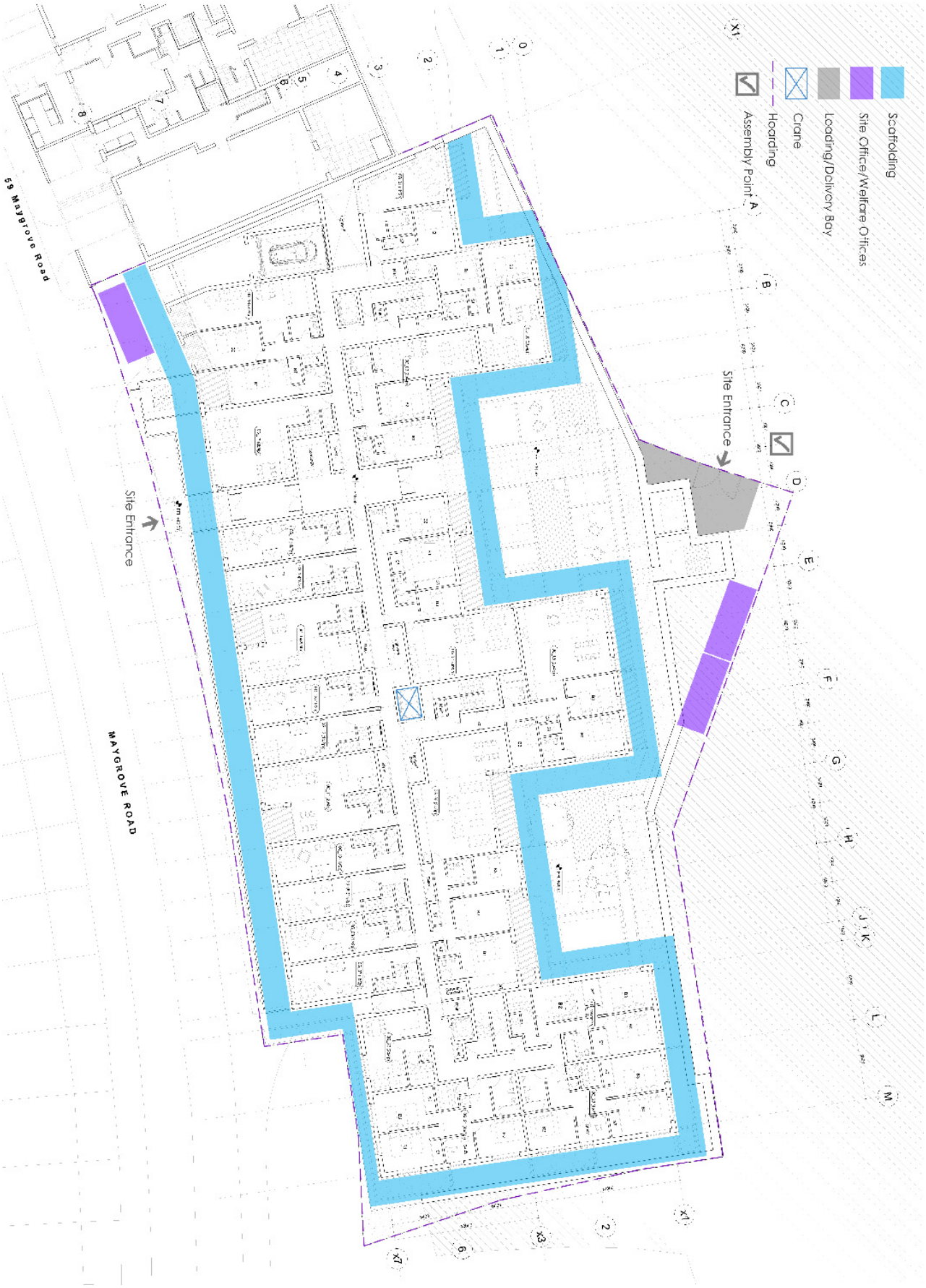
The following organisation chart details the project staff including those with specific safety responsibilities - those making and recording inspections of scaffolds, excavations, machinery, and those responsible for first aid, site fire safety plans etc.
It also indicates the lines of communication between the Client, his Representatives, Principal Contractor and Sub-contractors.



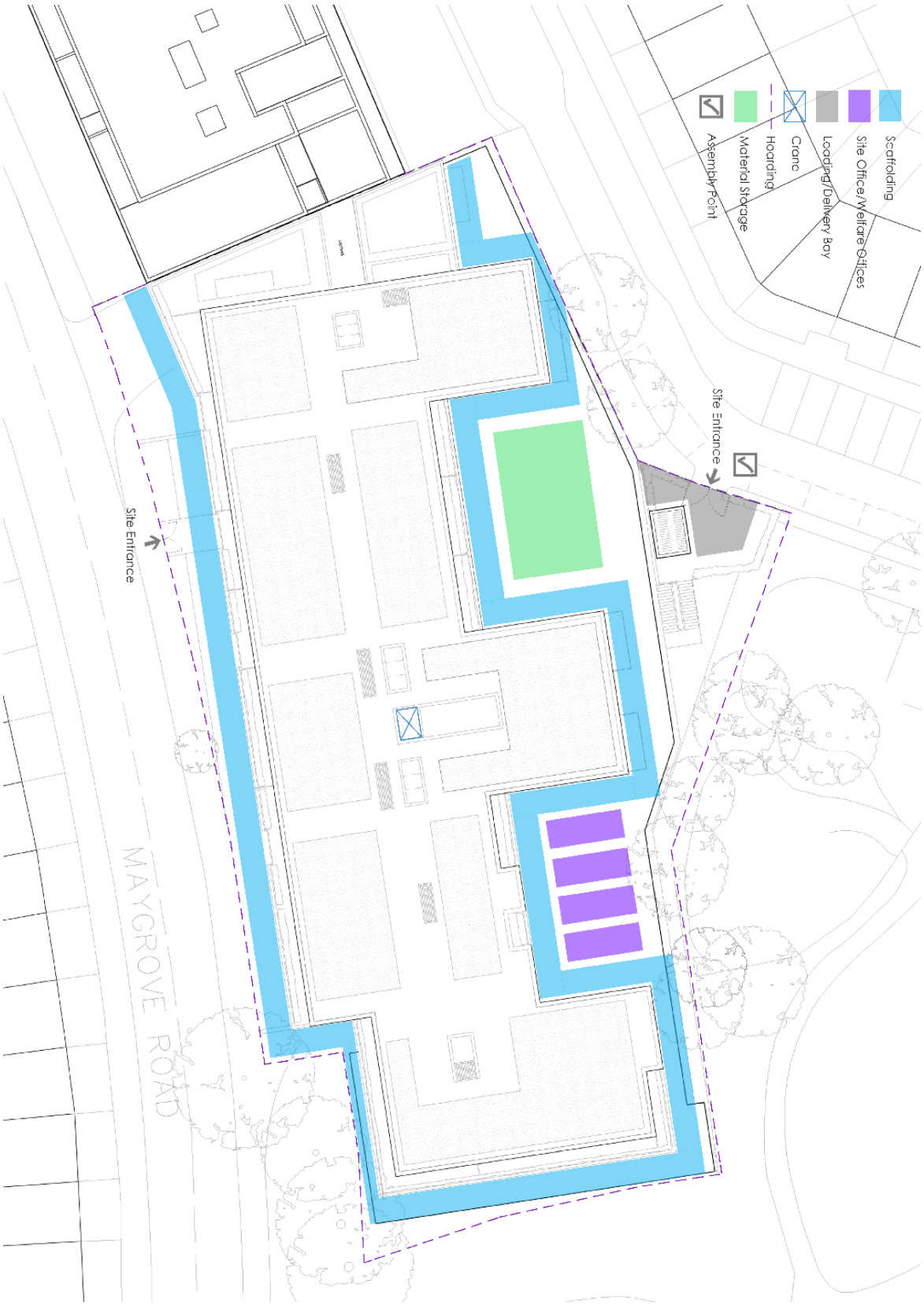
Site Management details: TBC

2.5 SITE LAYOUT DETAILS

PHASE 1



PHASE 2


Assembly Point
Material Storage
Hoarding
Crane
Loading/Delivery Bay
Site Office/Welfare Offices
Scaffolding
Site Entrance
Site Entrance
MAYGROVE ROAD

3 General Site Specific Requirements

3.1 INTRODUCTION

3.1.1 The general management of the site is important in controlling environmental impacts from all construction activities. This section sets out the requirements for all major phases of the development with respect to working hours, general site layout and appearance, and security. The controls related to specific environmental topics are set out in Section 4.

3.2 WORKING HOURS

3.2.1 The works that may or may not be undertaken at certain times will be dependent on the extent to which the works are audible at the site boundary.

3.2.2 Works may be carried out at any time where they would be inaudible at the site boundary. So for example, internal fit-out work1, where there is demonstrably no disturbance, could be undertaken out of office hours.

3.2.3 In normal circumstances, hours of noisy works will be restricted to:

- 08:00 to 18:00 hours on weekdays; and
- 08:00 to 13:00 hours on Saturday.

3.2.4 In particular there will be no work on Sundays or Bank Holidays unless otherwise agreed in writing with LBC. Eurobuild is aware that the start and finish times will be strictly enforced.

3.2.5 Although there is no plan at this time to do so, Eurobuild may at times apply for a dispensation to allow works to occur outside of the hours specified in paragraph 3.2.3 above. Such dispensations will be applied for only where there are good engineering, safety or practical reasons for undertaking the works at these times. The procedure for allowing dispensations is described in section 3.3 below.

3.2.6 No works audible beyond the site boundary will be undertaken outside of the hours specified above, except in cases of emergency where safety is an issue, or as agreed under paragraph 3.2.7 below, or under the dispensation procedure described in Section 3.3.

3.2.7 Delivery and removal of plant may need to be undertaken outside of normal hours due to restrictions imposed by the Highways Authority or the Police, and will only be undertaken after prior notification to the Environmental Health Department of LBC.

3.3 DISPENSATION PROCEDURE

3.3.1 In certain circumstances Eurobuild may apply for consent to carry out works which it considers have to occur at times when work is otherwise not permitted. Such dispensations will be applied for only where there are good engineering, safety or practical reasons.

3.3.2 Once Eurobuild is satisfied that these works need to be carried out, relevant information as set out in paragraph 3.3.3 below will be supplied to LBC. Wherever possible, this information will be provided at least three working days prior to the intended date of carrying out the works and in any case all efforts will be made to provide the information as far in advance of the works as possible.

3.3.3 The information will include:

- full details of the operation in question;
- rationale for requiring an extension to working hours;
- proposed working hours;
- details of plant to be used;
- details of how occupiers of nearby noise sensitive properties would be given adequate notification in advance of the works and the likely duration where practicable; and
- measures, including site supervision arrangements and monitoring, to be adopted to reduce environmental impacts to a minimum in accordance with BPM.

3.3.4 Provided that Eurobuild has been able to justify the case to the LBC, works may be allowed to proceed. LBC will confirm all agreed variations in writing to Eurobuild and may specify hours of work and noise and/or vibration levels which must not be exceeded.

3.3.5 These additional safeguards will be set in accordance with local conditions and circumstances, with the objective of minimising disturbance to occupants of nearby buildings. Such safeguards may include the setting of appropriate noise and/or vibration limits (to be agreed between Eurobuild and LBC), which, in turn, may require monitoring to ensure compliance.

3.3.6 In the case of work required in response to an emergency, the local authority and local workers and residents will be advised as soon as is reasonably practicable that the works are taking place and their likely duration.

3.4 LAYOUT AND SITE APPEARANCE

3.4.1 All phases of the demolition and construction will be carried-out following a general 'good housekeeping' policy, including:

- all work areas will be kept clean and tidy. Rubbish will be removed at frequent intervals. Burning of materials on site will be prohibited;
- hoardings and security fences will be inspected frequently and repaired and repainted as necessary (see below for further details on security);
- reinstatement/good upkeep of street surfaces, even where temporary;
- street cleaning (avoidance of mud on the road); and
- site entrances/gates will be positioned to minimise traffic congestion and noise transmitted from site activities and deliveries.

3.4.2 Storage sites, fixed plant and machinery, equipment and temporary buildings etc, will be located to limit the adverse environmental effects. All reasonable precautions will be taken for the operation of plant and equipment, to avoid nuisance and excessive noise impact on surrounding residents. The environmental effects to be considered are not just the proximity of operations to sensitive properties or ecologically sensitive locations, but also to the risks of pollution.

3.4.3 Lighting of the site boundary and associated areas will be provided to ensure sufficient illumination for safety of the passing public/personnel, and positioned such that it does not intrude unnecessarily on adjacent buildings and land uses, cause distraction or confusion to passing drivers, constitute a road hazard and would be chosen to minimise light pollution effects or encourage crime/anti-social behaviour.

3.4.4 The visual intrusion of construction sites on nearby residents and users of local facilities and amenities will be contained and limited.

3.4.5 For pest control, the following measures will be adopted:

- removal or stopping and sealing of drains and sewers brought into disuse;
- prompt treatment of any pest infestation and arrangements for effective preventative pest control; and
- appropriate storage and regular collection of putrescible waste.

3.4.6 Any instances of pest infestation on the construction sites would be notified to the relevant local authority as soon as practicable.

3.5 SECURITY

3.5.1 Site security is of utmost importance. The following security measures will be adopted from the outset:

- complete site hoardings will be installed around the construction site.

The layout of hoardings will be designed to ensure that no blind corners, recesses, 'dead' zones of footway or loitering places are created;
- the site will be security controlled 24 hours/7 days and week;
- informal surveillance through presence of workers on site;
- links forged with the Police for liaison regarding general traffic issues, co-ordination of construction activities and major public events, personal safety and crime displacement;
- CCTV and lighting (lighting designed not to create shadowing of footpaths and roads by the site hoarding;
- lighting levels in all public street areas will be a minimum of 30 lux;
- where buildings are unused, they will effectively be secured and subject to the same requirements for security patrols as construction sites.

3.6 HEALTH AND SAFETY

3.6.1 The safety of construction workers will be dealt with in Eurobuild's Health and Safety Plan, which will set out how all health and safety risks are identified and managed in accordance with current best practice and legal requirements. Eurobuild will also be responsible for ensuring the safety of the general public and any visitors to the site.

4 Topic Specific Requirements

4.1 NOISE AND VIBRATION

OBJECTIVES

4.1.1 This section relates to the control and management of noise and vibration, which is required in order that residential properties and other sensitive receptors are protected from excessive or unnecessary noise and vibration.

RELEVANT LEGISLATION AND GUIDELINES

- *Control of Pollution Act* 1974
- *Environmental Protection Act* 1990
- *The Noise and Statutory Nuisance Act* 1993
- BS 5228:2009 *Code of practice for noise and vibration control on construction and open sites* Part 1 *Noise* and Part 2 *Vibration*
- BS 6472-1:2008 *Guide to the evaluation of human exposure to vibration in buildings* Part 1: *Vibration sources other than blasting*
- BS 7385 *Evaluation and measurement for vibration in buildings*, Part 2 (1993)
- London Councils and the Greater London Authority, *The control of dust and emissions from construction and demolition* Best Practice Guidance (November 2006)

DISCUSSION

4.1.2 It is inevitable with any major development that there will be some disturbance caused to those living and working nearby during the site clearance and construction phase. However, any such disturbance will be localised and temporary in nature.

4.1.3 The assessment undertaken and reported in the ES found that the temporary noise and vibration impacts during the construction works could be significant during the site preparation phase, and to a lesser extent during the foundation works, although any such disturbance is likely to be localised and temporary in nature.

4.1.4 Consequently, the ES concluded that it will be necessary to consider the measures available to reduce the levels of noise that will arise during the works (see below).

MITIGATION MEASURES

4.1.5 Mitigation measures will be implemented at all times to minimise noise and vibration generated by activities and disruption to neighbouring occupiers. The adoption of BPM is usually the most effective way of controlling noise from construction sites and will be enforced rigorously. In order to demonstrate the adoption of BPM to control noise and vibration emissions from the site, the following measures will be imposed:

- Eurobuild and its Sub-Contractors will bring to site and employ on the works environmentally acceptable plant and equipment compatible with the safe and efficient execution of the works. The noise emitted by any plant item will not exceed the limits quoted in either the relevant EC Directive or UK Statutory Instrument and will be no greater than the relevant values quoted in the current version of BS 5228. All items of plant operating on the site in intermittent use will be shut down in the intervening periods between use;
- general induction training for Site operatives and specific training for staff having responsibility for particular aspects of controlling noise from the site;
- any compressors brought onto site will be silenced or sound reduced models fitted with acoustic enclosures;
- all pneumatic tools will be fitted with silencers or mufflers;
- the excavation and demolition of existing structures will, wherever possible, be undertaken without the use of pneumatic breakers;
- wherever possible, the use of hydraulic attachments or other means of crushing concrete and hard materials will be used in preference to pneumatic breakers. Where the use of impact hammers is necessary, their attachment to larger and heavier excavators often can reduce the level of vibration;
- care will be taken when erecting or striking scaffolds to avoid impact noise from banging steel. All operatives undertaking such activities will be instructed on the importance of handling scaffolding to reduce noise to a minimum;
- deliveries will be programmed to arrive during daytime hours only. Care will be taken when unloading vehicles to minimise noise. Delivery vehicles will be routed so as to minimise disturbance to local residents. Delivery vehicles will be prohibited from waiting on the highway or within the site with their engines running;
- no radios or music will be played on the site; and
- all plant items will be properly maintained and operated according to the manufacturers' recommendations in such a manner as to avoid causing excessive noise. All plant will be sited so that the noise impact at nearby noise sensitive properties is minimised. Local hoarding, screens or barriers will be erected as necessary to shield particularly noisy activities.

4.1.6 Issues concerning noise from construction works can often be avoided by taking a considerate and neighbourly approach to relations with the local residents and workers and to this end neighbourhood liaison will be a vital aspect of Eurobuild's duties.

4.1.7 Works that are audible at the site boundary will only be undertaken during the core working hours identified in paragraph 3.2.2; although in certain circumstances Eurobuild may apply for consent to carry out work which it considers have to occur at times when work is otherwise not permitted. Such dispensations (see section 3.3) will be applied for only where there are good engineering, safety or practical reasons.

MANAGEMENT PROTOCOL

4.1.8 Where valid complaints about noise and vibration are received by the CLR, either directly or through the Local Authority, the following protocol will be followed:

- the activity or activities which are believed to be the cause of the complaint will be identified by Eurobuild;
- investigations will be made to determine whether the activities could easily be changed or other simple actions taken to reduce noise or vibration levels;
- if simple and effective ameliorative measures are not identified, consideration will be given to the implementation of alternative techniques and/or additional mitigation measures;
- neighbourhood liaison will be undertaken to a degree which is commensurate to the noise/vibration levels generated (or likely to be generated) and the duration of activities which have been identified as causing the disturbance; and
- details of the complaint and the adopted mitigation shall be passed to the CIG for comment as soon as is practicable. The mitigation measures shall be implemented promptly, irrespective of whether there has been an opportunity to contact the CIG.

4.1.9 Depending on the specific circumstances (e.g. the likely significance of any disturbance in terms of both magnitude and duration of impact), LBC may require Eurobuild to undertake noise and/or vibration monitoring to facilitate the control of impacts. In this circumstance the action levels identified in paragraph 4.1.10 and 4.1.11 would apply.

4.1.10 A noise action in the range 70 dB to 75 dB will be applied level ($L_{Aeq,T}$ over the core working day from construction activities alone), in line with the assessment criteria adopted in the ES. The action level(s) apply at 1m from the external façade of the affected building, although if direct measurement is not possible for any reason (e.g. difficulties with access), the measurements will be made at an alternative location and the results extrapolated using standard noise propagation techniques to the receptor(s) of interest.

4.1.11 A vibration action level of 1.12 mm/s peak particle velocity will be applied. This action level relates to human comfort and is in line with assessment criteria adopted in the ES (this level equates to 'possible' adverse comment). The threshold at which damage to buildings may occur is generally taken to be 12.5 mm/s peak particle velocity, which is also in line with the assessment criteria adopted in the ES. Vibration will be measured in three orthogonal axes (one of which will be vertical) and the maximum component compared against the action level(s) which apply at the base of the affected building on the side of the building facing the source of vibration. Where a measurement on the building structure is not feasible, the measurements will be obtained on the ground outside the building. If it is not possible to obtain a measurement in close proximity to the affected building, an alternative location will be used and the results extrapolated using standard vibration propagation techniques to the receptor(s) of interest.

4.1.12 The precise location and duration of any noise and/or vibration monitoring will be agreed with LBC and will be dependent on the specific circumstances.

4.1.13 The noise and/or vibration monitoring results will be recorded, compared with the specified action levels and then submitted to LBC for discussion at the CIG meetings.

4.1.14 LBC will be consulted before any noise/vibration compliance monitoring is ceased.

4.2 AIR QUALITY

OBJECTIVES

4.2.1 This procedure applies to the control and management of emissions to air, which is required to minimise the pollutants (particularly fine particles (PM10) and nitrogen dioxide) and ensure that best practicable means are employed.

RELEVANT LEGISLATION AND GUIDELINES

- *Environmental Protection Act* 1990
- *Environment Act* 1995
- *Air Quality (England) Regulations* 2000 and *Air Quality (England) (Amendment) Regulations* 2002
- London Councils and the Greater London Authority, *The control of dust and emissions from construction and demolition* Best Practice Guidance (November 2006)
- London Councils *Air Quality and Planning Guidance* Revised version (January 2007)
- Quality of Urban Air Review Group (QUARG) *Airborne Particulate Matter in the United Kingdom – Third Report of the Quality of Urban Air Review Group.* Prepared for the Department of the Environment

(May 1996).
- Arup Environmental and Ove Arup and Partners: *The Environmental Effects of Dust from Surface Mineral Workings Volume 2.* Prepared for Department of the Environment Minerals Division (December 1995).

DISCUSSION

4.2.2 The emission of dust causes concerns both as a nuisance and for its health effects. Larger particles associated with construction return to the ground in a relatively short distance, but may cause nuisance when deposited on nearby surfaces such as cars and windows. Smaller, respirable particles within the PM10 size fraction usually remain suspended for longer and can be transported further from the source, even outside the site boundary, and may become a health hazard to people in the neighbourhood.

4.2.3 The potential for dust created during construction activities to migrate to sensitive receptors beyond the site boundary and the likelihood of soiling to cause a noticeable effect is dependent on a variety of factors including:

- the source of the dust;
- distance from the point of generation to the sensitive receptor;
- recent and prevailing weather conditions; and
- the effectiveness of dust control measures.

4.2.4 Construction traffic associated with the development will contribute to existing traffic levels on the surrounding road network. The greatest potential for adverse impacts in air quality will be in the areas immediately adjacent to the principal means of site access for construction traffic.

4.2.5 As construction traffic will have to pass along roads with nearby residential properties, air quality impacts of moderate adverse significance were identified in the ES, although any such impacts are considered to be localised and temporary in nature.

MITIGATION MEASURES

4.2.7 Dust nuisance occurs more readily during prolonged dry weather and especially in strong winds. It is usually accepted that the most effective mitigation technique is to prevent dust from becoming airborne in the first place, since it is difficult to suppress after this has happened.

4.2.8 The following mitigation measures will be implemented as appropriate, to minimise dust and other emissions from site activities and disruption to neighbouring occupiers:

- the amount of stockpiled material on site will be minimised at all times;
- stockpiles will be planned and sited to minimise the potential for dust generation;
- the handling of spoil will be kept to a minimum and when materials are deposited onto a stockpile it will be from a minimum height;
- the surface areas of stockpiles will be minimised (subject to health and safety and visual constraints regarding slope gradients and visual intrusion) to reduce area of surfaces exposed to wind pick-up;
- completed earthworks will be covered or vegetated as soon as is practicable;
- vehicles carrying loose aggregate and workings will be sheeted at all times;
- damping down on site will occur regularly and particularly during periods of dry weather;
- wheel-washers will be used, when necessary, during the muck-away period;
- local highways will be regularly inspected and, if necessary, cleaned using a road sweeper (see paragraph 3.4.1);
- the site hoarding will be maintained throughout the works (see paragraph 3.4.1)
- construction techniques which generate fumes and dust will not be used if an alternative method can be used;
- appropriately designed vehicles will be used for materials handling;
- dust-suppressed tools will be used for all operations;
- all construction plant and equipment will be maintained in good working order and not left running when not in use;
- on-site movements will be restricted to well within the site and not near the perimeter, if possible; and
- no unauthorised burning of any material will be allowed anywhere on site.

4.2.9 To minimise adverse impacts from construction traffic, vehicles will not be routed to pass along sensitive roads (residential roads, congested roads, unsuitable junctions etc.) wherever possible. Vehicles will be kept clean (through use of wheelwashers etc.) and sheeted when on public highways. Large-scale vehicle movements will be timed to avoid peak hours on the local road network.

4.2.10 Construction workers and contractors will also work towards the best practice measures outlined in LBC's Code of Practice (February 2008) and the GLA's Best Practice Guidance (November 2006), where appropriate.

4.2.11 Issues concerning air quality and dust from construction works can often be avoided by taking a considerate and neighbourly approach to relations with the local residents and workers, and to this end neighbourhood liaison will be a vital aspect of Eurobuild's duties.

4.2.12 Consultation with LBC confirmed that dust deposition monitoring would not be required during the construction phase. However, dust deposition monitoring would be required if LBC receive nuisance complaints relating to dust generated by activities taking place on the proposed development site.

4.2.13 Should nuisance complaints arise, the appropriate monitoring methods and locations will be agreed with the Environmental Health Officer (EHO) at LBC.

MANAGEMENT PROTOCOL

4.2.14 If justified nuisance complaints are received by LBC, the following protocol will be implemented:

- the activity or activities which resulted in the high dust emissions will be identified by Eurobuild;
- investigations will be made to determine whether the activities could be easily changed or other simple measures taken to substantially reduce dust levels;
- if simple and effective ameliorative measures are not identified, consideration will be given to the implementation of alternative techniques and/or additional mitigation measures;
- neighbourhood liaison will be undertaken to a degree which is commensurate to the levels of dust generated (or likely to be generated) and the duration of activities which have been identified as causing the action level to be exceeded; and
- details of any monitoring results and adopted mitigation shall be passed to the CIG for comment as soon as is practicable. The mitigation measures will be implemented promptly, irrespective of whether there has been an opportunity to contact the CIG.

REPORTING OF RESULTS

4.2.15 If dust deposition monitoring is required at any stage, the results will be recorded and submitted to LBC for discussion at the CIG meetings.

4.3 CONTAMINATED LAND

OBJECTIVES

4.3.1 This procedure applies to the control and management of geo-environmental contaminants encountered in the ground during the works, to prevent, contain or limit (as far as is reasonably practicable) any adverse impacts.

RELEVANT LEGISLATION AND GUIDELINES

- *Environmental Protection Act* 1990
- *Environment Act* 1995
- *Contaminated Land Regulations* 2000
- *Control of Asbestos Regulations 2006*
- *Control of Substances Hazardous to Health Regulations 2002*
- *The Health & Safety at Work Act 1974*
- *The Construction Design Management Regulations 2005*
- *Water Resources Act 1991*
- *Water Act 2003*
- *European Union (EU) Water Framework Directive (Directive 2000/60/EC)*

DISCUSSION

4.3.2 Refer to Soil Consultants Ltd Site Investigation Report (9118/JRCB/TSR), 3rd May 2012 (Revision 1)