

CS CONSULTING

GROUP

Construction and Demolition Waste Management Plan

Proposed Mixed-Use Development

Belgard Square East, Belgard Road and Blessington Road, Dublin 24

Client: Ravensbrook Limited

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CONSTRUCTION AND DEMOLITION WASTE MANAGEMENT PLAN

PROPOSED MIXED-USE DEVELOPMENT, BELGARD SQUARE EAST, BELGARD ROAD AND BLESSINGTON ROAD, DUBLIN 24

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1.0 INTRODUCTION

Cronin & Sutton Consulting Engineers (CS Consulting) have been commissioned by Ravensbrook Ltd. to prepare a Construction and Demolition Waste Management Plan (C&DWMP) in support of a proposed mixed-use development at Belgard Square East, Belgard Road and Blessington Road, Dublin 24.

The purpose of this C&DWMP is to ensure that waste generated during the demolition and construction phases of the development shall be managed and disposed of in a way that ensures the provisions of the Waste Management Acts 1996 to 2013 and the Eastern-Midlands Region (EMR) Waste Management Plan 2015-2021 are complied with. It shall also ensure that optimum levels of waste prevention, preparing for reuse, recycling, recovery, and disposal are achieved.



2.0 GOVERNMENTAL POLICY

2.1 National Level

The publication, "Changing Our Ways", which identifies objectives for the prevention, minimization, reuse, recycling, recovery and disposal of waste in Ireland, was issued by the Government in September 1998. The target for Construction and Demolition waste in this Strategy was to recycle at least 50% of C&D waste by 2003, with an increase to at least 85% by 2013.

The Forum for the Construction Industry, which represents the waste sector of the industry, released a report titled "Recycling of Construction and Demolition Waste" concerning the development and implementation of a voluntary construction industry programme to meet the governments objectives for the recovery of construction and demolition waste. The National Construction and Demolition Waste Council (NCDWC) was launched in June 2002 and subsequently produced "Guidelines for the Preparation of Waste Management Plans for Construction and Demolition Projects" in July 2006. There are thresholds set out in the Guidelines to determine whether a C&D WMP is required. The development requires a C&D WMP for new residential developments of 10 houses or more and new developments, including institutional, educational, health and other public facilities, with an aggregate floor area exceeding 1,250m2.

The Guidelines outline the issues that need to be addressed at the pre-planning stage of a development all the way through to its completion. The guidelines include the following:

- predicted demolition & construction wastes and procedures to prevent,
 minimise, recycle and reuse wastes;
- waste disposal/recycling of C&D wastes at the site;



list of sequence of demolition operations to be followed;

2.1.1 Roles including Training and Responsibilities for C&D Waste

The C&D Waste Manager(s) assigned the responsibility for waste minimization, reuse and recycling during the various stages of the Project has the overall task of implementing the objectives of the Project C&D Waste Management Plan. The on-site role shall include the important activities of conducting waste checks/audits and adopting demolition methodology that is designed to facilitate maximum reuse and/or recycling of waste. The contractor shall have primary responsibility to ensure that the Plan is adhered to, with the added bonus that value for money shall be obtained from improved waste management practices on site.

The Plan should make provision to ensure that the C&D Waste Manager is appropriately trained and is assigned the authority to require measures to be taken to fulfil the Plan's objectives and targets for each stage of the project.

The role of the C&D Waste Manager should ensure that the opportunity is taken to educate all colleagues (at the planning and design phases of the Project), site staff, including external contractors and suppliers, about alternatives to conventional construction waste disposal. The Plan should make provision for the C&D Waste Manager and site crew to be trained in materials management thereby being in a position to:

- distinguish reusable materials from materials suitable for recycling;
- ensure maximum segregation at source;
- co-operate with site manager on the best locations for stockpiling reusable materials;



- o separate materials for recovery; and
- o identify and liaise with operators of recovery outlets.

2.1.2 Record Keeping

The Plan should provide for systems that shall ensure that details of all arisings, movement and treatment of C&D waste are recorded. Special consideration should be given to the provision of a computerised monitoring tool, which can provide for convenient recording of information in a useful format and ultimately contribute to waste reduction through benchmarking of waste arisings.

Essentially such a system enables the contractor to measure and record the quantity of waste being generated, thereby allowing wastage to be more readily identified. It can highlight the most significant areas where waste products arise and the percentage of new material that is wasted. It identifies successes or failures as measured against performance targets and enables realistic Action Plans for waste reduction to be drawn up. The system could also be used to compare waste quantities arising from similar development projects.

All materials being transferred from the site, whether for recycling or disposal, should also be subject to a documented tracking system which can be verified and validated.

2.1.3 Waste Audit

A Waste Audit represents a systematic study of the waste management practices applied in the Project. The purpose of waste auditing is to highlight the problems that waste can cause and the benefits of prevention and minimisation. It is vital therefore to determine the quantity and types of waste which are being produced. When materials arrive on site, they are generally recorded but often there is no proper recording



system for the assignment of materials to specific uses within the works. Where this occurs, the quantity of waste being produced at a particular location is unknown and it is difficult to calculate/estimate the overall waste levels arising on site. Waste auditing is required to obtain this information and also, if required, to allow the contractor to monitor the quantity and type of waste produced by different sub-contractors.

In 2002, the Construction Industry Federation (CIF) issued "Construction and Demolition Waste Management – a handbook for Contractors and Site Managers".

Annually the Environmental Protection Agency (EPA) issue a "National Waste (Database) Reports" detailing C&D waste generation and the level of recycling, recovery and disposal of this material, domestic and municipal waste rates, etc.

2.2 Regional Level

A Waste Management Plan for the Dublin Region (comprising Dublin City Council, Fingal County Council, South Dublin County Council & Dun Laoghaire-Rathdown County Council) was in place from 2005-2015, with periodic revisions. This was superseded by the Eastern-Midlands Region (EMR) Waste Management Plan 2015-2021, which was launched in May 2015.

The Eastern-Midlands Region comprises Dublin City Council, Dún Laoghaire-Rathdown, Fingal, South Dublin, Kildare, Louth, Laois, Longford, Meath, Offaly, Westmeath and Wicklow County Councils. The Plan provides a framework for the prevention and management of waste in a sustainable manner in these 12 local authority areas.

The three overall performance targets of the Eastern-Midlands Region Waste Management Plan are as follows:



- 1% reduction per annum in the quantity of household waste generated per capita over the period of the plan.
- Achieve a recycling rate of 50% of managed municipal waste by 2020.
- Reduce to 0% the direct disposal of unprocessed municipal waste to landfill (from 2016 onwards) in favour of higher value pre-treatment processes and indigenous recovery practices.

The Plan's implementation is led by the Eastern-Midlands Regional Waste Office based in Dublin City Council.

Under the Waste Framework Directive (2008/98/EC). Member States must achieve 70 per cent of material recovery of non-hazardous, non-soil and stone C&D waste by 2020. Ireland achieved 84 percent material recovery of such waste in 2019, and therefore surpassed the 2020 target. This represents and improvement on the recovery rate of 71 per cent achieved in 2016 and 77 per cent achieved in 2018.

One of the primary objectives of the Plan is to achieve more sustainable waste management practices in the C&D sector. This requires the following actions:

- The development company must employ best practice at the design, planning and construction stage to ensure waste prevention and recycling opportunities are identified and implemented.
- Waste Collectors are required to introduce source-separation of recyclables and introduce graduated charges to incentivise better site practices.

Local Authorities shall ensure the voluntary industry code is applied to development control, to regulate the collection and treatment of waste to meet the Plan objectives and shall also work to develop markets for recycled materials.



2.3 Local Authorities and its relevance to Waste Management

2.3.1 South Dublin County Council Development Plan 2016 -2022

- Waste Management is integral to sustainable development, protecting public health and maintaining a high-quality environment. The role of local authorities in Waste Management has evolved and the principal areas of activity are now regulatory, educational and enforcement related.
- The Planning and Development Act 2000 (as amended) states that a development plan shall include objectives for waste recovery and disposal facilities. By virtue of Section 22(10A) of the Waste Management Acts 1996-2008, the objectives of the relevant Waste Management Plan are deemed to be included in the Development Plan.
- Waste Management policy is predicated on the EU Waste Hierarchy of prevention, preparing for re-use, recycling, energy recovery and sustainable disposal. Policies and objectives in relation to waste management in South Dublin are reflective of overarching EU, National and Regional policy, and legislation.
- The Eastern–Midlands Region Waste Management Plan, 2015-2021 provides the framework for waste management in the Region and sets out a range of policies and actions to meet specified mandatory and performance-based targets. The Plan seeks to assist and support resource efficiency and waste prevention initiatives. A key plan target is to achieve a 1% reduction per annum in the quantity of household waste generated per capita over the period of the Plan. In tandem, the Plan identifies measures to develop a circular economy whereby waste management initiatives are no longer confined to treating and disposing of



waste, instead supporting initiatives that value waste as a resource or potential raw material.

2.3.2 <u>Draft South Dublin County Council Development Plan 2022-2028</u>

- Waste Management is integral to sustainable development and is a key element of the circular economy, protecting public health and maintaining a high-quality environment.
- The Planning and Development Act (2000) (as amended) states that a development plan shall include objectives for waste recovery and disposal facilities.
- By virtue of Section 22(10A) of the Waste Management Acts (1996-2008), the objectives of the relevant Waste Management Plan are deemed to be included in the Development Plan.
- National and Regional policy on waste management is set out in a number of documents. These include the NPF, the RSES, the Regional Waste Management Plan, the National Climate Action Plan (2019) and the Government's policy document A Waste Action Plan for a Circular Economy 2020 –2025. These policy documents require a transition towards the creation of a circular economy, requiring the long-term use of materials, promoting recycling and re-use, and minimising waste at the end of the cycle. All of these documents and the policies and objectives which flow from them are consistent with the EU Waste Hierarchy approach to waste which endorses prevention, preparing for reuse, recycling, energy recovery and sustainable disposal.

The Government's Waste Action Plan for a Circular Economy 2020 – 2025 outlines the new focus which goes beyond simple management of waste and moves towards how we look at resources more broadly, thereby



capturing the maximum value of all materials. The focus is on the circular economy approach.

The Eastern Midlands Region Waste Management Plan 2015-2021 (EMRWMP) provides the framework for waste management in South Dublin and the Region. It sets out a strategic vision with a focus on viewing waste as a valuable resource. It seeks to make better use of current resources, reduce the leakage of material including energy, as the country transitions from a linear to a circular economy.

To require the appropriate provision for the sustainable management of waste within all developments, ensuring it is suitably designed into the development, including the provision of facilities for the storage, separation and collection of such waste.

To adhere to the recommendations of the National Hazardous Waste Management Plan 2014-2020 and any subsequent plan, and to cooperate with other agencies including the EPA in the planning, organisation and supervision of the disposal of hazardous waste streams, including hazardous waste identified during construction and demolition projects.

2.3.3 <u>Tallaght Town Centre Local Area Plan 2020</u>

Consideration should be given, where possible, to reusing and recycling materials to promote the circular economy and reduce construction and demolition waste.



2.4 Legislative Requirements

One of the guiding principles of European waste legislation¹, which has in turn been incorporated into the Waste Management Act 1996 (as amended by the Waste Management (Amendment) Act 2001) is the principle of 'Duty of Care'. This implies that the waste producer is responsible for waste from the time it is generated through to its legal disposal (including its method of disposal). Following on from this is the concept of 'Polluter Pays', whereby the waste producer is liable to be prosecuted for pollution incidents, which may arise from the incorrect management of waste produced, including the actions of any contractors engaged (e.g., for collection and transport of waste).

Waste contractors are typically engaged to transport waste off-site. Each contractor must comply with the provisions of the Waste Management Act 1996 and associated Regulations. This includes the requirement that a contactor handle, transport and dispose of waste in a manner that ensures that no adverse environmental impacts occur as a result of any of these activities. A collection permit to transport waste must be held by the relevant contractor, which is issued by the National Waste Collection Permit Office (NWCPO).

Waste receiving facilities must also be appropriately permitted or licensed. Operators of such facilities cannot receive any waste unless in possession of a waste permit granted by the local authority under the Waste Management (Facility Permit & Registration) Regulations 2007 or a waste license granted by the EPA. The permit/license held shall specify the type and quantity of waste able to be received, stored, sorted, recycled and/or disposed of at the specified site.

¹ https://ec.europa.eu/environment/archives/enlarg/handbook/waste.pdf



Should the initial assessment of the site indicate that material would have to be removed from site then the material shall be classified in accordance with legislative requirements to demine if the material is classified as hazardous or non-hazardous. All material deemed to be non-hazardous shall then be assessed under Waste Acceptance Criteria requirements for disposal to a licence landfill facility in accordance with 2002 European Landfill Directive [2003/33/EC]. Only material deemed through independent laboratory analysis to be either inert or non-hazardous can be disposed of at landfill facilities in the Republic of Ireland at present, hazardous material having to be taken abroad for treatment. The EPA released hazardous waste statistics for Ireland on the 17 December 2021. These statistics state that 59% of Ireland's hazardous waste was exported for treatment in 2020.

The assessment and removal of such material shall require a suitably qualified environmental specialist to be employed to develop a soil management and removal plan and ensure full compliance with statutory requirements such as Circular Economy, Waste Management (Amendment) and Minerals Development (Amendment) Bill 2022 which is currently before the Dáil and shall amend the Waste Management Act 1996 and the Litter Pollution Act 1997.



3.0 SITE LOCATION

The proposed development site is located on the site at Belgard Square East, Belgard Road and Blessington Road Tallaght, Dublin 24. The site is located in the administrative jurisdiction of South Dublin County Council (SDCC) and has a total area of circa 1.26ha.



Figure 1 – Site Location

(map data: EPA, NTA, OSM Contributors)

The location of the proposed development site is shown in Figure 1 above; the indicative extents of the development site, as well as relevant elements of the surrounding road network, are shown in more detail in Figure 2.

The development site is bound by Belgard Square East to the west, Blessington Road to the north, Belgard Road to the east and existing commercial developments to the south.



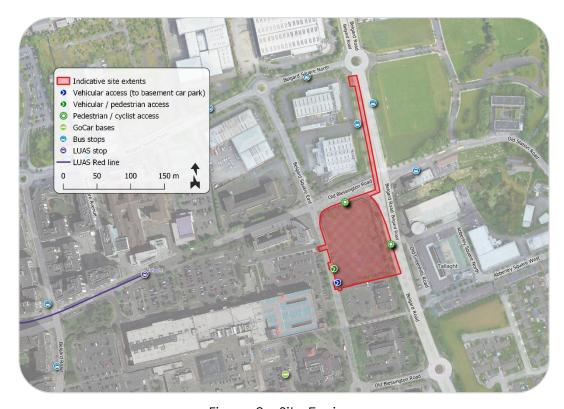


Figure 2 – Site Environs

(map data: EPA, NTA, OSM Contributors)

3.1 Existing Land Use

The site is currently a brownfield site consisting primarily of hardstanding surfacing. No existing buildings are present on site. The site does not currently generate any vehicular traffic.



4.0 PROJECT DESCRIPTION

The proposed development will consist of the demolition of existing boundary wall and construction of:

c. 2,289 sqm of retail/commercial floor space across 10 no. units including retail, restaurant/café and Class 2 financial/professional services and office use, and a crèche (257sqm) at ground and first floor levels;

310 no. build to rent residential apartments including 99 no. one bedroom units, 203 no. 2 bedroom units and 8 no. three bedroom units within a part 6 to part 12 no. storey development across 3 blocks over partial basement;

c. 2,223 sqm of communal external amenity space provided in the form of a ground floor garden and external terraces at fifth, sixth, seventh and eighth floor levels; c. 1,026 sqm of public open space provided in the form of a central courtyard with landscaped areas at site perimeters;

c. 1,785 sqm of resident support facilities and services and amenities provided at basement, ground and first floor levels;

Vehicular access to the basement development from a new access point at Belgard Square East;

A new tertiary route will be provided in the southern part of the site linking Belgard Square East and Belgard Road;

Provision of 130 no. car parking spaces (including 8 no. club car spaces and 6 no. disabled access spaces) at basement level in addition to 5 no. set down spaces (4 no. serving creche) and 1 no. disabled access space at ground level, layby on Belgard Square East, 6 no. motorcycle spaces and a total of 763 no. bicycle parking spaces;



Provision of 4 no. Ø0.3m microwave link dishes to be mounted on 2 no. steel support pole affixed to lift shaft overrun, all enclosed in radio friendly GRP shrouds, together with associated equipment at roof level at Block B;

Provision of 3 no. ESB substations with switch rooms and plant rooms at basement level, hard and soft landscaped areas, bin and bicycle stores, public lighting, attenuation, green roof, plant at roof level, service connections and all ancillary site development works.



5.0 WASTE MANAGEMENT ORGANISATION

5.1 Responsibility for Construction Phase Waste Management

A suitably competent and experienced representative of either the client or the lead contractor shall be nominated as Construction & Demolition (C&D) Waste Manager for the project. The function of the C&D Waste Manager is to effectively communicate the aims and objectives of the Waste Management programme for the project to all relevant parties and contractors involved in the project, for the duration of demolition and construction works on site.

The C&D Waste Manager shall be assisted in this role by the nominated external Safety Consultant. Site Inspections shall be carried out on a weekly basis and shall incorporate inspection and monitoring of the requirements of the Waste Management Plan.



6.0 DEMOLITION WASTE GENERATED BY THE PROPOSED DEVELOPMENT

Demolition process for any site, building, or structure shall include 4 major steps, and they are;

- Surveying;
- Removal of hazardous materials;
- Preparation of plan;
- Safety measures.

Demolition waste shall be generated during development. The management of spoil generated by demolition of the existing boundary wall and car park and excavation on site is described within the following section of this document.

The typical type of waste can be summarised as:

- Soil and stones:
- Concrete (including blocks);
- Timber;
- Glass;
- Mixed Metals:
- Gypsum based materials;
- Tiles / Ceramics;
- Insulation Materials (asbestos free);
- Waste electrical and electronic equipment;
- Fixtures and fittings etc



6.1 Estimated Waste Arisings

The EPA issued the European Waste Catalogue in January 2002 and this system was used to classify all wastes and hazardous wastes into a consistent waste classification system across the EU. The EWC for typical waste materials to be expected to be generated during the demolition of the existing buildings are as follows:

Table 1 - European Wa	ste Cataloaue
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Table 1 European Wasie Caralogue				
Waste Material	EWC Code			
Non-Hazardous				
Concrete, bricks, tiles, ceramics	17 01			
Wood, glass and plastic	17 02			
Bituminous mixtures, coal tar and tarred products	17 03			
Metals (including their alloys)	17 04			
Soil, stones and dredged spoil	17 05			
Gypsum-based construction material	17 08			
Hazardous				
Electrical and Electronic Components	16 02			
Batteries	16 06			
Wood Preservatives	03 02			
Liquid Fuels	13 07			
Soil and stones containing dangerous substances	17 05 03			
Insulation materials containing asbestos	17 06 01			
Other insulation materials consisting of or containing dangerous substances	17 06 03			
Construction materials containing asbestos	17 06 05			
Construction and demolition waste containing mercury	17 09 01			
Construction and demolition waste containing PCBs	17 09 02			
Other construction and demolition wastes containing dangerous substances	17 09 03			

6.2 Demolition Waste Estimates

The BRE Waste Benchmark Data as of June 2012 provides guidance on the demolition waste estimates based on the gross internal floor area.



Project Type	Number of projects data relates to	Average Tonnes/100m ²	Number of projects data relates to	Average Tonnes/£100K
Residential	256	16.8	260	12.3
Public Buildings	23	22.4	24	11.2
Leisure	21	21.6	20	10.5
Industrial Buildings	23	12.6	24	5.7
Healthcare	22	12.0	22	9.9
Education	60	23.3	60	11.8
Commercial Other	4	7.0	2	3.6
Commercial Offices	14	23.8	11	6.3
Commercial Retail	48	27.5	47	11.6
Total number of projects	471		470	

Table 2: BRE Waste Benchmark

However, there are no existing buildings on the subject development lands. As such, the demolition waste has been estimated based on the specific site conditions present on the subject lands. The existing carpark area in total is 2900m². Assuming tarmac/asphalt depth of 200mm and a stone undercourse depth of 150mm the predicted demolition waste generation is as follows;

- 580m³ of tarmac
- 435m³ of stone/gravel

6.3 Excavation Waste Estimates

As part of this planning application, there shall be a total of 29,000m³ of excavated material on site. These materials shall be removed from the site and transported off-site. Any reusable material (timber etc.,) shall be reused for construction works.



6.4 Mitigation Measures

A Demolition and Construction Waste Management Plan (C&D WMP) for the demolition and construction of the development shall be employed to ensure effective waste management and recycling of waste generated at the site.

Mitigation measures proposed are summarised below:

- On-site segregation of all waste materials into appropriate categories including:
 - o made ground, soil, subsoil, bedrock
 - o concrete, bricks, tiles, ceramics, plasterboard metals
 - o dry recyclables e.g., cardboard, plastic, timber
- All waste materials shall be stored in skips or other suitable receptacles in a designated area of the site.
- Wherever possible, any suitable demolition materials shall be re-used on-site.
- Any potentially contaminated soil to be removed from site shall be tested to confirm its contamination status and subsequent management requirements.
- All waste leaving site shall be recycled, recovered or reused where possible, with the exception of those waste streams where appropriate facilities are currently not available.
- All waste leaving the site shall be transported by suitable permitted contractors and taken to suitably licensed or permitted facilities.
- All waste shall be tracked to its destination and a log be drawn up on left on site. The log shall include the haulier employed, the respective



driver, receiving gate receipts for all waste (both demolition and excavation material) etc.

These mitigation measures shall ensure the waste arising from the demolition and construction of the development is dealt with in compliance with the provisions of the Waste Management Act 1996-2011, and associated Regulations, the Litter Pollution Act of 1997 and the Eastern-Midlands Region (EMR) Waste Management Plan (2015-2021), and achieve optimum levels of waste reduction, re-use and recycling.



7.0 CONSTRUCTION WASTE GENERATED BY THE PROPOSED DEVELOPMENT

7.1 Construction Waste Classification

Waste generated during construction at a typical site includes the following:

- Concrete, bricks, tiles, and cement
- Wood
- Glass
- Plastics
- Bituminous mixtures, coal tar, and tarred products
- Metals (including their alloys)
- Soil and stones
- Insulation materials (possibly including asbestos-containing materials)
- Gypsum-based construction material
- Materials containing mercury
- PCB-containing materials (e.g. sealants, resin-based floorings, capacitors, etc.)
- Waste electrical and electronic equipment
- Oil wastes and waste of liquid fuels
- Batteries and accumulators
- Packaging (paper/cardboard, plastic, wood, metal, glass, textile, etc.)



Classification of wastes shall follow table 1 previously provided in sub-section 6.1.

7.2 Waste Management and Mitigation Measures

The following measures are proposed to ensure effective management of construction waste at the development site, to maximise recycling of construction waste, and to minimise the environmental impact of construction waste.

- Ensuring that accurate levels of materials are ordered to avoid surplus going to waste.
- On-site segregation of all waste materials into categories, including:
 - o topsoil, sub-soil, bedrock;
 - o concrete, bricks, tiles, ceramics, plasterboard;
 - o asphalt, tar, and tar products;
 - o metals;
 - o dry recyclables (e.g. cardboard, plastic, timber).
- All waste material shall be stored in skips or other suitable receptacles in a designated waste storage area on the site.
- Wherever possible, left-over material (e.g. timber cut-offs) shall be reused on or off site.
- Uncontaminated excavated material (top-soil, sub-soil) shall be reused
 on site in preference to the importation of clean fill, as soil to be reused
 or removed from site must be tested to confirm its contamination status
 and subsequent management requirements.
- All waste leaving the site shall be transported by a suitably licensed/permitted contractor and taken to a licensed/permitted facility.
- All waste leaving the site shall be recorded and copies of relevant documentation retained.



 In the event that hazardous soil, or historically deposited waste is encountered during the construction phase, SDCC shall be notified and provide a Hazardous/Contaminated Soil Management Plan, to include estimated tonnages, description of location, any relevant mitigation, destination for disposal/treatment, in addition to information on the authorised waste collector(s).

These measures are intended to ensure that the waste arising from construction of the proposed development is dealt with in compliance with the provisions of the Waste Management Acts 1996 to 2013, the Litter Act of 1997, and the Eastern-Midlands Region (EMR) Waste Management Plan 2015-2021, achieving optimum levels of waste reduction, re-use and recycling.

7.3 Predicted Impacts of the Proposed Development

Waste materials shall be generated during the construction of the proposed development, including the initial site clearance and excavation. Careful management of these, including segregation at source, shall help to ensure maximum recycling, reuse and recovery is achieved, in accordance with current local and national waste targets. It is expected, however, that a certain amount of waste shall still need to be disposed of at landfill.

Given the provision of appropriate facilities, environmental impacts (e.g. litter, contamination of soil or water, etc.) arising from waste storage are expected to be minimal. Particular attention must be given to the appropriate management of any construction waste containing contaminated or hazardous materials. The use of suitably licensed waste contractors shall ensure compliance with relevant legal requirements and appropriate off-site management of waste.

In summary, a high level of due diligence shall be carried out at the site as described by this Construction & Demolition Waste Management Plan. As such, it is envisaged that the environmental impact of the construction phase of the



proposed development shall be of small scale and limited duration (limited to period of construction), with respect to waste management.



8.0 CONCLUSION

This document outlines the principles and measures by which the waste generated during the demolition and construction phases of the proposed development shall be managed and disposed of in compliance with the provisions of the Waste Management Acts 1996 to 2013 and the Eastern-Midlands Region (EMR) Waste Management Plan 2015-2021. It describes the measures by which optimum levels of waste prevention, preparing for reuse, recycling, recovery and disposal are achieved.