Maria Fidelis Old School Building

Contamination Verification Report

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STAKEHOLDER REVIEW REQUIRED (SRR)	PURPOSE OF SRR
☒COUNTY/DISTRICT/LONDON BOROUGH COUNCIL ☐LOV ☐LUL ☐NRL ☐TFL ☐UTILTIES COMPANY ☐OTHER	☐ACCEPTANCE ☐APPROVAL ☐NO OBJECTION ☐CONSENT

Disclaimer:

This report takes into account the particular instructions and requirements of the Project as defined in Station Design Services Contract's (SDSC) Contract for the provision of design services Euston dated 13 February 2018 including any amendments to it.
It is not intended for and shall not be relied upon by any third party and SDSC shall have no responsibility or liability to any third party. Provided always that nothing in this disclaimer alters our SDSC's rights, obligations and liabilities under our Contract for the Project.

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1 Executive Summary

1.1.1 This interim verification report has been prepared in accordance with the Environment Agency Guidance "Land Contamination Risk Management" (LCRM) for the former Maria Fidelis school building and Starcross yard. The focus of this report is the works relevant to the redevelopment of the former Maria Fidelis school building which include demolition works, drainage works, landscaping works relating to the meanwhile (i.e. temporary) garden space as well as foundation works at the entrance of The Euston Partnership (TEP) community hub. This report also includes the works undertaken at Starcross yard which was developed by London Borough of Camden (LBC) in 2023. The site location and area are depicted in Figure 1.

1.1.2 This interim report presents the verification records to demonstrate that the approved remediation strategy has been implemented in accordance with the verification plan contained in the ground contamination report [1]. It is intended to be submitted to LBC pursuant to Condition 15 (implementation of remediation measures and verification reporting) of planning permission 2019/3091/P to enable partial discharge of the condition. An addendum to this report will be submitted on completion of the foundation works at the UK Power Networks (UKPN) substation as part of the redevelopment of the former Maria Fidelis school building as well as soil sampling at Starcross yard. The addendum will present the verification records relating to the foundation works at the UKPN substation as well as evidence of the placed depth and chemical testing certificates for the topsoil and subsoil at Starcross yard to demonstrate the approved remediation strategy and verification plan have been implemented.

1.1.3 A ground contamination report was submitted to LBC in October 2023 under an application for approval of details (ref: 2023/4358/P) reserved by Condition 15 of the planning permission (2019/3091/P) and was approved by LBC on 6 November 2023 to enable partial discharge of Condition 15. The ground contamination report confirmed that no specific advanced phases of remediation were required. The agreed strategy required site controls during development works due as asbestos containing materials (ACM) were identified in the ground.

1.1.4 MDjv was the principal contractor for the redevelopment of the former Maria Fidelis school building and provided the information to document the works undertaken and demonstrate compliance with the remediation strategy and verification plan. The information reviewed indicates that the contractors have implemented appropriate health and safety precautions. The information provided indicates that licensed asbestos removal works were undertaken in

accordance with mitigation measures and monitoring requirements specified in the plan of work (provided in Appendix A). It also indicates that a contamination watching brief was undertaken during the groundworks.

1.1.5 ACM was encountered during excavation at the TEP community hub entrance which was reported, documented and validated.

1.1.6 LBC was the client and Greater London Demolition was the principal contractor for the development of Starcross yard. Verification information was provided by LBC retrospectively. It is stated in the health and safety file (provided in Appendix A) that the works were completed in accordance with all planning and regulatory requirements. LBC advised that to their knowledge, no ground contamination was encountered on site during the construction. MDjv is planning to undertake a ground investigation at Starcross yard in early 2025 to verify the soft landscaping implementation at the yard. The ground investigation will comprise soil sampling at four locations across the yard. Findings of the investigation will be presented in a ground investigation factual report and submitted as an addendum to this report.

1.1.7 No significant contamination was identified in the approved ground contamination report. The information provided indicates that remedial measures aligning to, and in broad compliance with, the remediation strategy were implemented for works covered in this report with actions documented. The information presented in this report including the appendices provides the lines of evidence regarding the implementation of the recommended remediation strategy during construction.

2 Introduction

2.1 Background

2.1.1 Planning permission for the redevelopment works at the Maria Fidelis site includes the change of use of the former Maria Fidelis school building to office use with associated external alterations and multi-use community facilities. It was granted by London Borough of Camden (LBC) on 15 October 2021 under ref: 2019/3091/P. Several conditions attached to the planning permission require details to be submitted for approval by LBC at various stages of the development, as specified within the decision notice. Condition 15 relates to ground contamination and is presented as follows:

Prior to commencement of the relevant part of the development, a written programme of ground investigation for the presence of soil and groundwater contamination and landfill gas shall be submitted to and approved by the local planning authority in writing.

Site investigation shall be carried out in accordance with the approved programme and the results and a written scheme of remediation measures [if necessary] shall be submitted to and approved by the local planning authority in writing.

The remediation measures shall be implemented strictly in accordance with the approved scheme and a written report detailing the remediation for the relevant part of the development shall be submitted to and approved by the local planning authority in writing prior to occupation.

Reason: To protect future occupiers of the development from the possible presence of ground contamination arising in connection with the previous industrial/storage use of the site in accordance with policies G1, D1, A1, and DM1 of the London Borough of Camden Local Plan 2017.

2.1.2 A ground contamination report [1] was submitted to LBC in October 2023 for approval of details (ref: 2023/4358/P) reserved by Condition 15 of the planning permission (ref: 2019/3091/P). It was subsequently approved by LBC on 6 November 2023 to enable partial discharge of Condition 15, which includes the first two parts of Condition 15 (programme of ground investigation and scheme of remediation measures). It is stated in the decision notice that a written report, detailing the works undertaken to address the specific control and remediation measures outlined in the scheme of mitigation approved, must be submitted to and approved by LBC in writing prior to occupation to enable full discharge of Condition 15.

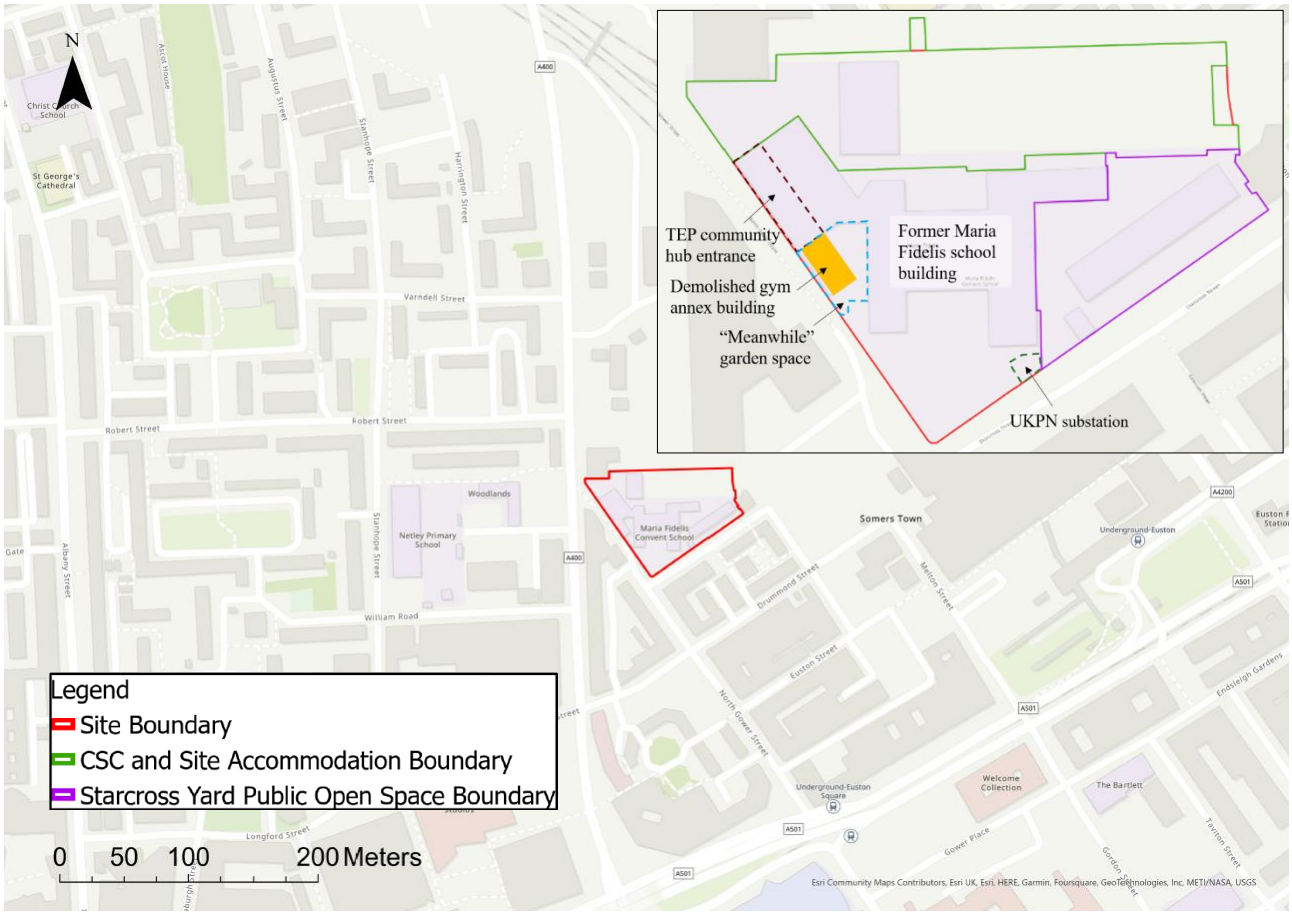
2.1.3 The northern portion of the Maria Fidelis site has been redeveloped as a Construction Skills Centre (CSC) and site accommodation. This area has been subject to a separate planning application and permission granted by LBC on 13 December 2021 under ref: 2021/3796/P. A contamination verification report [2] was submitted to LBC in December 2022 under an application for approval of details (ref: 2022/5209/P) reserved by Condition 14 of the planning permission (ref: 2021/3796/P). It was subsequently approved by LBC on 1 February 2023 to enable full discharge of Condition 14.

2.1.4 The southeastern portion of the Maria Fidelis site has been redeveloped as a community garden public open space known as Starcross yard in accordance with the approved landscaping design granted by LBC under ref: 2022/0180/P. Contamination verification information relating to the community garden public open space is to be submitted to and approved by LBC prior to its operation.

2.1.5 This interim verification report has been produced by the Mace Dragados Joint Venture (MDjv) with focus on the works undertaken for the redevelopment of the former Maria Fidelis school building in the southwestern portion of the Maria Fidelis site. This report also includes the works undertaken at Starcross yard in the southeastern of the site, with the verification data to follow in the addendum report.

2.1.6 The site location and area are depicted in Figure 1.

Figure 1: Site location plan



2.2 Objective

2.2.1 The objective of this interim verification report is to provide a review of the relevant information supplied by the contractors/ LBC in relation to the former Maria Fidelis school building and Starcross yard. It is intended to be submitted to LBC pursuant to the Condition 15 (implementation of remediation measures and verification reporting) of the planning permission (ref: 2019/3091/P) to enable partial discharge of the condition.

2.2.2 The verification information in this interim verification report covers the demolition works, drainage works, landscaping works relating to a meanwhile garden space, as well as foundation works at the entrance of The Euston Partnership (TEP) community hub relevant to the redevelopment of the former Maria Fidelis school building. The available verification information for Starcross yard has also been reviewed and presented in this report.

2.2.3 An addendum will be prepared and submitted on completion of the foundation works at the UK Power Networks (UKPN) substation as part of the

redevelopment of the former Maria Fidelis school building as well as soil sampling at Starcross yard. The addendum will present the verification records relating to the foundation works at the UKPN substation as well as evidence of the placed depth and chemical testing certificates for the topsoil and subsoil at Starcross yard to demonstrate the approved remediation strategy has been implemented.

2.2.4 The following works which were originally proposed and mentioned in the approved ground contamination report [1] have now been postponed indefinitely:

- Shallow excavation and landscaping works at the forecourt in front of the former school building.
- Foundation works including installation of footings for permitter fencing.

2.2.5 The verification information for these postponed works would be presented in a further addendum and submitted to LBC, if they are undertaken.

2.3 Structure

2.3.1 The report has the following structure:

- Section 3 summarises the approved contamination assessment, remediation strategy and verification plan.
- Section 4 provides a description of the development works, outlines verification responsibilities and describes the implementation of the remediation strategy, with references to verification evidence.
- Section 5 provides conclusions of the verification.

2.3.2 The factual information on which this report is based is described in the report text with selected factual verification information included in appendices.

2.4 Limitations

2.4.1 This report has been produced by MDjv on behalf of HS2 Ltd for the works at the former Maria Fidelis school building and Starcross yard. It considers the particular instructions and requirements of MDjv on behalf of HS2 Ltd. It is not intended for and should not be relied upon by any third party and no responsibility is undertaken to any third party.

2.4.2 MDjv on behalf of HS2 Ltd has prepared this report based on current legislation, statutory requirements and industry good practice prevalent at the time of

writing. Any subsequent changes or new guidance may require the findings, conclusions and recommendations made in this report to be reassessed considering the circumstances. Should the approved layout or use of the site change, the assessments and conclusions presented in this report may need to be revised.

2.4.3 MDjv on behalf of HS2 Ltd has based the report on the sources of information detailed within the report text and believes them to be reliable but cannot and does not guarantee the authenticity or reliability of third-party information. Notwithstanding the efforts made by the professional team in undertaking this assessment, it is possible that ground and contamination conditions other than those potentially indicated by this report may exist at the site.

3 Risk Assessment and Remediation Strategy

3.1 Contamination risk assessment

3.1.1 The available data including the site history, setting and sensitivity of the Maria Fidelis site were reviewed and assessed in the ground contamination report [1]. The site was open fields before 1830. It was developed and occupied by residential dwellings between 1830 and late 1930s prior to World War 2. It has been occupied as a school since then. The site is underlain by Made Ground, River Terrace Deposits (RTD), London Clay, Lambeth Group the Thanet Formation and Chalk. In the west, the Made Ground is underlain by Langley Silt over London Clay with no RTD. Made Ground is identified as a potential contamination source on site with depth not proven in the works area.

3.1.2 Low levels of asbestos were identified in the Made Ground during investigations and development works in the north of the site. Polycyclic aromatic hydrocarbons were occasionally above the commercial generic assessment criteria (GAC). Concentrations of lead were below the commercial GAC but above background levels. The soils associated with most of these results have been removed as part of recent development works and disposed of appropriately. There is a potential for sporadic asbestos containing material (ACM), asbestos fibres, and slightly elevated hydrocarbons and metals but not significant widespread contamination. There were signs of contamination observed in the north of the site and around the forecourt in front of the school building, and other localised areas of contamination may be present.

3.1.3 The proposed development is low sensitivity involving very limited shallow groundworks, a temporary commercial end use with installation of some hard and soft landscaping areas.

3.1.4 Potential contaminant linkages have been identified by the risk assessment [1]. The risk of harm to human health is moderate to low during construction and low during operation. Good construction practices and enhance controls were proposed to mitigate the risks identified to acceptable levels. The risk of pollution to controlled waters (secondary A aquifer) is low. The risk of harm to new planting in landscaped areas is very low, and potential residual contamination will be managed through the specification of landscaping soil.

3.1.5 No significant contamination was identified or is expected. Some asbestos was identified in the Made Ground which is not unusual. Concentrations of other contaminants were low. No specific advanced remediation was required.

3.2 Remediation strategy and verification plan

3.2.1 The remediation strategy and verification plan were defined in full in Section 7.2 and Section 7.3 of the approved ground contamination report [1] respectively.

3.2.2 The key provisions of the remediation strategy comprise the following:

- The implementation of the enhanced health and safety measures including those within the HS2 Code of Construction Practice [3]. Measures should comply with the Control of Asbestos Regulations (CAR) 2012 and associated guidance CARSOIL [4].
- Undertake appropriate awareness training, inductions and toolbox talks with emphasis on specific ground conditions such as potential presence of hydrocarbons and asbestos on-site.
- The implementation of a watching brief during ground works for the presence of contamination, including hydrocarbons and asbestos.
- Robust material and waste management procedures, ensuring that all necessary permits and waste documentation are compliant with the relevant regulations and guidance.
- Provision of certified clean landscaping soils placed over a marker layer, and verification sampling and testing of topsoil and subsoil at an initial frequency of one per 200m^3.

3.2.3 Relevant information was required to be collected during the development works and collated into a verification report. This verification report would be compiled such that information contained within the report can be taken account of during the operational phase.

3.2.4 This verification report includes, but is not necessarily restricted to:

- Details of contamination identified during the works, how these were addressed, results of any additional laboratory testing, and records of communications and correspondence with the Local Authority.
- Details of the type, form, amount, and distribution of asbestos encountered during excavation and construction works.
- Health and safety and environmental control measures employed, including CAR occupational risk assessment and resulting specific or additional control measures, and air monitoring results.

- Details of landscaping implementation including supplier source certification for the imported soils, laboratory and in-situ validation test results for the imported soils, and thickness of landscaping soils.
- Material and waste management records to demonstrate all necessary permits and waste documentation are compliant with the relevant regulations and guidance.

4 Remediation Implementation

4.1 Description of works

Former Maria Fidelis school building

4.1.1 The relevant development works comprised the following activities:

- Demolition works, including demolition of the gym annex building connected to the sports hall of the former school building down to ground floor slab.
- Drainage works, including installation of drainage runs and manholes.
- Foundation works, including installation of new concrete slab and footings at TEP community hub entrance.
- Building retrofitting works.
- Provision of meanwhile garden space.

4.1.2 The works involving demolition, building retrofitting and provision of meanwhile garden space but did not include any intrusive groundworks.

Starcross yard

4.1.3 The relevant development works comprised the following activities:

- Demolition works, including demolition of a substation and an ancillary building of the former Maria Fidelis school building, down to 1m below ground level.
- Backfill excavated areas with imported clean and inert material.
- Hard and soft landscaping works.

4.1.4 MDjv and SDSC have not been involved in the development works at Starcross yard. Verification information relating to Starcross yard have not yet been submitted to and approved by LBC, prior to its operation. The information has been collected retrospectively by SDSC and presented in this report.

4.2 Development progress

4.2.1 A record of the redevelopment progress of the former Maria Fidelis school building is presented in Table 4-1. Photographs of the completed Starcross yard are also provided in Table 4-2.

Table 4-1: Redevelopment progress of the former Maria Fidelis school building

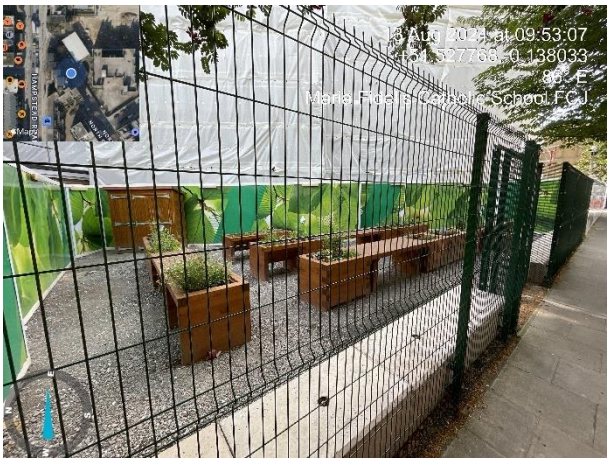
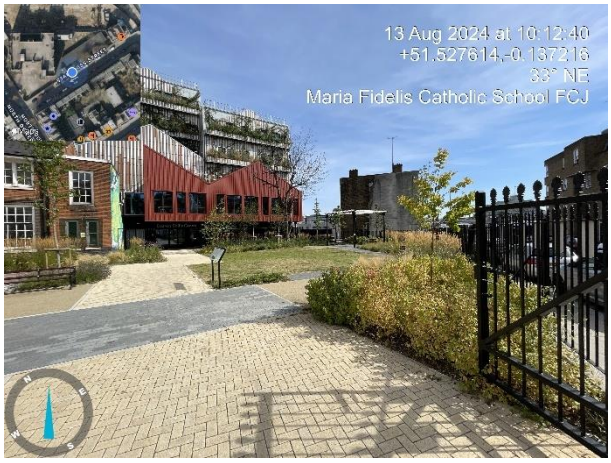
Photograph and description	
	
Demolition of the gym annex building in March 2024.	Demolition of the gym annex building in March 2024.
	
Implemented meanwhile garden space. Photo taken on 13 August 2024.	Excavation works at TEP community hub entrance on 13 August 2024 for installation of new concrete slab and footings.
	
Excavation works on 13 August 2024 for installation of drainage runs and manholes.	Backfilling at TEP community hub entrance on 17 October 2024.

Table 4-2: Photographs of the completed Starcross yard

Photograph and description	
	
Photo of Starcross yard taken on 13 August 2024 towards the west.	Photo of Starcross yard taken on 13 August 2024 towards the north.

4.3 Verification responsibilities

4.3.1 The parties involved in the development works relevant to the remediation and verification and their roles and responsibilities are outlined in Table 4-3 and Table 4-4. Table 4-3 relates to the redevelopment works of the former Maria Fidelis school building, and Table 4-4 relates to the development works of Starcross yard. Similar tables will be provided in the addendum report as part of the verification information for the UKPN site:

Table 4-3: Parties and their verification responsibilities (former Maria Fidelis school building)

Group	Role	Responsibilities for verification requirements
Overarching roles		
MDjv	Principal contractor	• Oversee the operations being carried out on site. • Maintain records of the remediation activities and provide to SDSC for review.
SDSC	Geoenvironmental consultant	• Review the verification information supplied by the contractors and their specialists. Raise comments or clarifications, as required. • Collate the information into a verification report as required by Condition 15.
Contractors		
Mohan Building Services	Demolition contractor	• Carry out demolition works for the gym annex building. These involve soft stripping and demolishing a single storey structure down to ground floor slab.
Rainsford Contracts Limited (RCL)	Drainage and foundation contractor	• Carry out drainage works which include installation of drainage runs and manholes. These involve excavation down to approximately 1.2m below ground level (bgl).

Group	Role	Responsibilities for verification requirements
		• Carry out foundation works which include installation of new concrete slab and footings at TEP community hub entrance. These involve excavation down to approximately 1.7m bgl. • Implement the ground contamination watching brief.
Ductclean UK Limited	Asbestos removal contractor	• Carry out licensed asbestos removal works within the former Maria Fidelis school building.
4-RAIL Services Limited (4RS)	Asbestos removal contractor	• Inspect, test and remove asbestos insulating board (AIB) debris from TEP community hub entrance. These involve excavation down to approximately 0.75m bgl. • Implement the ground contamination watching brief.

Table 4-4: Parties and their verification responsibilities (Starcross yard)

Group	Role	Responsibilities for verification requirements
LBC	Client	• Maintain project health and safety file as well as implementation and completion records. • Provide available information to SDSC for review.
Greater London Demolition	Principal contractor	• Implement demolition, enabling and landscaping works at Starcross yard. • Oversee the operations being carried out on site.
Asbestos Solutions Limited	Asbestos removal contractor	• Implement licensed asbestos removal works within an ancillary building of the former Maria Fidelis school. • Prepare plan of work with health and safety requirements and completion report with waste disposal information.

4.4 Inventory of verification data

Former Maria Fidelis school building

4.4.1 The verification data supplied by MDjv for the redevelopment of the former school building and peripheral areas to inform this verification report is listed below:

- Health and safety documentation including contractors' risk assessment method statement (RAMS), asbestos toolbox talk note and log, plans of work, HSE notification form, analysis results and completion certificates for asbestos removal works, an example of a watching brief note, as well as email correspondence relating to ACM discovery (Appendix A).
- Email correspondence with MDjv regarding confirmation on quality of the imported materials including 50mm deep sand blinding, Type 1 material and topsoil (Appendix B).
- Waste documentation including example printout of "Optimise" (HS2 online reporting website), spreadsheet containing list of waste disposal records,

information on waste carriers and waste receiving facilities as well as examples of waste transfer notes and consignment notes (Appendix C).

Starcross yard

4.4.2 The verification data supplied by LBC Green Space Project Officer for the development of Starcross yard to inform this verification report is listed below:

- Health and safety documentation including health and safety file control & reference document and checklist, plan of work and completion report for asbestos removal works (Appendix A).
- Landscaping implementation records including design and as-built drawings and laboratory test report for the imported topsoil (Appendix B).
- Waste documentation including information on waste carriers and waste receiving facilities for asbestos waste as well as examples of waste consignment notes (Appendix C).

4.5 Verification implementation

Health and safety

Former Maria Fidelis school building

4.5.1 MDjv had overall control and responsibility during the redevelopment works of the former Maria Fidelis school building. This included ensuring that individual trade contractors complied with the requirements of the remediation strategy and presented the documentation which has been compiled in this report.

4.5.2 Mohan Building Services carried out the demolition works for the gym annex building. RAMS for the demolition works are provided in Appendix A. It is stated in the RAMS that briefing of site operatives on daily activities and any potential hazards, is required. The RAMS specify control measures which include fencing off the works area, erecting noise barriers to reduce construction noise, spraying water to suppress airborne particulates, providing spill kits within 10m of the works area, and wearing 6-point personal protective equipment (PPE) for site operatives.

4.5.3 RCL delivered the drainage works and foundation works at TEP community hub entrance. RAMS for those works are provided in Appendix A. The RAMS require all operatives to undertake a site-specific induction prior to working on site, and to wear full 6-point PPE as well as ear defenders while breaking activities are undertaken. The areas of works are required to be barriered off with noise absorption panels erected. Any dust raised during the works is required to be

controlled by damping down. Contaminated ground issues are highlighted in design drawings appended in the RAMS to alert site operatives. Emergency procedures are stated in the RAMS in case incidents including spillage and ground contamination are encountered on site.

Starcross yard

4.5.4 Health and safety information relating to the development works undertaken at Starcross yard is limited to that contained within the health and safety file prepared by the Greater London Demolition and as required by the Construction (Design and Management) Regulations 2015 (the CDM Regulations). The control and reference document and checklist of the health and safety file are provided in Appendix A.

4.5.5 The health and safety file contains a summary of the works completed, parties involved, various records including as-built drawings and plans, description and approach to residual hazards and risks. The file has been reviewed by the project director and updated to address necessary comments as shown in the health and safety file checklist.

4.5.6 LBC confirmed that welfare facilities were provided to workers in the adjacent school building during the construction. The health and safety file states that the works were completed in accordance with all planning and regulatory requirements. Residual hazards and risks were identified in the file which include demolition, landscaping maintenance and cleaning of drains and manholes. The approach to address the residual hazards and risks was proposed which includes risk assessments and permit-to-work systems, restricting works to be carried out by competent and suitably trained persons, undertaking necessary precautions to minimise risks to workers, occupiers and the public such as segregation of work areas, as well as provision of appropriate hoarding and signage.

Asbestos management and control

Former Maria Fidelis school building – asbestos in building

4.5.7 MDjv provides toolbox talks for site personnel which cover aspects including asbestos. The asbestos toolbox talk introduces where ACM could be present, how asbestos fibres could impact human health as well as procedures to be followed when encountering asbestos fibres and ACM. The asbestos toolbox talk note and log are provided in Appendix A.

4.5.8 Licensed asbestos removal works were undertaken within the former Maria Fidelis school building. The works involved removal of thermal insulation on floor and walls, asbestos insulation debris on the tank room floor, asbestos insulating board (AIB) panels within the cleaner store cupboard and small riser, AIB debris and residue within ceiling void, and external AIB door header. The works were undertaken by Ductclean UK Limited between 24 November 2023 and 22 February 2024.

4.5.9 A plan of work for the asbestos removal works within the former school building is provided in Appendix A. The plan of work requires removal works to be carried out within an enclosure under negative pressure. In addition, suppression was required to be used throughout the debris removal using a handheld pump sprayer. Workers were required to be equipped with appropriate PPE including disposable/ non-disposable respiratory protective equipment. Sufficient barrier tape and warning signs were required to be erected to clearly display that removal works taking place. An asbestos supervisor was required during the works, and a physical barrier should be provided during transiting of asbestos waste.

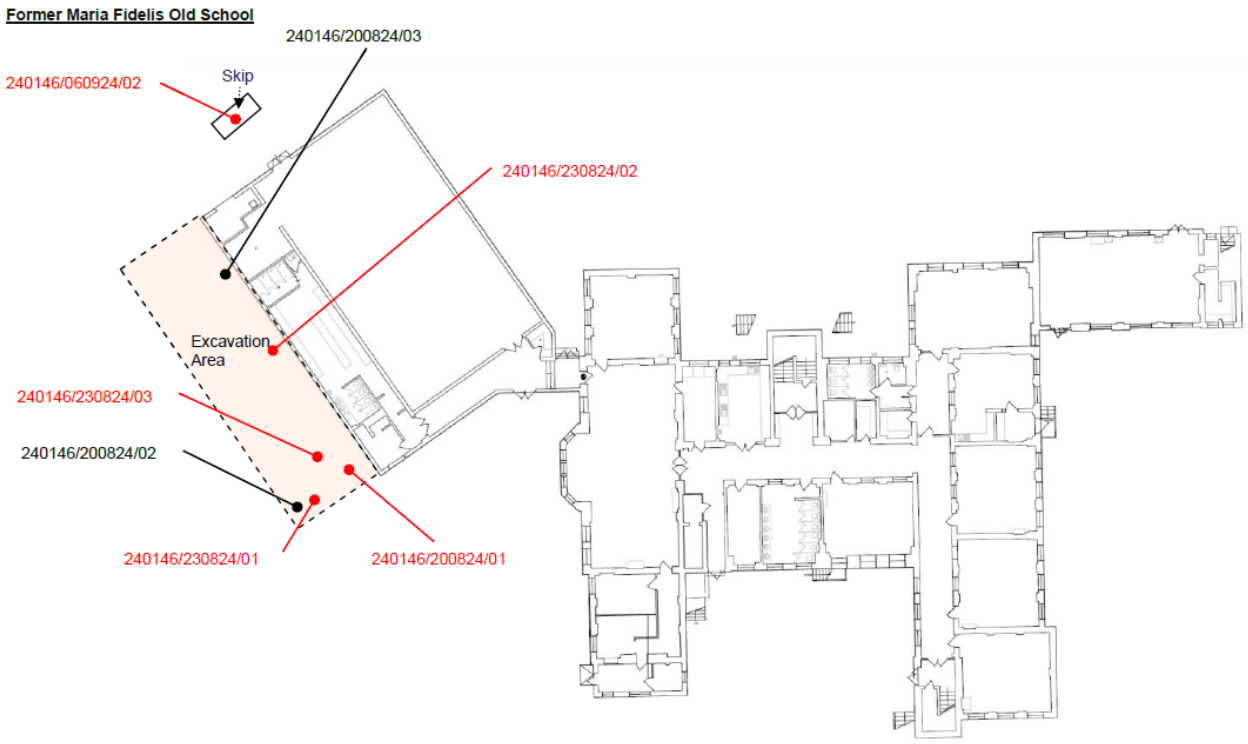
4.5.10 Certificates for reoccupation for the asbestos removal works within the former Maria Fidelis school building are provided Appendix A. Four stages of assessments were undertaken for the asbestos removal works which included a preliminary check of the site condition and job completeness, thorough visual inspection inside the enclosure, clearance air monitoring inside the enclosure, and assessment of the site for reoccupation after the enclosure had been removed. The works had passed the four stages of assessment as confirmed by the licenced asbestos specialist from 4RS as shown on the certificates for reoccupation.

Former Maria Fidelis school building – asbestos in soils

4.5.11 On 19 August 2024, suspected ACM was encountered during excavation at TEP community hub entrance. Works were subsequently ceased, and the area (approximately 100m^2) was fenced off. 4RS was commissioned to inspect, test and subsequently remove the ACM. Seven samples were collected on 20 August, 23 August and 6 September 2024. Six of them were collected from the excavation area at TEP community hub entrance, and one was collected from the excavation spoil waste skip. The samples were tested for the presence and identification of asbestos. Five out of the seven samples tested (four from the excavation area at TEP community hub entrance, and one from the excavation spoil waste skip) were found to contain asbestos. The asbestos was found to be in form of AIB debris and typically comprised amosite and chrysotile. The

analysis results with sampling location plan and photographs of the samples are provided in Appendix A. The asbestos removal works were identified as licensable works, and the Health and Safety Executive (HSE) was notified through an ASB5 form which is provided in Appendix A. Area where the ACM was encountered and the sampling locations are shown in Figure 2.

Figure 2: Area where the ACM was encountered and the sampling locations



4.5.12 A plan of work for the licensed asbestos removal is provided in Appendix A. The plan of work indicates an excavator would be used to excavate and load wheelbarrows with the excavated soils potentially containing AIB debris. DCUK would be in attendance during the excavation works to carry out a watching brief and to handpick the debris where required. Where AIB debris is found, the debris is required to be bagged in asbestos bags and the soil to be raked and inspected. The plan of work requires the removal work to be undertaken within a respirator zone under locally controlled conditions and with dust suppression using a handheld pump sprayer. The works area is required to be fenced off with appropriate signage posted. Further analysis of the excavated area is required through digging of trial holes and collecting validation soil samples to confirm all ACM is removed from site.

4.5.13 The licensed asbestos removal works were undertaken between 13 September and 7 October 2024. A completion certificate was issued by DCUK on 9 October 2024 and is provided in Appendix A. As stated on the completion certificate,

excavation was undertaken down to approximately 0.75m bgl to remove all AIB debris encountered at TEP community hub entrance. The asbestos waste was removed from site and transported to the DCUK asbestos waste transfer station. Three trial holes were dug at TEP community hub entrance, and three verification soil samples, which were considered by DCUK to be sufficient and proportionate to the impacted area, were obtained on 18 September 2024 from the trial holes with depths ranging from approximately 0.2m to 0.3m bgl. Results showed that asbestos was not detected in the soil samples. The analysis results and sampling location plan are provided in Appendix A.

4.5.14 Airborne fibre monitoring was undertaken throughout the inspection and ACM removal works between 23 August and 8 October 2024. All monitoring results were below the applicable limits. The certificates of analysis are provided in Appendix A.

Starcross yard – asbestos in building

4.5.15 Licensed asbestos removal works were undertaken within an ancillary building of the former Maria Fidelis school which previously occupied most of the central, southern and eastern parts of Starcross yard. The building was subsequently demolished after the asbestos removal works were completed. A plan of work for the licensed asbestos removal works was prepared by Asbestos Solutions Limited and is provided in Appendix A. It is stated in the plan of work that the works involved removal of the concrete floor to expose pipework, application of water surfactant on the pipework, removal of the pipework and associated ACM.

4.5.16 According to the plan of work, the concrete floor would be removed using a breaker to expose the pipework with ACM. The pipework with ACM would first be sprayed with water surfactant. It would then be removed in small sections through cutting and wrapped in polythene sheeting. The waste would be placed in a waste skip and removed from site by licensed carrier. The plan of work requires specific PPE including half mask and full-face mask to be used for the works with a PPE check to be undertaken twice per day. Work areas are required to be cordoned off with placement of appropriate signage.

4.5.17 A completion report for the asbestos removal works is provided in Appendix A. The report includes photographs of the work areas upon completion as well as waste documentation such as waste tickets and consignment notes. The works were completed in April 2021 as indicated in the completion report.

Watching brief

Former Maria Fidelis school building

4.5.18 Evidence of implementing the watching brief during the redevelopment works of the former Maria Fidelis school building is provided through various documents in form of notes and email correspondence. Findings of unexpected ACM during excavation at TEP community hub entrance were reported by email. The email correspondence regarding ACM discovery during excavation at TEP community hub entrance is provided in Appendix A. An example watching brief note recording observations relating to asbestos during excavation works, is provided in Appendix A.

Starcross yard

4.5.19 Evidence of implementing the watching brief during the development of Starcross yard has not been provided by LBC. Ground contamination has not been recorded or flagged as residual hazards and risks in the health and safety file. LBC also mentioned in email correspondence that to their knowledge none was encountered on site during the construction. The email correspondence is provided in Appendix A.

Landscaping and other imported materials

Former Maria Fidelis school building

4.5.20 Approximately 2m^3 of 50mm deep sand blinding and 38m^3 of Type 1 material were imported and used for backfilling the excavated areas. The materials were purchased from Jewson Builders Merchants. MDjv confirmed that the materials were visually inspected and no visual evidence of contamination was noted on arrival at the site.

4.5.21 Approximately 2m^3 of topsoil was imported and used in above-ground planters at the meanwhile garden space. The topsoil was purchased from Builder Depot. It is stated on the product specification that the topsoil contains naturally occurring organic matter and a small amount of grit which assists with drainage, and the soil complies with the requirements of BS 3882 Specification for topsoil [5]. In situ samples of the imported topsoil have not been collected and tested as required in the remediation strategy. However, only a minimal amount was imported for use in above-ground planters at the temporary garden which will be replaced at a later stage with a permanent landscaping solution. MDjv

confirmed that the imported topsoil was visually inspected upon arrival to the site and no visual contamination identified.

4.5.22 Email correspondence with MDjv regarding confirmation on quality of the imported materials reporting and that it was 50mm deep sand blinding, Type 1 material and topsoil, is provided in Appendix B.

Starcross yard

4.5.23 A combination of hard and soft landscaping was implemented at Starcross yard. Hard landscaping includes a combination of concrete paving, granite blocks, decking and resin bound gravel. Soft landscaping includes areas of meadow, hard wearing lawn and mixed herbaceous and coniferous trees and shrubs. Both design and as-built landscape drawings are provided in Appendix B.

4.5.24 Topsoil and subsoil were imported to site for use in the soft landscaping areas. LBC confirmed that the imported topsoil and subsoil complied with requirements stated in BS 3882 [5] and BS 8601 [6] respectively. The laboratory test report for the topsoil is provided in Appendix B.

4.5.25 According to the information provided by LBC, topsoil with thicknesses of 450mm and 150mm was placed in the planted area and lawn area respectively, and subsoil with a thickness of 100mm in the meadow area. A summary of topsoil and subsoil imported and used on site is presented in Table 4-5, based on the information provided by LBC.

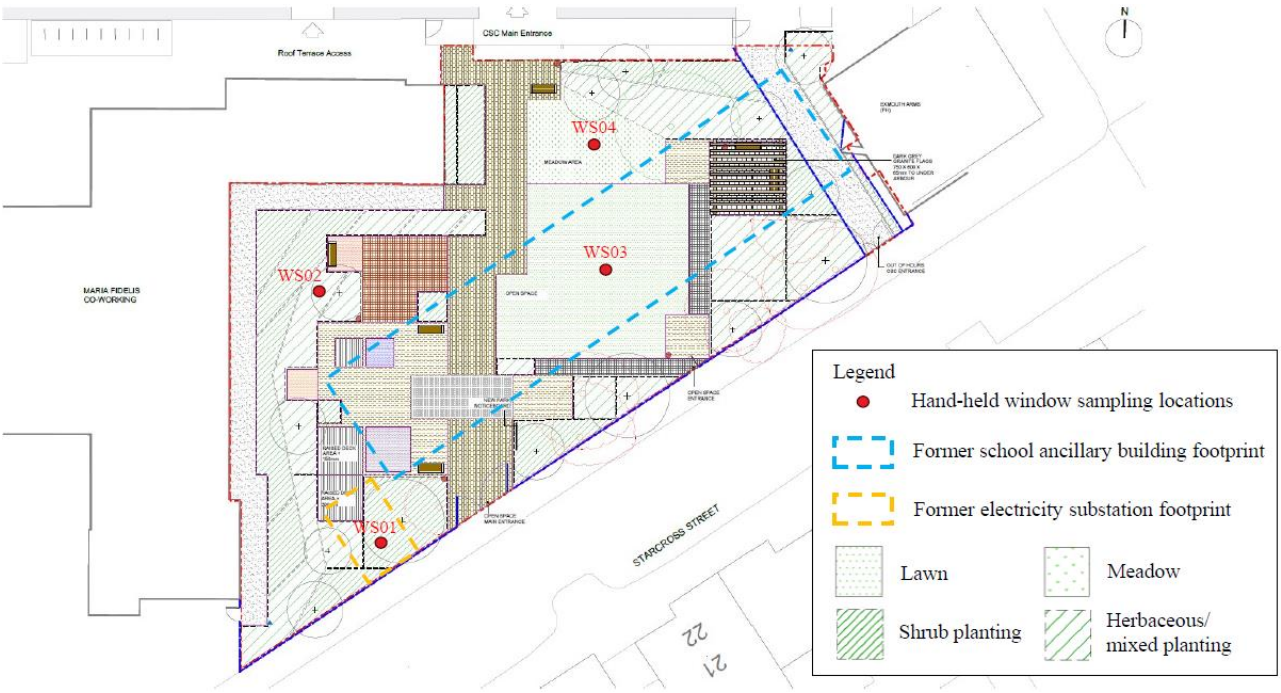
Table 4-5: Imported topsoil and subsoil for the development of Starcross yard

Soil type	Area (m^2)	Depth (mm)	Quantity (m^3)
Topsoil	430 (Planted area)	450	205
	179 (Lawn area)	150	30
Subsoil	56 (Meadow area)	100	6

4.5.26 LBC confirmed that no new drainage was installed as part of the landscaping works. Surface water runoff is diverted away from buildings and into new planting beds through designed ground levels.

4.5.27 MDjv is planning to undertake a ground investigation at Starcross yard in early 2025 to verify the soft landscaping implementation at the yard. The ground investigation will comprise soil sampling at four locations covering lawn, meadow, shrub planting and herbaceous/ mixed planting areas. The proposed soil sampling location plan is shown in Figure 3.

Figure 3: Proposed soil sampling location plan



4.5.28 Findings of the ground investigation will include evidence of the depth and chemical testing certificates for the topsoil and subsoil at Starcross yard. This will be presented in a ground investigation factual report and submitted as part of an addendum to this report.

4.6 Waste management documentation

General

Former Maria Fidelis school building

4.6.1 Waste records including the waste disposal volume, carrier, destination and classification, were tracked and maintained using SmartWaste system. The records were added to Optimise, which is the HS2 online reporting website, monthly. Example printouts of Optimise to demonstrate how waste records were managed and kept, are provided in Appendix C. The sample information provided for review suggests that the handling and disposal of waste was undertaken in accordance with the requirements.

Starcross yard

4.6.2 Full waste records have not been provided by LBC. The health and safety file indicates that Greater London Waste Disposal Limited was commissioned to

manage the waste generated from the development. Waste records relating to the asbestos removal works are contained in the works completion report provided in Appendix A.

Waste volumes summary

Former Maria Fidelis school building

4.6.3 A spreadsheet containing a list of waste disposal records for the works covered in this interim report during redevelopment of the former Maria Fidelis school building is included in Appendix C. The records show the date of transfer, waste carrier, destination of transfer and waste transfer note and consignment note references as supplied by MDjv. A summary of wastes removed from the site is presented in Table 4-6, based on the records maintained on site.

Table 4-6: Summary of waste types and quantities (former Maria Fidelis school building)

Waste type	Waste code	Quantity (tonnes)
Soil and stones	17 05 04	70.24
Construction material containing asbestos	17 06 05	4.68

Starcross yard

4.6.4 A summary of the asbestos waste removed during the development of Starcross yard is provided in Table 4-7, based on the records shown on the consignment note.

Table 4-7: Summary of asbestos waste and quantity (Starcross yard)

Waste type	Waste code	Quantity (tonnes)
Insulation material containing asbestos (amosite)	17 06 01	6.68
Construction material containing asbestos (chrysotile)	17 06 05	

Waste carriers and transfer/ consignment notes

Former Maria Fidelis school building

4.6.5 The registered waste carriers for transporting the waste are listed in

4.6.6 Table 4-8. Detailed information on the carriers as well as examples of waste transfer notes and consignment notes are included in Appendix C.

Table 4-8: Summary of waste carriers (former Maria Fidelis school building)

Name	Address	Registration number
Ductclean (UK) Limited	Ductclean UK Ltd, 1, Woodfield Road, Welwyn Garden City, AL7 1JQ	CBDU59399
Sortera Limited	Sortera House, 35 First Avenue, Montagu Industrial Estate, Edmonton, N18 3PH	CBDU90075

Starcross yard

4.6.7 The registered waste carrier for transporting the asbestos waste is listed in Table 4-9. Detailed information on the carrier as well as examples of waste consignment notes are included in Appendix C.

Table 4-9: Summary of waste carrier for transporting asbestos waste (Starcross yard)

Name	Address	Registration number
DEM Waste Management	Unit 14 Sanhurst, Canvey Island, Essex SS8 0SA	CBDU66605

Waste receiving facilities

Former Maria Fidelis school building

4.6.8 The registered waste facilities for receiving the waste are listed in Table 4-10. Detailed information on the facilities is included in Appendix C.

Table 4-10: Summary of waste receiving facilities (former Maria Fidelis school building)

Name	Address	Permit number
DCUK (FM) Limited	Welwyn Garden, 1 Woodfield Road, Welwyn Garden City, Hertfordshire, AL7 1JQ	WE4636AC
Mick George Limited	Mepal Landfill Site, Block Fen Drove, Mepal, Cambridgeshire, CB6 2AY	LP3996ND
Sortera Limited	100a, Markfield Road, Tottenham, London, N15 4QF	AP3695SX
Sortera Limited	Sortera Limited, Gibbs Road, Montagu Industrial Estate, Edmonton, London, N18 3PU	FB3609LQ

Starcross yard

4.6.9 The registered waste facility for receiving the asbestos waste is listed in Table 4-11. Detailed information on the facility is included in Appendix C.

Table 4-11: Summary of waste receiving facility for asbestos waste (Starcross yard)

Name	Address	Permit number
Mick George Limited	Mepal Landfill Site, Block Fen Drove, Mepal, Cambridgeshire, CB6 2AY	LP3996ND

5 Conclusions

5.1.1 This interim verification report provides a review of the relevant information supplied by the contractors and LBC in relation to the former Maria Fidelis school building and Starcross yard. The verification information in this report covers the demolition works, drainage works, and landscaping works relating to a meanwhile garden space as well as foundation works at the entrance of TEP community hub. The available verification information for the development of Starcross yard has also been reviewed and presented in this report.

5.1.2 This report is intended to be submitted to LBC pursuant to Condition 15 (implementation of remediation measures and verification reporting) of planning permission (ref: 2019/3091/P) to enable partial discharge of the condition. The records reviewed indicate that the approved remediation strategy has been implemented as described in this report.

5.1.3 An addendum will be prepared and submitted on completion of the foundation works at the UKPN substation and for soil sampling at Starcross yard. The addendum will present the verification records relating to the foundation works at the substation as well as evidence of the placed depth and chemical testing certificates for the topsoil and subsoil at Starcross yard.

5.1.4 MDjv was the principal contractor for the former Maria Fidelis school building and provided the information to document the works undertaken and demonstrate compliance with the remediation strategy. The information reviewed indicates that the contractors have implemented health and safety precautions. The records suggest also indicate a contamination watching brief was undertaken during the groundworks. Unexpected ACM was reported, documented and validated, which was evidenced by email correspondence, a plan of work, analysis reports and a completion certificate. The documents reviewed indicate waste records were tracked and maintained. Waste materials were classified, tested, and removed from site under a chain of custody, by permitted hauliers to permitted facilities. Imported materials were visually inspected and reported to be free from visual contamination, on arrival.

5.1.5 LBC was the client and Greater London Demolition was the principal contractor for Starcross yard. MDjv and SDSC have not been involved in the works, and verification information was provided by LBC retrospectively. It is stated in the health and safety file that the works were completed in accordance with all planning and regulatory requirements. LBC advised that to their knowledge, no ground contamination was encountered on site during the construction. Topsoil and subsoil were imported to site for use in the soft landscaping areas. LBC

confirmed that the imported topsoil and subsoil complied with the requirements stated in BS 3882 and BS 8601 respectively.

5.1.6 No significant contamination was identified in the approved ground contamination report. Unexpected ACM was encountered during excavation at TEP community hub entrance. The information provided indicates remedial measures aligning with and in broad compliance with the remediation strategy were implemented for works covered in this report, and with actions documented. The information presented in this report provides the various lines of evidence relating to the implementation of the recommended remediation strategy during construction.

6 References

[1] MDjv (2023), “Maria Fidelis Old School Building Ground Contamination Report, Ref No. 1CP01-MDS_ARP-EV-REP-SS08_SL23-990034”.

[2] MDjv (2022), “Construction Skills Centre & Site Accommodation at Former Maria Fidelis School Site Contamination Verification Report, Ref No. 1CP01-MDS_ARP-EV-REP-SS08_SL23-990023”.

[3] High Speed 2 Ltd (2017), “Code of Construction Practice (Annex 1 of the High Speed Rail (London-West Midlands) Environmental Minimum Requirements)”.

[4] CL:AIRE (2016), “Control of Asbestos Regulations 2012, Interpretation for managing and working with asbestos in soil and construction and demolition materials, Industry guidance”.

[5] BS 3882:2015, “Specification for topsoil”.

[6] BS 8601:2013, “Specification for subsoil and requirements for use”.

Appendix A Health and safety documentation

A.1 RAMS for demolition works

A.2 RAMS for drainage and foundation works at TEP community hub entrance

A.3 Starcross yard health and safety file control & reference document and checklist

A.4 Asbestos toolbox talk note and log

A.5 Plan of work for asbestos removal works within the former Maria Fidelis school building

A.6 Certificates for reoccupation for the asbestos removal works within the former Maria Fidelis school building

A.7 Analysis results for the suspected ACM encountered during excavation at TEP community hub entrance

A.8 ASB5 form for the licensable asbestos removal works at TEP community hub entrance

A.9 Plan of work for asbestos removal works at TEP community hub entrance

A.10 Analysis results for verification samples at TEP community hub entrance

A.11 Completion certificate for asbestos removal works at TEP community hub entrance

A.12 Certificate of analysis for airborne fibre monitoring at TEP community hub entrance

A.13 Plan of work for asbestos removal works at Starcross yard

A.14 Completion certificate for asbestos removal works at Starcross yard

A.15 Email correspondence regarding ACM discovery during excavation at TEP community hub entrance

A.16 Example watching brief note

A.17 Email correspondence regarding potential ground contamination encountered during construction

Appendix B Documentation relevant to landscaping and other imported materials

B.1 Email correspondence with MDjv regarding confirmation on quality of imported materials

B.2 Landscaping design and as-built drawings at Starcross yard

B.3 Laboratory test report for imported topsoil at Starcross yard

Appendix C Waste documentation

C.1 Example printout of Optimise

C.2 Spreadsheet containing list of waste disposal records

C.3 Waste carrier information

C.4 Example waste transfer/ consignment notes

C.5 Receiving facility information