Facilities Management

Facilities Management Asbestos Policy & Management Plan

<table>
<thead>
<tr>
<th>PP&amp;T code</th>
<th>FM00174</th>
</tr>
</thead>
<tbody>
<tr>
<td>Version</td>
<td>1.0</td>
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</tr>
<tr>
<td>Owner</td>
<td>Mike Eastwood</td>
</tr>
<tr>
<td>Unit</td>
<td>Facilities Maintenance</td>
</tr>
<tr>
<td>Approved by</td>
<td>Steve Dickson</td>
</tr>
</tbody>
</table>
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SECTION 1 – INTRODUCTION AND SUMMARY

1.1 INTRODUCTION

This document has been produced from information taken from the Type 2 Asbestos Survey (Management Survey) conducted between 2008-2009 and by subsequent additional investigations, incorporating annual re-inspections of Asbestos Containing Materials (ACM's), that have generated asbestos data across the University of Liverpool. The information has been reviewed and amended accordingly with regards to recommendations provided.

The aim of this Asbestos Policy and Asbestos Management Plan (Procedure) is to ensure all reasonable steps are taken to prevent the risk of exposure of staff, students, contractors and visitors to asbestos in a manner that could adversely affect their health. Where employees are required to work in buildings owned or controlled by University of Liverpool, this Asbestos Policy and Asbestos Management Plan must be used as a guide to safe working where there is a risk of exposure to asbestos.

Prior to carrying out work in any area(s) that may contain or conceal ACM’s, always seek professional advice from the dedicated University Project Manger or the FM Asbestos Manager. The buildings asbestos register MUST be read in full prior to commencing any works.

The presence of ACM’s does not in itself constitute a danger. However, they are hazardous when disturbed or damaged and must be treated accordingly.

Reference is made throughout the document to the asbestos register that is held on Planon. The register is an electronic document that is updated on a weekly basis or when required. The University therefore no longer holds hard copies of individual asbestos reports within each building. Reference is therefore always made to the asbestos register and historical data held on the data storage area; VOCAL. Access to the asbestos register can be provided via the FM Asbestos Manger.
SECTION 2 – UNIVERSITY’S ASBESTOS POLICY

2.1 Asbestos Policy

The University of Liverpool (UoL) is committed to providing a safe environment for its students, employees, contractors and visitors, by conducting its business in a way that protects the health, safety and welfare of each individual. The UoL therefore recognizes its responsibility to prevent staff, students, visitors and contractors being exposed to asbestos containing materials.

The University is responsible for:

- Ensuring the effective application of The University’s Asbestos Management Plan, plus all associated Manuals and Procedures to reduce as far as reasonably practicable the risk of exposure to asbestos fibres;

- Ensure that suitable arrangements are in place to enable appropriate staff, who may during the course of their work encounter asbestos, to attend asbestos awareness training appropriate to their area of work and level of responsibility/duty;

- To provide an accurate asbestos register, detailing the location of all known ACM’s within all buildings throughout the University’s estate;

- To implement an effective asbestos management strategy, based on risk assessment, to ensure that all asbestos-containing materials are maintained, sealed and labelled, isolated, or removed safely;

- To apply resources effectively, in a planned and strategic manner, to address asbestos issues and prevent as far as is reasonably practicable, exposure to asbestos fibres;

- To undertake an assessment of the asbestos register and when required, liaise with the FM Asbestos Manager/Approved Asbestos Consultant (AAC) to ensure that all ACM’s have been identified and addressed prior to commissioning/undertaking any form of maintenance/refurbishment work;

- To provide information freely on asbestos, by allowing access to the University’s web based asbestos register;

- To regularly review the Asbestos Policy and Asbestos Management Plan.
SECTION 3 – ASBESTOS INFORMATION

3.1 What is asbestos and where is it found

3.1.1 Introduction

This document outlines the arrangements adopted by the University of Liverpool to prevent, so far as is reasonably practicable, staff, contractors, students and visitors being exposed to asbestos in a manner that could adversely affect their health.

The document provides general guidance on:

- Typical asbestos containing materials
- Health implications
- Roles and responsibilities
- Asbestos control arrangements

Scope

The Policy and Code of Practice applies to all University premises and users of the premises, including staff, contractors, students and visitors.

3.1.3 Fibre Types & Materials

There are predominantly six types of asbestos fibre that have been used in the production of various materials throughout the UK, with these six falling into two separate groups;

- The Serpentine Group, consisting of Chrysotile (white) asbestos, and;
- The Amphibole Group, consisting of Tremolite, Actinolite, Anthophyllite, Crocidolite (blue) and Grunerite (brown).

Chrysotile, Grunerite and Crocidolite were most commonly used throughout the UK and are therefore found within numerous materials/products used up to 1999 throughout the built environment.

Asbestos had a wide range of uses due to its chemical resistance, low conductivity and thermal properties. Their use is now banned except for a few specialist uses where there is no suitable substitute available.

Examples of asbestos containing materials include:

- Thermal Insulation to pipe and duct work;
- Residues of old insulation (either under non-asbestos lagging, or to other surfaces);
- Asbestos Insulation Board (AIB) ceilings/acoustic tiles, partition walls, cladding to service risers, fire breaks, radiator hoods, door panels etc.;
- Floor tiles/linoleum;
- AIB or Cement linings to cold/warm rooms and fume cabinets;
- Asbestos Cement ducting associated with fume cupboards;
- Textured coatings (e.g. Artex);
- Loose asbestos packing where pipes/cables pass through floors and walls,
- Cement Roofing Sheets (flat or corrugated);
- Seals and linings in equipment (e.g. ovens, fire resisting safes), and;
• Other products such as; Brake linings (e.g. in lifts), mastics, textile seals to pipe work, gaskets to pipe work, paper products to pipe work or beneath floor coverings and bituminous products such as acoustic dampers to sink units.

<table>
<thead>
<tr>
<th>Example of vinyl floor covering</th>
<th>AIB lining to fume cupboards</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1.png" alt="Image" /></td>
<td><img src="image2.png" alt="Image" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Cement lining to cold store</th>
<th>Textile seal on oven</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image3.png" alt="Image" /></td>
<td><img src="image4.png" alt="Image" /></td>
</tr>
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</table>

<table>
<thead>
<tr>
<th>Asbestos Insulation Board (AIB)</th>
<th>Cement Flue</th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image5.png" alt="Image" /></td>
<td><img src="image6.png" alt="Image" /></td>
</tr>
</tbody>
</table>
3.2 Health Implications

Asbestos is likely to remain in our buildings for many years to come, however this does not mean that it poses a risk to staff and students. If left intact and undisturbed, asbestos presents no direct risk. However, disturbance of the material may result in the release of asbestos fibres into the environment and this could be detrimental to health.

Breathing in asbestos fibres can lead to the development of three fatal diseases:

- Asbestosis - scarring of the lung leading to shortness of breath
- Lung cancer
- Mesothelioma - cancer of the lining around the lungs and stomach
Each of these diseases has a latency period in order to develop:

- Asbestosis  -  10 - 12 years
- Lung cancer  -  10 – 20 years
- Mesothelioma - 25 – 50 years

If asbestos fibres enter the lungs, they can cause cancer or incurable disease. Consequently the University is committed to ensure that all reasonably practicable steps are taken to prevent exposure of staff, students, contractors or visitors, caused by inadvertent or inadequately controlled disturbance of asbestos.
SECTION 4 – ROLES AND RESPONSIBILITIES

4.1 Duty Holder

Whilst the Vice Chancellor as “duty holder” has ultimate responsibility for health and safety in the University, the following groups/individuals have delegated duties to ensure the risks from asbestos containing materials are kept at as low a level as is reasonably practicable.

4.2 Facilities Management

Facilities Management (FM) have day to day responsibility for managing all aspects of asbestos work on University premises, including maintaining an up to date asbestos register, carrying out annual condition surveys and organising (with the assistance of external framework consultants/ licensed contractors) abatement/remediation works, together with inspection and sampling regimes.

This responsibility extends to ensuring that all contractors/consultants working with/under their control are properly briefed on the location of asbestos prior to commencing work and that appropriate consideration is given to identifying suitable working methods that prevent damage/disturbance of ACM’s.

FM is responsible for the provision of suitable asbestos awareness training to those individuals who as part of their daily activities may come into contact with ACM’s and can also facilitate suitable training for applicable employees within other Departments. FM also ensures as part of the procurement process, that all contractors working at the University have undertaken suitable asbestos awareness training that is applicable to the task they are undertaking.

The University recognises the importance of managing the ACM’s throughout the estate and has emphasised this by the appointment of a full time dedicated Asbestos Manager.

4.2.1 Responsible Person (Asbestos)

The Director of FM acting as “Responsible Person” has overall responsibility for ensuring asbestos is properly managed within Facilities Management.

4.2.2 Deputy Responsible Person (Asbestos)

The Head of Facilities Maintenance and Design Services as “deputy responsible person” advises the Director of FM regarding the resources considered necessary to safely manage ACM’s within the University’s property portfolio and ensures operational compliance with the University’s Asbestos Management Policy and Procedures through the effective application of the resources made available.

The Head of FM & Design Services is also responsible for informing the FM Asbestos Manager of changes in maintenance services in areas throughout the estate.

4.3 Authorised Person – (Asbestos)

The University’s Asbestos Manager is deemed to be the person, who on a day to day basis is responsible for the implementation of the asbestos policy and procedures by:

- Ensuring that the Asbestos Register is kept up to date;
- Coordinating re-inspection’s of all identified or presumed ACM’s at intervals no greater than 12 month periods;
- Overseeing asbestos work contracts including the selection of competent contractors;
- Assessing, revising and recommending management actions in light of re-inspection findings and changes in legislation and good practice;
- Day to day management of asbestos related issues;
- Executing the principal functions of asbestos management by assembling and maintaining a suitably qualified asbestos team consisting of staff, consultants and contractors as appropriate;
- Disseminating information contained in the Asbestos Policy and Asbestos Management Plan to appropriate personnel including Departmental Safety Coordinators and maintenance teams via The Safety Advisory Office;
- Liaison with FM so to ensure that all UoL PM's advise staff and contractors under their control of the presence or otherwise of ACM’s affecting proposed operations and referencing applicable data on the Asbestos Register, prior to commencement of work, as well as ensuring that the Asbestos Register is available to maintenance teams and managers for this purpose;
- Regularly reviewing strategic asbestos management issues and progress against asbestos related actions;
- Holding discussions with members of the asbestos management team, and acting upon the outcome of such discussions as is appropriate via the Asbestos Working Group;
- Coordinating operational requirements specified within the Asbestos Management Plan, including monitoring and inspections, labelling, encapsulation, and asbestos removal;
- Maintaining detailed project records relating to asbestos remedial or investigative works;
- Ensuring appropriate staff have suitable and sufficient initial and refresher training with respect to asbestos issues in conjunction with The FM Health, Safety & Risk Manager;
- Ensuring continued compliance with relevant legislation concerning asbestos;
- Prior to refurbishment/demolition works, coordinated assessments of the work areas should be undertaken, prior to the start of the works to identify any known risk from asbestos. Consulting the Asbestos Register, and ensuring a pre refurbishment/demolition survey (formerly known as a Type 3) is undertaken as appropriate. Subsequently informing relevant staff and contractors of the location of any known asbestos affecting a project;
- Co-ordinating and auditing specialist Contractors to ensure that they are discharging their duties with regard to asbestos issue, and;
- Coordinate actions required in an asbestos related emergency.

With assistance from the FM Health, Safety and Risk Manager, these nominated persons are responsible for ensuring FM local rules and procedures are prepared that comply with all existing Regulations, Approved Codes of Practice and guidance documents.

4.4 The FM Health, Safety & Risk Manager / University Safety Adviser

The University Safety Adviser and Assistant are responsible for:

- Acting as the competent persons to assist the University to undertake the measures necessary to comply with the requirements and prohibitions imposed upon them by or under the relevant asbestos statutory provisions;
- Regularly reviewing the University Asbestos Management Plan;
- Issuing the asbestos reminder document to non FM staff on an annual basis;
- Issuing regular briefings/learning lessons from asbestos incidents, and;
- Maintaining the asbestos web pages on the Safety Advisers website.

4.5 University Project Managers/Supervisors & Maintenance Term Contractors

University Project Managers/Supervisors and MTC Project Managers are responsible for ensuring that they comply with this Management Procedure and are also responsible for:

- Reporting any incidents, breaches of and non-conformance with health and safety to the Health, Safety & Risk Manager;
- Ensuring staff are conversant with asbestos management procedures specific to their work area and attend appropriate asbestos awareness training where required.
- Ensuring the day-to-day compliance with asbestos management within their area of control and those asbestos hazards are reported should they occur;
- Liaise and seek advice from the FM Asbestos Manager (this can be done directly or via the FM Helpdesk) on any proposed changes within the workplace, which may potentially affect the building fabric, to ensure continued compliance with the University Asbestos Management Plan and Asbestos Procedures;
- Ensuring that reports of all asbestos incidents are forwarded to the Asbestos Manager (this can be done directly or via the FM Helpdesk) and that procedures exist for the reporting of asbestos hazards by staff to management and that these reports are acted upon.

Reference should be made to documentation within Appendix D & H that clarifies such responsibilities.

The measured term contractor (MTC) working for FM will be given direct access to the asbestos register and they will be responsible for ensuring that any alteration/refurbishment work they organise is suitably controlled and managed.

Prior to FM staff commissioning works to a contractor, they are required to check the asbestos register, ensure that the risk assessment and method statement prepared by the contractor encompasses this information and that the work is planned and managed in a way that either prevents disturbance to the asbestos, or ensures that the asbestos is removed prior to the works commencing.

### 4.6 Staff and Students

All building alterations and refurbishment work must be organised and coordinated by Facilities Management. Under no circumstances should staff or students be allowed to undertake this type of work. If alterations/refurbishments are required, then FM must be contacted and the requirements discussed.

Staff & students can view the requirements placed upon them via the University’s Asbestos Management Plan following the below link:

[http://www.liv.ac.uk/media/livacuk/safety/documentsguidance/codesofpractice](http://www.liv.ac.uk/media/livacuk/safety/documentsguidance/codesofpractice)

### 4.7 Approved Asbestos Consultant

The Approved Asbestos Consultant has been appointed by the University under a term contract agreement and provide expert advice and information in regard to managing ACM’s across the estate.

The AAC provides a multitude of services that are accredited by the United Kingdom Accreditation Service (UKAS) and offer such services as and when required:

- The analysis of bulk materials for the presence of asbestos;
- Air monitoring
  - Background monitoring
  - Leakage testing
  - Personal monitoring
  - Air clearance testing
- Management and Refurbishment & Demolition Surveys
The AAC will adhere to the procedures set by the University and those dictated by the management Plan.

4.8 Asbestos Framework Contractors

Framework contractors should adhere to the terms of the contract and the details of the management Policy/Procedure at all times. The framework contractors are appointed under a term contract by The University.

4.9 Contractors

Contractors working for or on behalf of UOL are responsible for:

- Ensuring that all employees under their control abide by the rules and conditions set out by UOL within the Asbestos Management Plan and any other associated documentation
- Ensuring that all employees under their control reference the Asbestos Register and understand its content and actions required. This must be done prior to any works commencing
- Before commencing any work the contractor must comply with current legislation in relation to safe working with and around asbestos containing materials.
- If asbestos is uncovered during the works, the contractor must stop work immediately and report it to the FM Asbestos Manager (This can be done directly or via the FM Helpdesk),
- Ensure that all employees under their control are provided with adequate equipment, information, training and instruction to enable them to work with, or adjacent to, ACM’s without risk to health and safety.
SECTION 5 - SUMMARY OF THE CONTROL OF ASBESTOS REGULATIONS 2012 (CAR 2012)

5.1 Responsibility of Duty Holders

On the 6th April 2012, The Control of Asbestos Regulations 2012 came in to force. These regulations, place a responsibility on ‘Duty Holders’ to manage the risks associated with asbestos by either:

1. Finding out if there is asbestos within their premises, its amount and what condition it is in. This is usually undertaken by carrying out an Asbestos Survey of which there are two types (as defined within HSG 264):
   - A Management Asbestos Survey-- involves the collection of representative samples that are analysed for the presence of asbestos. Samples are not taken nor areas accessed if damage would occur to the building.
   - Refurbishment/Demolition Asbestos Survey – this type of survey is used to locate and describe, as far as reasonably practicable, all ACM’s in a building and may involve destructive inspection, as necessary, to gain access to all areas. This type of survey may also be required for plant replacement

2. OR presuming that all materials contain asbestos unless they have strong evidence that they do not

Once either an HSG 264 compliant asbestos survey has been completed or a record of all presumed asbestos containing materials made, the following actions should be implemented:

   - Recording the location and condition of materials containing asbestos via an Asbestos Register
   - Assessing the risk from the material and developing an Asbestos Management Plan which sets out in detail how the ‘Duty Holder’ is going to manage the risk from this material
   - Implementing and maintaining the Asbestos Management Plan which is likely to involve regular monitoring of the asbestos condition, and encapsulation, repair or removal if required
   - Maintaining the Asbestos Register

Providing information on the location and condition of the material to anyone who is liable to work on or disturb it.

All ‘Duty Holders’ must comply with these new Regulations in full since 21st May 2004.

The ‘Duty Holder’ under The Control of Asbestos Regulations 2012, is the person/organisation who legally have maintenance and repair responsibilities for any part of a premise.

Under the current regulations all employers have a legal duty to ensure that employees or other persons are not exposed to asbestos containing materials.
Accurate information on asbestos containing materials must be provided by ‘The Duty Holder’ under Regulation 4 as detailed in the Control of Asbestos at Regulations (CAR) 2012 to anyone at risk from asbestos.

All personnel who carry out maintenance, refurbishment etc. must be made aware of the Asbestos Registers. This must prevent delays to schedules and prevent accidental asbestos exposure.

5.2 Identification and Condition of Asbestos Containing Materials (ACM’s)

Whilst it is not the policy of The UOL to remove all ACM’s that are in good condition and which present an insignificant risk to the health of building occupants, The University has developed a 10 year programme of asbestos abatement works so to progress the removal of such ACM’s as budget dictates. However, all known/accessible damaged ACM’s will be sealed, encapsulated or removed.

5.3 Material and Priority Assessments

In order to assess the risk from any ACM, two risk assessments are undertaken. One considers the properties and condition of the ACM (1), the second looks at the potential for exposure (2).

HSG 264 Materials Assessment Score - considers the asbestos bearing materials form, condition and any applied surface treatment.

These scores are categorised as follows:

- Category A (>10) are regarded as having a high potential to release fibres if disturbed
- Category B (7 – 9) are regarded as having medium potential to release fibres if disturbed.
- Category C (5 & 6) are regarded as having low potential to release fibres if disturbed.
- Category D (>4) are regarded as having very low potential to release fibres if disturbed.

Asbestos debris is automatically assessed as Category A.

Duty Holders Priority Score (CAR 2012 Asbestos Management Priority Audit) - considers risk potential by analysing:

- Occupant activity
- Likelihood of disturbance
- Accessibility
- Amount and extent of asbestos bearing materials present
- Number of occupants
- Frequency of area use
- Average time of use
- Maintenance activity
- Maintenance frequency
Table 1

<table>
<thead>
<tr>
<th>Assessment factor</th>
<th>Score</th>
<th>Examples of score variables</th>
</tr>
</thead>
<tbody>
<tr>
<td>Normal occupant activity</td>
<td></td>
<td>Rare disturbance activity (e.g. little used store room)</td>
</tr>
<tr>
<td>Main type of activity in area</td>
<td></td>
<td>Low disturbance activities (e.g. office type activity)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Periodic disturbance (e.g. industrial or vehicular activity which may contact ACM’s)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>High levels of disturbance (e.g. fire door with asbestos insulating board sheet in constant use)</td>
</tr>
<tr>
<td>Secondary activities for area</td>
<td>As above</td>
<td></td>
</tr>
<tr>
<td>Likelihood of disturbance</td>
<td></td>
<td>Outdoors</td>
</tr>
<tr>
<td>Location</td>
<td></td>
<td>Large rooms or well-ventilated areas</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Rooms up to 100m²</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Confined spaces</td>
</tr>
<tr>
<td>Accessibility</td>
<td></td>
<td>Usually inaccessible or unlikely to be disturbed</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Occasionally likely to be disturbed</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Easily disturbed</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Routinely disturbed</td>
</tr>
<tr>
<td>Extent/amount</td>
<td></td>
<td>Small amounts or items (e.g. strings, gaskets)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&lt;10 m² to &lt;50 m² or &lt;10 m to &lt;50 m pipe run</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;10 m² or &lt;10 m pipe run</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;50 m² or &gt;50 m pipe run</td>
</tr>
<tr>
<td>Human exposure potential</td>
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<td>None</td>
</tr>
<tr>
<td>Number of occupants</td>
<td></td>
<td>1 to 3</td>
</tr>
<tr>
<td></td>
<td></td>
<td>4 to 10</td>
</tr>
<tr>
<td></td>
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<td>&gt;10</td>
</tr>
<tr>
<td>Frequency of use of area</td>
<td></td>
<td>Infrequent</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Monthly</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Weekly</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Daily</td>
</tr>
<tr>
<td>Average time area is in use</td>
<td></td>
<td>&lt;1 hour</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;1 to &lt;3 hours</td>
</tr>
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<td></td>
<td></td>
<td>&gt;3 to &lt;6 hours</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;6 hours</td>
</tr>
<tr>
<td>Maintenance activity</td>
<td></td>
<td>Minor disturbance (e.g. possibility of contact when gaining access)</td>
</tr>
<tr>
<td>Type of maintenance activity</td>
<td></td>
<td>Low disturbance (e.g. changing light bulbs in asbestos insulating board ceiling)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Medium disturbance (e.g. lifting one or two asbestos insulating board ceiling tiles to access a valve)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>High levels of disturbance (e.g. removing a number of asbestos insulating board ceiling tiles to replace a valve or for re-cabling)</td>
</tr>
<tr>
<td>Frequency of maintenance activity</td>
<td></td>
<td>ACM unlikely to be disturbed for maintenance</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&lt;1 per year</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;1 per year</td>
</tr>
<tr>
<td></td>
<td></td>
<td>&gt;1 per month</td>
</tr>
</tbody>
</table>

Once scores for each of the above risk factors have been assessed, these are added together to achieve a 'Total Score'. This is then related to the following Priority Code assessment figures to achieve a 'Risk Priority (1, 2, 3, 4)' as shown in Table 2.
<table>
<thead>
<tr>
<th>Total Score</th>
<th>Risk Priority</th>
<th>Recommendation</th>
</tr>
</thead>
<tbody>
<tr>
<td>More than 17</td>
<td>Priority 1 (Highest Risk)</td>
<td>It is likely in a situation with such a high rating that individuals are currently being exposed to some level of asbestos fibre contamination. Situations falling within this category warrant urgent consideration. In most circumstances, immediate plans for the removal of the ACM concerned must be implemented, or as a minimum, the rapid sealing of the affected area.</td>
</tr>
<tr>
<td>13 to 16</td>
<td>Priority 2</td>
<td>Situations within this category still warrant urgent consideration, in that any slight deterioration in any one of a number of contributory factors must result in unacceptable deterioration within a short passage of time. In these situations, it is therefore necessary for the ACM to be removed on a programmed basis but usually within a year. In the mean time, emergency repair and sealing operations must be undertaken where any deterioration or damage occurs.</td>
</tr>
<tr>
<td>8 to 12</td>
<td>Priority 3</td>
<td>Situations within this category do not pose an imminent risk and likelihood of fibre release is low under existing conditions. It would be most appropriate within this category to monitor the situation, as deterioration must occur with the passage of time. It is recommended that situations within this category must be inspected on a six-monthly basis to ascertain any change in circumstances which could require reassessment of priority rating into the priority 2 category. Consider removal if the item falls within a demolition or major refurbishment area and works are likely to disturb the material.</td>
</tr>
<tr>
<td>Less than 8</td>
<td>Priority 4 (Lowest Risk)</td>
<td>Situations within this category are low priority. The situation must be monitored on the basis of a one-year inspection cycle to ascertain any change to priority rating. Manage and consider removal if the item falls within a demolition or major refurbishment area and works are likely to disturb the material.</td>
</tr>
</tbody>
</table>

Asbestos risk scores and priorities for each identified or suspected ACM are detailed in the Asbestos Register which is held on a web based data base.

Any change in property usage or maintenance activities must prompt a formal reassessment which may redefine risk scores and priorities. The Asbestos Register must then be updated. It is the duty of the Head of FM to advise the Asbestos Manager of any change of maintenance activities and the duty of the Estates Manager to clarify any change in property usage.

5.4 The Asbestos Register and Action Plan

The Asbestos Register that is held on the UOL interactive database (PLANON) forms the basis of the Asbestos Management Plan and is used to determine management and control actions required e.g. labelling, monitoring, encapsulation, or removal. The Register is maintained by the Asbestos Manager within the FM team, and is freely available to all relevant parties. Information taken from the Asbestos Register is therefore uncontrolled and the terms & conditions clarify such. An electronic copy of the Asbestos Management Plan is available from the Health & Safety and FM web site and is also held as an approved document on the internal PP&T Files.

Where no information regarding ACM’s is available e.g. areas could not be accessed during Asbestos Surveys, it must be presumed that ACM’s are present. Prior to any refurbishment or maintenance works in these areas, which could damage any potential ACM’s, a full survey must be undertaken that should be suitable for purpose.
SECTION 6 - ASBESTOS CONTROL ARRANGEMENTS

6.1 Licensed Asbestos Removal Contractors

Any work involving asbestos will be carried out by licensed asbestos contractors. The FM Department has established a framework for Asbestos Remediation Contractors to simplify the procurement process for works/services necessary to execute the removal or repair of asbestos containing materials.

The FM Asbestos Manager/UoL Project Managers will co-ordinate all aspects of asbestos work including abatement/remediation works undertaken by licensed asbestos contractors, together with all investigative and reassurance activities that are undertaken by the University’s Appointed Asbestos Consultants.

Information relating to any form of asbestos remediation can be referred back to the FM Asbestos Manager for clarification. Reference to Appendix I should be made for the contact details of applicable parties.

6.2 Site Survey and Register

FM has carried out an Asbestos Management (Type 2) survey across its building portfolio in order to identify ACM’s and clarify the condition of such. It should be noted, that whilst the Management Survey will have identified a vast amount of the ACM’s previously utilised in building materials across the estate, ACM’s will remain undetected in areas that are outside of the parameters of a Management Survey and within those areas that were not possible to access at the time of the survey. Given these restrictions, it is quite probable that ACM’s will remain undetected within the building fabric/structure throughout the estate.

The FM management process dictates, that all planned/reactive maintenance/refurbishment work that can be considered to be of an intrusive nature, i.e. requires removal of hatches, ceiling tiles, panelling, etc., requires that a more detailed asbestos survey (Refurbishment & Demolition Survey) be conducted, to assess for ACM’s prior to such work commencing.

All asbestos investigations/sampling are to be undertaken by the University’s Approved Asbestos Consultants, who are fully qualified to undertake such works. These works must be coordinated by the University’s FM Asbestos Manager or UoL PM and no other University staff member shall be permitted to commission such survey works or obtain samples for assessment purposes.

A full re-inspection survey of known/visible/accessible ACM’s across University premises is carried out annually to assess the condition of asbestos. Where asbestos is identified as having degraded/become damaged and following assessment is considered to be in an unsatisfactory condition, it will be repaired or removed. When asbestos is removed or encapsulated, the asbestos register is updated to reflect the amendments and all associated certification is recorded on the asbestos register. The register is a web based document and is available to both FM and Departmental staff by contacting the FM Asbestos Manager, who can provide access details.

6.3 Labelling

The Asbestos Management Policy requires asbestos labels to be used were appropriate throughout the estate. The labels identify not only those materials that are known to contain asbestos fibre, but also clarify those areas where access has been restricted due to the presence of asbestos and locations were ACM’s exist to the rear of non asbestos materials.
All ACM’s in the University (or where asbestos is presumed) will therefore be marked with one of the following labels:

- **No access to void, Contact Facilities Management Department**: these labels will be adhered to areas such as ceiling and duct cavities where it has not been possible to undertake survey works. Access into these areas remains prohibited until such time intrusive asbestos investigations can be undertaken.

- **Sealed Asbestos in void, Proceed with Caution**: these labels will be displayed to the surfaces of non asbestos containing materials, where asbestos has been identified but is in a sealed, safe condition within a void area. The warning alerts those required to access the void for maintenance purposes etc. of the presence of asbestos and therefore to ensure that appropriate precautions are adopted so as not to disturb the material. It should be noted that, ACM’s may be adhered to the rear of the Non asbestos access panel/product.

- **This Equipment Contains Asbestos; Contact Facilities Management**: certain pieces of equipment that are used within numerous Departments throughout the University are known to contain asbestos materials. These labels will be attached to this equipment to warn users of the potential risk if opened or used in an uncontrolled manner. They will also alert users to the fact to monitor the condition of the asbestos and report any noticeable deterioration to the University’s Asbestos Manager.

- **Do Not Disturb This Material; Contact Facilities Management**: any asbestos containing materials will be marked with this label. Care should therefore be taken not to disturb material marked with such a label at any time. Should damage or deterioration to such materials be observed, then this should be reported to the Asbestos Manager immediately and the area isolated until such time that the area is deemed safe for normal occupation by the Asbestos Manager.

- **Proceed With Caution; Presumed Asbestos**: Due to varying prohibitions, a number of areas across the estate may not have been fully accessed during the Asbestos Management survey. However, in many cases, there may be suitable evidence available to strongly presume the presence of asbestos material in these locations. It is therefore essential that, prior to accessing areas denoted with such labels, further more intrusive investigations be commissioned.
All staff, students and contractors are expected to familiarise themselves with the labels and adhere to the instructions.

Where rooms have ceiling tiles which contain asbestos, these will be highlighted by placing a single warning label on a tile near the perimeter of each area and not on each individual tile. Consequently, anybody who has to lift or remove a tile as part of their work should initially assess the asbestos register or seek further information from their supervisor prior to arriving on site. They should also ensure that checks for labels are made across the whole ceiling area.

NB - there is always a very small risk that asbestos may not be properly identified or that a warning label may have been accidently removed/covered, so suspicious material should not be ignored. If in doubt, contact the FM Asbestos Manager.

NB – other asbestos related labels will be found at various sites in buildings (see opposite). These indicate where material samples have been taken from for analysis and do not immediately indicate the presence of asbestos. If asbestos is found, then one of the above labels should also be visible in addition to the sample label.

Signage may also be observed to entrance areas, either prohibiting, or restricting access into an area, that due to unforeseen events, has resulted in ACM’s becoming damaged and therefore giving rise to the possibility of uncontrolled exposure to asbestos fibre. Such areas will be fitted with a hasp and staple and locked off together with the fixing of one of the below signs. The type of sign fitted will be dependent upon the severity of the contamination.

6.4 Notification of Work

The Asbestos Manager/University Project Manager, will ensure that any planned maintenance/refurbishment work involving the abatement/remediation of asbestos materials, is brought to the attention of the Head of Department/Institute & School Managers and/or local Departmental Safety Coordinators prior to the work commencing. Where requested, a letter detailing the proposed works can be issued prior to the commencement of the project.

A briefing will also take place with key departmental personnel to outline the scope of the work, the likely timescales and what precautions will be in place to protect staff from asbestos exposure. This does not apply to emergency situations requiring immediate action, although the local Safety Coordinator should be informed of the situation at the earliest convenience once it has been dealt with.
6.5 Reporting Suspected Asbestos Damage

If staff or contractors discover what they believe to be damaged Asbestos containing materials, then they should ensure that appropriate action is taken to secure the room/area and prevent further access. Once secured, the Asbestos Manager should be contacted and informed either directly or via the FM Helpdesk. No attempt should be made to move or clean up suspected asbestos as this could give rise to airborne fibres. Depending on the Asbestos Manager’s assessment of the situation, consideration will be given to displaying temporary signage and/or partially or completely evacuating the area. Arrangements will then be made to carry out appropriate sampling and, if necessary, further remedial action.

NB - In exceptional cases, designated staff may be allowed to enter areas containing friable asbestos to attend to plant. This however will only be permitted under strict controls, including a risk assessment of the proposed work and the wearing of appropriate coveralls and respiratory protective equipment. This applies even in operational emergency situations and reference should be made to Appendix F.

6.6 Information, Instruction and Training

All FM technical and maintenance staff and others as identified by the FM Asbestos Manager who may need to take the precautions in this plan into account, will be supplied with a copy of this document and will be required to attend asbestos awareness training sessions at the level deemed to be applicable for their role/duties. Access to the document will be available via the PP&T index; FM00174.

All applicable University staff will be reminded annually of asbestos risks and the importance of not disturbing asbestos via the “Asbestos reminder document” that shall be issued via the University’s Safety Advisor.

6.7 Updating the Asbestos Register

The FM Asbestos Manger is responsible for updating the web based asbestos register that is held on a module of Planon as is required, as a result of further investigations, sampling, remedial works, inspections, or a change in property usage or maintenance activities which may affect assigned priority ratings. The data entered into the asbestos register is audited so to ensure the accuracy of such. Reference can be made to the quality process within Appendix C.

6.8 Monitoring and Re-inspection Regime

All ACM’s left in situ must be re-inspected by competent persons on an annual basis unless otherwise determined by risk assessment and detailed in the Asbestos Register. This is undertaken in order to ensure that the condition of the material remains unchanged. Information collated during these inspections must be used to update the Asbestos Register, and appropriate action taken regarding any recommendations made. Where higher risk ACM’s remain present in areas subject to day to day activities of staff or visitors, then inspection for obvious signs of disturbance shall be undertaken by the FM Asbestos Manger or the approved asbestos consultant at regular intervals, commensurate with the intensity of use. Areas subject only to maintenance activity will be inspected prior to the commencement of any activity and at periods recommended by the register.

6.9 Dissemination of Information

The asbestos register is freely accessible to all applicable staff that manage work areas, undertake maintenance/refurbishment or installation work or manage any works which involve disturbing the building fabric or any services within.

Contractors who work on University sites have to follow procedures which involve prior authorisation of risk assessments and confirmation of adequate asbestos training. Information from the relevant section
of the asbestos register is provided to ensure that appropriate precautions are taken and any asbestos risks appropriately controlled. Initially this should be controlled by the UoL representative responsible for authorising the works, with any necessary assistance provided by the Asbestos Manager.

All employees including maintenance personnel who may be affected by the presence of ACM’s or may disturb asbestos during their work must be notified of its presence.

6.10 Training

Appropriate training must be provided for those involved in the operation of the Asbestos Management Plan and those whose normal duties may bring them into contact with ACM’s. In addition, so far as reasonably practicable, appropriate maintenance and security contractors employed on term contracts, must also be required to attend training sessions. The FM Asbestos Manager is responsible for identifying, monitoring and coordinating this training.

Training should include:

- Understanding the contents and location of the asbestos register
- Understanding of the use of asbestos in buildings
- How to avoid exposure
- Risks posed to staff and contractors by exposure to asbestos
- What to do if you find asbestos
- How to ensure that work is not undertaken on any material without knowing if it contains asbestos
- The procedures to follow before any work is commenced where ACM’s could be disturbed, including the permit to work system

Individuals who are required to manage asbestos removal contractors should be competent in managing such contractors and should be working towards achieving the BOHS P405 module in Management of Asbestos in Buildings.

The University FM Department operates a complex Training Matrix that is managed by the FM Health Safety & Risk Manager. The Matrix clearly identifies all FM employees, their role and requirements of such, that constitute their daily activities. Suitable/applicable training is then identified for each individual and monitored/reviewed on an annual basis, so to ensure that any changes in the individual’s role profile, that may necessitate the need for further training, are identified, recorded on the matrix and implemented as is required.

6.11 Emergency Procedures

If anyone suspects that an ACM has been disturbed, the following action must be taken immediately:

- Evacuate the area without causing alarm, and assemble evacuees locally in quarantine outside the area.
- Immediately report to the Asbestos Manager or Health & Safety Manager (this can be done via the FM Helpdesk) who shall instruct (if required) the maintenance engineers to close down the air handling plant serving the area and that to the remainder of the building. The above shall consult the Asbestos Register for the area and liaise with the appropriate Department and FM personnel.
- Charge an individual with the task of prohibiting entry to the area and isolate the area until a full assessment has been completed e.g. close and tape around the doors to the room.
Asbestos Manager to ensure the approved asbestos consultant is appointed to give advice on making the area safe and undertake a full assessment of the situation which may include airborne monitoring to assess the extent of surface and airborne contamination.

Asbestos Manager to instruct a framework asbestos contractor to attend site in accordance with the UoL emergency response programme and carry out appropriate remediation works.

Asbestos Manager/ Health & Safety Manager to record, if possible, the names of all persons potentially affected and relay information of potential exposure to all persons who may be affected.

Asbestos Manager to assemble the emergency response teams. Exposed persons to be given Tyvek coveralls to enable transit thorough the building to shower areas.

Clothing and tools to be double-bagged and tagged pending the outcome of the assessment within sealed polythene bags which denote the location of exposure and the personnel involved.

Personnel exposed are to shower to remove potential fibres in hair and on body.

The shower room itself shall be used only by contaminated persons and sealed closed with tape for decontamination after final use. Should a DCU be present on campus, then the DCU will be repositioned so to allow the contaminated personnel to shower accordingly.

Area to be cleaned of dust and fibres by an approved contractor in accordance with HSE guidance, including air monitoring.

The University Safety Advisors Office is to notify the Health and Safety Executive as directed by health and safety personnel.

6.12 Procedures for Previously Unidentified Asbestos

In all but the simplest of building types, an Asbestos Survey is unlikely to identify the location of all ACM’s. Personnel involved in refurbishment or maintenance works must be aware of the limitations of an Asbestos Survey and when planning projects, must budget both sufficient time and funds to deal with hidden or trapped material which can often be concealed within a buildings structure or in previously un-accessed voids etc.

It is the responsibility of all staff to report any suspected or damaged ACM’s to the Asbestos Manager who will then inform the Head of FM and assist in the abatement of such materials. Training on the recognition of suspect asbestos materials must be provided to appropriate personnel.

6.13 Refurbishment Work, Demolition and Plant Replacement

Prior to any refurbishment work which could expose parts of the structure or fabric that could not be seen during the Management Survey (previously known as a Type 2 Survey), demolition work or plant replacement, then a trained asbestos surveyor from the approved asbestos consultancy, shall take samples and undertake a refurbishment/demolition survey (previously referred to as a Type 3 Asbestos survey). Following surveys, recommendations made must be incorporated into the project works. This may include asbestos removal works. The UoL PM is required to complete the Pre Asbestos Survey Questionnaire in the presence of the AAC, so to accurately record the prescribed survey works.

If suspect materials are discovered during the course of project works, the project manager must halt the works in that area, inform the FM Asbestos Manager either directly or via the FM Helpdesk and take
any action necessary which may include informing staff and the building occupants and clearing the site. Where work accidentally disturbs suspected ACM’s see section 6.11.

Where works fall under the Construction (Design and Management) Regulations 2007, relevant asbestos information must be provided to the CDM Co-ordinator.

On completion of any remedial works, the project manager must submit any relevant documentation relating to asbestos issues to the Asbestos Manager, who must update the Asbestos Register as necessary. A copy of this information must also be included in the Health and Safety File if applicable.

6.14 Contractor Awareness

Where a contractor is given site control of an entire building or part of a building, the relevant Asbestos Register and Asbestos Survey Reports must be provided to them by the UoL PM prior to commencement of works for the contractor to review. Information contained in this documentation must be disseminated to all staff and sub-contractors by the contractor and a record kept of this communication. The Transfer of Asbestos Related Information Form contained in Appendix A, should be completed by appropriate Department for UOL Personnel, prior to commencement of work.

Where a contractor is asked to undertake specific works but UOL retains control of the building/area, the UoL PM must review the Asbestos Register and advise the contractor on necessary actions required. These must then be communicated to contractor staff and a copy of the register given to the contractor to make his own review. A record shall be kept of this communication.

Where applicable, drawings and plans supplied to contractors must identify the presence or suspected presence of ACM’s.

6.15 Asbestos Removal and Disposal

Removal of ACM’s must be undertaken under the control of the dedicated UoL PM, with when required, interaction from the Asbestos Manager. ACM’s should only be removed by The University’s asbestos framework contractors, who are licensed by the Health and Safety Executive to undertake such works. Non-licence work should also be undertaken by The University’s asbestos framework contractors, utilising appropriate tools and personal protective equipment. Access to the asbestos removal area is prohibited until such time as a ‘certificate of re-occupation’ has been issued by a UKAS accredited analyst.

All waste that contains asbestos must be disposed of under the current regulations imposed by the Environment Agency, by an approved asbestos waste disposal contractor. Appropriate records of all disposals must be obtained by the UoL PM and uploaded onto the Asbestos Register. Refer to processes in Appendix D. This documentation must be made available upon request by appropriate governing bodies (i.e. HSE).

6.16 Monitoring and Review of the Asbestos Management Plan

This Asbestos Management Plan must be reviewed as is required, but at least bi annually so to ensure the information it contains remains correct and that the objectives specified are being met. This review is undertaken by the Asbestos Manager.

Items to be covered in such monitoring include:

- The level of information provided in the Asbestos Register and how it is being updated
- The condition of ACM’s left in situ, the adequacy and frequency of re-inspections, and compliance with the recommendations detailed in the Asbestos Register
- The provision of information to those who need it
- The effectiveness of the procedures for the removal of asbestos
- Progress on labelling ACM’s
- Communication and training of appropriate staff and contractors
- Recording of incidents and accidents, and lessons learned

6.17 The Asbestos Register

The Asbestos Register is based on the information derived from Management and Refurbishment/Demolition surveys. Further investigations may be required in addition to an R&D survey before commencing demolition, refurbishment or decommissioning works as the site of works may dictate.

The Asbestos Register has been compiled in accordance with the Health and Safety Executive’s guidance document HSG 264, the Control of Asbestos at Work Regulations (CAR) 2012 and guidance document HSG 227, Managing Asbestos in Premises.

The asbestos Register is updated on a weekly basis and undergoes a quality control assessment during the upload of data. The register is a web based database that can be accessed by any individual as is required, refer to Appendix B.

6.18 Unknown and Un-surveyed Areas

Where no information regarding ACM’s is available, i.e. within areas that were not accessed during the asbestos survey works, it must be presumed that ACM’s are present. This is clearly indicated within the asbestos register. It is important that these are reviewed in addition to the Asbestos Register prior to commencing any form of maintenance/refurbishment works. It should however be noted, that the University has made all efforts to access such areas but, a number of such areas do remain due to certain restrictions.

Personnel must be aware of the limitations of an Asbestos Survey and when planning projects must budget both sufficient time and funds to deal with hidden or trapped material which can often be concealed within a buildings structure or in previously un-accessed voids etc. Due diligence must be instilled in workforces and used when disturbing any materials.
Appendices
APPENDIX A – TRANSFER OF ASBESTOS RELATED INFORMATION
**TRANSFER OF ASBESTOS RELATED INFORMATION**

**UNIVERSITY OF LIVERPOOL: Building Name**

**TRANSFER OF ASBESTOS RELATED INFORMATION**

This proforma has been developed to record the appropriate transfer of information between the UOL and principal/nominated contractors in respect of ACM’s

<table>
<thead>
<tr>
<th>To be completed by the a representative of the UOL</th>
<th>Tick Box</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1</strong> I confirm that under the Construction (Design and Management) Regulations 2007, the Pre-Tender Health and Safety Plan has, so far as reasonably practicable, identified the presence and location of known or suspected ACM’s</td>
<td></td>
</tr>
<tr>
<td><strong>2</strong> Notification has been sent to the relevant contractor indicating the presence of known or suspected ACM’s in the building/room/area where they must be undertaking work. Copies of relevant sections of the Asbestos Register and Asbestos Survey Reports have also been provided/access to the UoL Asbestos Register issued.</td>
<td></td>
</tr>
<tr>
<td><strong>3</strong> The contractor has been informed that the Asbestos Register is a non-exhaustive record, therefore, due diligence must be applied to ensure that any suspect materials are not disturbed.</td>
<td></td>
</tr>
<tr>
<td><strong>4</strong> The contractor has been informed that any suspected materials, previously undetected, must be notified immediately to the UoL Project Manager/Asbestos Manager.</td>
<td></td>
</tr>
</tbody>
</table>

**Contract Title:**

**Signature:**

**Position:**

**Date:**
APPENDIX B – ASBESTOS REGISTER

Access to the asbestos register is available as is required and details can be obtained via the Asbestos Manager, either directly or via the FM Helpdesk on 0151 794 3000.
APPENDIX C – QUALITY CONTROL PROCEDURE FOR ASBESTOS REGISTER
QUALITY CONTROL PROCEDURE FOR ASBESTOS REGISTER

Survey/Inspection Reporting

Survey
  - Letter Report
  - Bulk Certificates
  - Drawings

Reinspection
  - Letter Report
  - Drawings

Sampling
  - Bulk Certificate

Planon Reporting

Review:
- Scope of works specified in report
- Scope of works as agreed
- Materials recorded as per bulk cert and SP's
- Drawings as per site notes
- Appropriate recommendations made
- Formatting correct
- Authorised, Signed & Issued to Client

PDF Report Issued via Email

Principal Consultant or Above
Asbestos Management Policy/Procedure 2012 (V0)
Planon Reporting

Project Data

Collate:
- Items newly identified
- Items condition change
- Items removed
- Recorded in Planon Spreadsheet
- Recorded on Relevant Site Plan

Bi-Weekly Planon Update:
- Spreadsheets
- Drawings
- Certificates

Issued via CD, Upload to VOCAL or USB flashdrive

Upload/Import to Planon:
- Spreadsheets
- Drawings
- Certificates

Planon Test Data
100% Review:
- Planon Error Log
- Hyperlink Checker
- Macro

Planon Live Data
10% Review:
- Assets
- Photos
- Certificates
- Drawings

Review:
- 10% of Assets
- Photos
- Certificates
- Drawings

Principal Consultant or Above

Project Manager & Technical Administrator

WYG (EC or TA) at Bedford House

University of Liverpool Asbestos Manager

VOCAL
Virtual Online Collaboration at Liverpool
APPENDIX D – MANAGEMENT OF ASBESTOS REGISTER DURING MAINTENANCE & PROJECTS

Purpose and application of the document:

The purpose of this document is to provide guidance to Project Managers to ensure the University of Liverpool actively manages the asbestos register during: refurbishment, demolition and maintenance activities.

Process owner: Date:

Name/Title of authoriser: Michael Eastwood Asbestos Manager

Authorised by: Date:

Name/Title of authoriser: Martin Foster Head of Facilities Maintenance

Any proposed changes or improvement document should be raised on a change request form

Document History

<table>
<thead>
<tr>
<th>Revision</th>
<th>Date</th>
<th>Reason for change</th>
<th>Author</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>June 10</td>
<td>Amendments</td>
<td>H&amp;S Team</td>
</tr>
<tr>
<td>2</td>
<td>August 10</td>
<td>New position (Asbestos Manager)</td>
<td>H&amp;S Team</td>
</tr>
<tr>
<td>3</td>
<td>Feb 13</td>
<td>Amendments to CAR Regs 2012</td>
<td>Asbestos Manager</td>
</tr>
</tbody>
</table>

Asbestos Management Policy/Procedure 2012 (V0) 36
ii The Purpose

The purpose of this document is to ensure The University of Liverpool Facilities Management Department actively manages the asbestos register during refurbishment, demolition and maintenance activities.
iii Scope

To provide guidance to all University of Liverpool personal and consultants engaged in refurbishment, demolition and maintenance activities, to ensure the asbestos register is suitably maintained.

v Process

1 Construction / Maintenance work

A project includes or is intended to include construction and/or maintenance work, which includes all planning, design, management or other work involved in a project until the end of the construction phase and/or maintenance period.

“Construction work” means the carrying out of any building, civil engineering or engineering work and includes:

a) the construction, alteration, conversion, fitting out, commissioning, renovation, repair, upkeep, redecoration or other maintenance (including cleaning which involves the use of water or an abrasive at high pressure or the use of corrosive or toxic substances), decommissioning, demolition or dismantling of a structure;

b) the preparation for an intended structure, including site clearance, exploration, investigation (but not site survey) and excavation, and the clearance or preparation of the site or structure for use or occupation at its conclusion;

c) the assembly on site of prefabricated elements to form a structure or the disassembly on site of prefabricated elements which, immediately before such disassembly, formed a structure;

d) the removal of a structure or of any product or waste resulting from demolition or dismantling of a structure or from disassembly of prefabricated elements which immediately before such disassembly formed such a structure; and

e) the installation, commissioning, maintenance, repair or removal of mechanical, electrical, gas, compressed air, hydraulic, telecommunications, computer or similar services which are normally fixed within or to a structure, but does not include the exploration for or extraction of mineral resources or activities preparatory thereto carried out at a place where such exploration or extraction is carried out.

2 Does the work involve demolition or intrusive works?

Were any project involves demolition or intrusive works, a localised refurbishment and demolition survey (Type 3) must be commissioned. Further advice on the scope of a survey can be sought from the Asbestos Manager and/or FM Safety Team.

3 Check asbestos register

Interrogate the PLANON asbestos TSI to establish if the relevant asbestos information is available resulting from the management survey (Type 2). Should the planned works warrant further investigations; such as a localised demolition/refurbishment survey (Type 3, then such investigations should be undertaken prior to proceeding to section 4.

If asbestos has been identified, which effects the progression of your project, remediation works must be undertaken, to manage exposure.

3.1 Summary of Management Survey & Demolition/Refurbishment Surveys

a. Undertake refurbishment and demolition survey (type 3) and update asbestos register

Were any demolition or intrusive works is required a localised refurbishment and demolition survey (Type 3) must be sought. Subsequently the asbestos register must be updated with the survey information; see section 8, update asbestos register.

b. Undertake Management Survey (type 2) and update asbestos register
Were no information is available and demolition or intrusive works are not required a localised Management Survey (Type 3) must be sought. Subsequently the asbestos register must be updated with the survey information; see section 8, update asbestos register.

4 Establish specification with WYG

It is paramount that a robust specification is developed to prevent any delay in the project and ensure the Asbestos Removal Contractor has clear instruction to work from.

It is the responsibility of the University of Liverpool Project Manager to commission the Asbestos Consultant/Analyst or the Asbestos Manager to development any spesification for the asbestos works.

For non CDM notifiable projects the specification must be developed between the University Project Manager, the Asbestos Consultant/Analyst and/or the Asbestos Manager.

For CDM notifiable projects the specification will be developed between, the University Project Manager the Asbestos Consultant/Analyst and/or the Asbestos Manager with assistance by the Principal Contractor.

Note: any reinstatement works must either be included with the specification for the Asbestos removal contractor to complete or dealt with as a separate project to follow on from the asbestos abatement works. A clear specification must be given for all reinstatement works.

5 Tender works with ASBESTOS REMOVAL CONTRACTOR

5.1 CDM notifiable projects

For CDM Notifiable projects the procurement of the ASBESTOS REMOVAL CONTRACTOR is undertaken by the Principal Contractor. It is essential the University Project Manager directly employees the Asbestos Consultant/Analyst Company and they remain involved with the asbestos abatement works taking responsibility for the following activities:

- Specification
- Site Management of Asbestos Removal Contractors
- Four stage air clearance;
- Leak tests;
- Background tests;
- Personal air monitoring;
- Reassurance tests;
- Smoke test;
- Review of Plan or works and
- Final sign off of the asbestos project.

Note: The University appointed Asbestos Consultant/Analyst Company must be employed directly by the University Project Manager.

5.2 Non CDM notifiable projects

For Non CDM notifiable projects the procurement of the Asbestos removal contractor is undertaken by the Project Manager, from a selection of approved Asbestos Removal Contractor’s on the asbestos framework in accordance with the University financial procedures. A list of current approved Asbestos removal contractor’s can be sought from the Asbestos Manager and/or FM Safety Team.

6 ASBESTOS REMOVAL CONTRACTOR undertake works

6.1 CDM notifiable
For CDM Notifiable projects, health and safety management of the Asbestos removal contractor is undertaken by the Principal Contractor. The Asbestos Consultant/Analyst Company must remain involved in the process.

6.2 Non CDM notifiable

It is recommended that the Project Manager work with Asbestos Consultant/Analyst Company to manage the Asbestos Removal Contractor while on site, a number of activities are critical for the project to run smoothly.

Pre-start meeting: the pre-starting meeting should involve the Project Manager, the Asbestos Consultant/Analyst Company, the Asbestos removal contractor and a representative from the applicable Department. Key points to discuss during the pre-starting meeting:

- Scope of works – duration of work / Start & end date / hours of work / specification / ASB5
- FM notification information – University Onus / FM asbestos poster
- The role of: asbestos analytical company / Asbestos removal contractor / FM Project Manager during the project
- Access to: car park / building / plant rooms / restricted areas / laboratories
- Smoke test and isolation of fire alarm
- Site Health and Safety induction
- Site familiarisation
  - Restrictions in building
  - Specific hazards in building
  - Fire – fire alarm sound / fire drills / fire alarm test / emergency exits / assembly point
  - Transit routes
  - Skip location
  - DCU location – water / electrics
  - Site welfare arrangements specific to building
  - Storage on site
  - Delivery of materials
  - Control of nuisance noise / dust – exams / lectures / conferences / sensitive areas
  - Protection of existing finishes
  - Working on roofs
- Communications – FM Project Manager / Asbestos Consultant/Analyst Company / Asbestos removal contractor / Department Representative / Departmental Safety Coordinator.
- Out of hours working
- Emergency Procedures - local and general to the University

Witness smoke test: the Health and Safety Executive suggest in HSE264: The Survey Guide it is best practice to witness the smoke test. The University Project Manager will engage the services of the Asbestos Consultant/Analyst Company to witness the smoke test.

7 Works signed off by Asbestos Consultant/Analyst Company

Following satisfactory completion of the asbestos project and upon receipt of the four stage clearance certification (sign off by the Asbestos Consultant/Analyst Company) the University of Liverpool Project Manager should reassure themselves that the works have been completed to the prescribed scope of works and as such, it is best practise to visit the area of works with the representative of the appointed asbestos consultant in order to sign off the project prior to proceeding to section 8.

8 Update asbestos register

On completion of asbestos abatement works or additional surveys (demolition / refurbishment or management survey) the asbestos register must be updated. It is the responsibility of the Project Manager to ensure the Asbestos Consultant/Analyst Company to witness the smoke test.

- PLANON asbestos TSI spreadsheet, to include;
Amended material assessment (for the effected asbestos assets in the asbestos abatement works or new assets identified during a survey);

- priority assessment for each asset, (for the effected asbestos assets in the asbestos abatement works or new assets identified during a survey) input from the client will be required at this stage; see section 8.1 priority assessment

- links to relevant documentation associated with the project;

- Sample photograph (see images specification)

- Brief Description of works

- Date of completion

- Name of Contractor

- Bulk sample Certificate

- ASBS

- Plan of works (see CAD specification)

- Smoke test certificate

- Certification of reoccupation

- Drawings / plans

- Reassurance test certificate

- Leak test certificate

- Background test certificate

- Analytical handover report

- Electronic copies of the above relevant documentation associated with the project;

Please note: not all of the above documentation will be required for every project; further advice on documentation you require can be sought from the Asbestos Manager and/or FM Safety Team.

All the completed information must be delivered into the VOCAL website in the pre-agreed format, under the relevant building name and/or project title, as identified below.

Once the asbestos project has been completed and the ACAC has uploaded all information in the agreed format within VOCAL the ACAC will notify the Project Manager, Asbestos Manager and notified person. The ACAC will state that the asbestos project is satisfactorily completed and all relevant information is now held in VOCAL (the located will then be stated) and now ready to be uploaded in the Planon Asbestos TSI.

Below provides a basic guide of the process required to ensure the project specific information is uploaded on to Planon asbestos TSI (asbestos register).
ACAC upload information into VOCAL

ACAC email Project Manager, Asbestos Manager and nominated person

The ACAC will state that the asbestos project is satisfactorily completed and all relevant information is now held in VOCAL (the located will then be stated) and now ready to be uploaded in the Planon Asbestos TSI

Nominated person will upload in Planon Asbestos TSI

**CAD specification**

All drawings must be returned in dwg and pdf format.

**Images**

Images must be provided in the standard internet size of 640 x 480 pixels

**8.1 Priority assessment**

As part of the University asbestos management plan a risk assessment is required for each known or presumed asbestos asset. The risk assessment is carried out in two parts: the first is a material assessment which assesses the condition of the material and the likelihood of it releasing fibres if disturbed (undertaken by the Asbestos Consultant/Analyst Company); the second part is a priority assessment which takes into account maintenance activities, likelihood of disturbance, human exposure potential, occupant activity or visitors.

Project Managers, will be required to assist the Asbestos Consultant/Analyst Company in completing the priority assessment, using the scoring matrix below, section 8.2. To assist with the scoring for Maintenance activity, the Maintenance Manager has provided guidance, see appendix one.
8.2 Priority assessment scoring matrix

**Normal Activity**

<table>
<thead>
<tr>
<th>Normal activity code</th>
<th>Normal activity name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Rare disturbance activity</td>
</tr>
<tr>
<td>2</td>
<td>Low disturbance activity</td>
</tr>
<tr>
<td>3</td>
<td>Periodic disturbance activity</td>
</tr>
<tr>
<td>4</td>
<td>High disturbance activity</td>
</tr>
</tbody>
</table>

**Likelihood of disturbance**

<table>
<thead>
<tr>
<th>Location code</th>
<th>Location name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Outdoors</td>
</tr>
<tr>
<td>2</td>
<td>Well ventilated large space</td>
</tr>
<tr>
<td>3</td>
<td>Internal space up to 100m²</td>
</tr>
<tr>
<td>4</td>
<td>Confined spaces</td>
</tr>
</tbody>
</table>

**Accessibility code**

<table>
<thead>
<tr>
<th>Accessibility name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Asbestos material usually inaccessible</td>
</tr>
<tr>
<td>2: Asbestos material unlikely to be disturbed</td>
</tr>
<tr>
<td>3: Asbestos material may occasionally be disturbed</td>
</tr>
<tr>
<td>4: Asbestos material will be easily disturbed</td>
</tr>
<tr>
<td>5: Asbestos material is routinely disturbed</td>
</tr>
</tbody>
</table>

**Extent code**

<table>
<thead>
<tr>
<th>Extent name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Small amounts or items i.e. gaskets / rope</td>
</tr>
<tr>
<td>2: Less than 10 sq m</td>
</tr>
<tr>
<td>3: Less than 10 m run</td>
</tr>
<tr>
<td>4: 10 to 50 sq m</td>
</tr>
<tr>
<td>5: 10 to 50 m run</td>
</tr>
<tr>
<td>6: More than 50 sq m</td>
</tr>
<tr>
<td>7: More than 50 m run</td>
</tr>
</tbody>
</table>

**Human exposure potential**

<table>
<thead>
<tr>
<th>Occupant range code</th>
<th>Occupant range name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>None</td>
</tr>
<tr>
<td>2</td>
<td>1 to 3 persons</td>
</tr>
<tr>
<td>3</td>
<td>4 to 10 persons</td>
</tr>
<tr>
<td>4</td>
<td>more than 10 persons</td>
</tr>
</tbody>
</table>

**Usage frequency code**

<table>
<thead>
<tr>
<th>Usage frequency name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Infrequent use of space</td>
</tr>
<tr>
<td>2: Monthly use of space</td>
</tr>
<tr>
<td>3: Weekly use of space</td>
</tr>
<tr>
<td>4: Daily use of space</td>
</tr>
</tbody>
</table>

**Average time of use code**

<table>
<thead>
<tr>
<th>Average time of use name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1: Occupied Less than 1 hour</td>
</tr>
<tr>
<td>2: Occupied 1 to 3 hours</td>
</tr>
<tr>
<td>3: Occupied 3 to 6 hours</td>
</tr>
<tr>
<td>4: Occupied more than 6 hours</td>
</tr>
</tbody>
</table>

**Maintenance activity**

<table>
<thead>
<tr>
<th>Disturbance potential code</th>
<th>Disturbance potential name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Minor Disturbance - possible contact gaining access</td>
</tr>
<tr>
<td>2</td>
<td>Low Disturbance - possible disturbance during maintenance activity</td>
</tr>
<tr>
<td>3</td>
<td>Medium Disturbance - maintenance activity requires some disturbance</td>
</tr>
<tr>
<td>4</td>
<td>High Disturbance - major maintenance activity</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Frequency code</th>
<th>Frequency name</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Asbestos Material unlikely to be disturbed for maintenance</td>
</tr>
<tr>
<td>2</td>
<td>access is required for Annual maintenance activity</td>
</tr>
<tr>
<td>3</td>
<td>access is required for Monthly maintenance activity</td>
</tr>
<tr>
<td>4</td>
<td>access is required for Weekly maintenance activity</td>
</tr>
</tbody>
</table>
9 Upload spreadsheet into Planon
On receipt of project completion confirmation from a Project Manager, the Nominated Person(s) will upload the information into the PLANON asbestos TSI. The uploading of information will occur weekly. Where any errors in the information are identified the documentation will be returned to the Project Manager for validation.
Appendix one

Guidance for completing Maintenance activity

<table>
<thead>
<tr>
<th>Location/Equipment</th>
<th>Disturbance potential code</th>
<th>Frequency code</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electrical Switchgear/Fuseboards/Distribution Boards</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Ceiling voids (i.e. above suspended ceilings)</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Fittings attached to ceilings i.e. lights</td>
<td>2</td>
<td>1</td>
</tr>
<tr>
<td>Floor Tiles</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Sink pads (acoustic dampers)</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Fire door beading (could apply to any fitting on an AI door?)</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Calorifier/Heat Exchanger Gaskets/Jointing</td>
<td>3</td>
<td>2</td>
</tr>
<tr>
<td>Ventilation Ductwork Gaskets/Jointing</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>External cladding/rendering/panels</td>
<td>1</td>
<td>1</td>
</tr>
<tr>
<td>Plant Rooms/Tank Rooms*(general contamination)</td>
<td>3</td>
<td>4</td>
</tr>
</tbody>
</table>

*It is assumed that plant areas require weekly access

Further guidance on scoring for the Maintenance Activity can be sought from the Maintenance Manager.
Appendix two

Glossary of Terms

**Refurbishment and demolition survey:** A refurbishment and demolition survey is needed before any refurbishment or demolition work is carried out. This type of survey is used to locate and describe, as far as reasonably practicable, all ACM’s in the area where the refurbishment work will take place or in the whole building if demolition is planned. The survey will be fully intrusive and involve destructive inspection, as necessary, to gain access to all areas, including those that may be difficult to reach. A refurbishment and demolition survey may also be required in other circumstances, e.g. when more intrusive maintenance and repair work will be carried out or for plant removal or dismantling.

**Management survey:** A management survey is the standard survey. Its purpose is to locate, as far as reasonably practicable, the presence and extent of any suspect ACM’s in the building which could be damaged or disturbed during normal occupancy, including foreseeable maintenance and installation, and to assess their condition.

**ACM:** asbestos containing material

**CDM Notifiable:** a project is notifiable if the construction phase is likely to involve more than
(a) 30 days; or
(b) 500 person days, of construction work.

**Construction phase:** the period of time starting when construction work in any project starts and ending when construction work in that project is completed.

**Legislation:**

- Health and Safety at Work Etc. Act 1974
- Control of Asbestos Regulation 2012
- The Management of Asbestos in Non-Domestic Premises (ACOP) L127
- Asbestos: The Survey Guide HSG264
- The Construction (Design and Management) Regulations 2007
- Management of Health and Safety at Work Regulations 2002

**University Code of Practice**

- ASBESTOS MANAGEMENT (Revised Feb 2013)
APPENDIX E – UoL PRE ASBESTOS SURVEY QUESTIONNAIRE
UoL PRE ASBESTOS SURVEY QUESTIONNAIRE

Please complete all relevant sections of the contract review and survey desk top study form to the best of your knowledge and provide the required declarations at the end of the form. Please note that a lack of premises information and/or restrictions imposed on the scope and extent of a survey can lead to survey limitations and caveats which can undermine the usefulness of the resulting survey report.

<table>
<thead>
<tr>
<th>1. Client Details</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Contact Details</strong></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
<tr>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>2. Details of Property to be Surveyed</th>
<th>Full Address and Postcode</th>
<th>Site Contact &amp; Tel No.</th>
<th>Age</th>
<th>Approx Size (m²) / No. of Rooms</th>
<th>Building Number</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Pre-1985</td>
<td>Pre-1999</td>
</tr>
<tr>
<td>Academic Department</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Dept. Contact &amp; Tel No.</td>
<td>Building Manager</td>
<td>Contact &amp; Tel No.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>3. Operational Status</th>
</tr>
</thead>
<tbody>
<tr>
<td>Operational</td>
</tr>
<tr>
<td>Vacant</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>4. Type of Survey(s) Required</th>
</tr>
</thead>
<tbody>
<tr>
<td>Management Survey</td>
</tr>
<tr>
<td>Refurbishment / Demolition Survey</td>
</tr>
</tbody>
</table>

MARKED UP PLAN IDENTIFYING WORK AREAS SUPPLIED
5. **Scope of Survey**

| **Full Survey:** Whole property including surrounding grounds, outbuildings, and related structures. | ☐ |
| **Partial Survey:** Client defined areas (please specify project areas): | ☐ |

6. **Buildings / Areas to be surveyed**

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
</table>

7. **Space Codes**

| Client Unique Space References available | Yes ☐ No ☐ |

8. **Agreed Survey Exclusions**

- 
- 
- 

All exclusions have been agreed in writing with the client ☐

9. **Extent of damage (during refurbishment surveys only)** — Please determine the level of access that is acceptable during the refurbishment survey and indicate if you require WYG to repair damaged areas. If you are prepared to accept the level of damage associated with a suitable and sufficient assessment please tick all three boxes. Please remember that refurbishment surveys are highly invasive and destructive.

<table>
<thead>
<tr>
<th>Full Intrusion – Large holes in false walls ceilings etc</th>
<th>☐</th>
</tr>
</thead>
<tbody>
<tr>
<td>May involve damage that if repairs are required may need re-installation of new plaster boarding/patching. Will involve breaking through areas within walls/ceilings etc which will generally be repairable without the need for full replacement. Required to ensure that all voids spaces within the property are fully inspected. Full damage must be undertaken where properties are to be demolished. Please confirm that you are happy that this level of damage may be incurred during the survey and take responsibility for arranging for the repairs where required.</td>
<td></td>
</tr>
</tbody>
</table>

| | |

| Should you have differing requirement of the level of damage allowed to the building please tick here and discuss with the WYG consultants. Please note that any deviation from the level of intrusion required by an HSG 264 refurbishment survey may require further intrusion during the works or the understanding that the survey has limitations. | ☐ |

10. **Proposed Report Dates**

| Access Available on: | |
| Report Required on: | |
### 11. Will the survey require any of the following? Where multiple properties in programme, please detail affected properties on spreadsheet.

<table>
<thead>
<tr>
<th>Tick Box</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Ladders / Steps</td>
<td>☐ Tower Scaffold</td>
</tr>
<tr>
<td>☐ Temporary Lighting</td>
<td>☐ Reinstatement Work</td>
</tr>
<tr>
<td>☐ Air Ventilation in Specific Areas</td>
<td>☐ Special Provision PPE</td>
</tr>
<tr>
<td>☐ Crawl Boards</td>
<td>☐ Specialist Training / Clearance</td>
</tr>
<tr>
<td>☐ 2nd Person in Attendance</td>
<td>☐ Hydraulic Platform</td>
</tr>
<tr>
<td>☐ Isolation of Services</td>
<td>☐ Hygiene Facilities</td>
</tr>
</tbody>
</table>

### 12. Are inspections to be held in any of the following areas? Where multiple properties in programme, please detail affected properties on spreadsheet.

<table>
<thead>
<tr>
<th>Tick Box</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>☐ Ceilings and Ceiling Voids &gt;3m</td>
<td>In order to guarantee access above 3 metres WYG will need specialist access equipment available on site to ensure access can be made safely. Please confirm that you wish WYG to make suitable arrangements and agree that this may result in additional costs incurred. Where not indicated, WYG is not responsible for access limitations encountered during surveys of the listed properties due to height restrictions</td>
</tr>
<tr>
<td>☐ Live Electrics</td>
<td>In order for WYG to access electrical installations on site such installations must be isolated. Please confirm that relevant isolation certificates or trained engineers will be available during the survey.</td>
</tr>
<tr>
<td>☐ Operable Plant &amp; Machinery</td>
<td>In order for WYG to access plant on site such installed items must be isolated. Please confirm that relevant isolation certificates or trained engineers will be available at the time of the survey.</td>
</tr>
<tr>
<td>☐ Gas Installations (Boilers etc)</td>
<td>In order for WYG to access gas installations on site such installed items must be isolated. Please confirm that relevant isolation certificates or trained engineers will be available at the time of the survey.</td>
</tr>
<tr>
<td>☐ Lift Shafts</td>
<td>In order for WYG to access lift shafts on site such they must be isolated and safe access provided. Please confirm that relevant isolation certificates or trained engineers will be available at the time of the survey.</td>
</tr>
<tr>
<td>☐ Ducts / Voids / Undercrofts (Confined Spaces)</td>
<td>In order to guarantee access within confined spaces, WYG will need specialist access equipment available on site to ensure access can be made safely. Please confirm that you wish WYG to make suitable arrangements and agree that this may result in additional costs incurred. Where not indicated, WYG is not responsible for access limitations encountered during surveys of the listed properties due to confined spaces.</td>
</tr>
<tr>
<td>☐ Biological/Chemical Hazard Zones</td>
<td>Please provide further details of expected hazards for review by WYG Health and Safety Management including relevant COSHH assessments, risk assessments and control measures in place for these hazardous environments.</td>
</tr>
<tr>
<td>☐ Poor lighting</td>
<td>In order to guarantee access in poorly lit areas WYG will need temporary lighting available on site to ensure access can be made safely. Please confirm that you wish WYG to make suitable arrangements and agree that this may result in additional costs incurred. Where not indicated, WYG is not responsible for access limitations encountered during surveys of the listed properties due to height restrictions</td>
</tr>
<tr>
<td>☐ Areas of Storage</td>
<td>Please ensure that all areas are free of storage to prevent access limitations in areas to be surveyed. Where this is not possible please confirm that assistance will be provided on site during the survey should such limitations be identified.</td>
</tr>
<tr>
<td>☐ Fitted Floor Coverings</td>
<td>Where access below carpets is requested on management surveys WYG will try to do so without causing unnecessary damage but however accept no liability for damage to carpets or any refitting costs incurred that result from such actions. Please confirm that you accept these conditions and still require WYG to access under carpets.</td>
</tr>
</tbody>
</table>

The information for the requested survey work submitted above is accurate to the best of my knowledge and I accept that any limitations not detailed above but encountered on site may result in delays to reporting and possibly additional costs being incurred should additional visits to site be required to access all required areas. This document is based on information provided by the client and recommendations & guidance by WYG.
Client Representative Declaration:

<table>
<thead>
<tr>
<th>Print Name:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Position/Role:</td>
<td></td>
</tr>
<tr>
<td>Date:</td>
<td></td>
</tr>
</tbody>
</table>

WYG Representative Declaration:

<table>
<thead>
<tr>
<th>Print Name:</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Position/Role:</td>
<td></td>
</tr>
<tr>
<td>Date:</td>
<td></td>
</tr>
</tbody>
</table>

**WYG USE ONLY – QUESTIONNAIRE REVIEW**

<table>
<thead>
<tr>
<th>Review Item</th>
<th>Confirmation (Y/N/NA)</th>
</tr>
</thead>
<tbody>
<tr>
<td>WYG have received all required documentation where applicable</td>
<td></td>
</tr>
<tr>
<td>Questionnaire completed satisfactory</td>
<td></td>
</tr>
<tr>
<td>Outstanding issues arising from questionnaire resolved</td>
<td></td>
</tr>
<tr>
<td>Pre-site meeting required?</td>
<td></td>
</tr>
<tr>
<td>Pre-site meeting completed?</td>
<td></td>
</tr>
<tr>
<td>All Additional costs/responsibilities confirmed with client</td>
<td></td>
</tr>
<tr>
<td>Work tasked correctly</td>
<td></td>
</tr>
<tr>
<td>Order Number Issued</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Print</th>
<th>Sign</th>
<th>Date</th>
</tr>
</thead>
</table>

(Please save copy of this signed record into the relevant project file)
## Appendix 1

**Additional Survey Works:** Please detail the specific requirements of survey works that are in addition to those originally requested as detailed in the main body of this document. It should be noted that it may not be possible to clarify the number of Bulk samples at the time of the request for additional works.

<table>
<thead>
<tr>
<th>Print</th>
<th>Sign</th>
<th>Date</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

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<td></td>
<td></td>
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<td></td>
</tr>
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</table>

**Additional Survey Works:** Please detail the specific requirements of survey works that are in addition to those originally requested as detailed in the main body of this document. It should be noted that it may not be possible to clarify the number of Bulk samples at the time of the request for additional works.
Facilities Management Department
Plant Room Security

Introduction

Further to the extensive and ongoing programme of asbestos remediation works involving plant room areas, concerns have been raised regarding the security of plant rooms with particular reference to the possibility of further asbestos contamination due to unauthorised access and/or storage of materials.

The existing standard lock – EZZ542 – has been in use for many years and, inevitably, the control of key availability has deteriorated and it is evident that many unauthorised keys for this suite are now in circulation.

Security Improvements

Accordingly, it has been agreed that a new suited lock will be installed to replace the EZZ 542 suite. The replacement programme will be phased and will prioritise those plant rooms where asbestos remediation works have taken place. New plant room door signage incorporating an asbestos “caution” will also be fitted.

Asbestos Status

In many areas where remediation works have taken place, asbestos containing materials (ACM's) may still be present – this is the case even where, for example, a full strip of asbestos insulation has taken place. A separate briefing note has been produced highlighting this issue. This includes an acceptance form which must be signed prior to the key being issued.

Key Security

In order to maintain control over the availability of the new key suite, the following arrangements will be implemented:

Keys will be issued on a personal basis to all members of the FM Maintenance, Design Group & Capital Projects teams.

Sets of plant & electrical switch room keys (excluding sub-station and primary switch room (GMK) keys) will be kept by FM Admin for issue to contractors/consultants. This will only be undertaken on instruction from a member of the above teams and will be subject to a strict signing-out/signing-in procedure.

Sets of the above keys will also be issued to Security Control but will be subject to the same restrictions as the existing electrical sub-station keys, i.e. they will not be issued unless permission is given by a senior FM Manager. These will also be subject to a sign out/in procedure.

Where a member of University staff from outside the FM Department requires access to a specific plant area or areas, they will be required to request such access in writing to the Head of Facilities Maintenance with appropriate justification. Arrangements will be made for a limited access key to be supplied in such cases.

The following restrictions on keys MUST be observed at all times:

- No keys are to be issued to any member of departmental staff, contractors or consultants outside of the procedures noted above.
- All persons issued with keys on a temporary basis will be required to read the asbestos briefing note and comply with the general requirements below and their signature in the signing-out book will confirm this.
General Requirements

Plant rooms and electrical switch rooms are to remain locked AT ALL TIMES when not occupied – this includes lunch or other breaks. Faulty locking arrangements should be reported to the FM Help Desk on 43000 and will be dealt with as a priority.

Keys issued on a temporary basis MUST be returned once access is no longer required. The FM staff member authorising the issue of the keys will be responsible for ensuring that this requirement is complied with.

Plant rooms & electrical switch rooms are potentially hazardous locations – persons granted access must be made aware of any specific hazards in a particular location in line with our duty of care.

No plant or equipment is to be switched off (or on), isolated or otherwise interfered with in any way by contractors/consultants unless this is specifically authorised by the FM staff member granting access.
ASBESTOS BRIEFING- PLANT ROOM ACCESS

Asbestos in buildings

Asbestos has been used within over 4,000 products, the vast majority of which are building materials these include roof sheets, boilers, plant and pipe work hidden in under-floor ducting, fire protection to steelwork, hidden behind false ceilings, thermal and acoustic insulation of buildings, some textured coatings and paints, friction materials such as brake linings and clutch plates, gaskets, fuse boxes and boilers and thermal insulation on pipe work.

The Facilities Management Department has prepared simple procedures to be followed when entering plant rooms or similar locations on the Liverpool estate in order to help reduce the risk of exposure from Asbestos Containing Materials (ACM’s).

The University of Liverpool (UoL) has a policy to annually re-inspect the condition of ACM’s and decide whether to remove or manage in situ. If the ACM remains the UoL will need to ensure that it is either in good condition or alternatively arrange for the product to be enclosed/sealed/encapsulated or repaired.

Before any work takes place on site, the operative should refer to the asbestos register. The register will provide information on the location and condition of any ACM’s on that site, If the register details that ACM’s are present in the area you must assess the risk and decide whether to continue and amend the safe system of work.

Avoiding risks

If you suspect ACM’s to be present in a friable condition, the following steps should be taken;

- Stop work immediately
- Inform those around you
- Everyone should leave the area where asbestos is suspected
- Contact your line manager and/or the FM health and safety team and await instructions

Emergency Procedures

In the event you are inadvertently exposed to ACM’s you must leave the area by the shortest route and report the incident to your line manager and or the FM health & safety team, depending the individual circumstances arrangements for decontamination may have to be considered.

REMEMBER – If you suspect Asbestos, stop work and tell your supervisor immediately.

Where can I obtain further information

The University’s Code of Practice on Asbestos Management
Occasional Notes on University Safety – asbestos
The Health and Safety Executive

I acknowledge {receipt of an GMK plant room key} / {plant room access authorisation via staff card} (circle as applicable)

I have received a briefing on the risks associated with ACM’s from a representative of the FM Department and confirm this information was fully explained to me and that I understand the importance of safety in plant rooms

Name:…………………………………………..Position:………………………………………
Signed:…………………………………………Date:……………………………………

Authorised by FM Representative…………………………..Position………………………….
Signed:…………………………………………Date:……………………………………

The hazards associated with ACM’s is not exhaustive list of hazards when entering plant rooms, other specific hazards relevant to a task or process need to be considered and appropriate controls

I acknowledge {receipt of an GMK plant room key} / {plant room access authorisation via staff card} (circle as applicable)

I have received a briefing on the risks associated with ACM’s from a representative of the FM Department and confirm this information was fully explained to me and that I understand the importance of safety in plant rooms

Name:…………………………………………..Position:………………………………………
Signed:…………………………………………Date:……………………………………

Authorised by FM Representative…………………………..Position………………………….
Signed:…………………………………………Date:……………………………………

The hazards associated with ACM’s is not exhaustive list of hazards when entering plant rooms, other specific hazards relevant to a task or process need to be considered and appropriate controls
Asbestos Management Policy/Procedure 2012 (V0)

**Initial Work Request**

- **Are the works intrusive?**
  - Yes: Type 3 survey req’d
  - No: Proceed with work subject to standard risk-assessment procedure, including consideration of intact in-situ ACM’s

- **Type 2 survey done?**
  - No: Arrange T2 survey
  - Yes: Assume worst-case scenario

- **Are the works time-critical?**
  - No: Works controller to prepare Risk Assessment:
    - Nature of works
    - Level of contamination
    - Plant activity in area
    - Duration of work
  - Yes: Arrange T2 survey done?
    - Yes: Proceed with work subject to standard risk-assessment procedure, including consideration of intact in-situ ACM’s
    - No: Use M&E knowledge of ARC (as per contractor framework) to enable them to carry out task within enclosure

- **Is the area contaminated?**
  - No: Proceed with work subject to standard risk-assessment procedure, including consideration of intact in-situ ACM’s
  - Yes: Arrange for a licensed contractor to carry out the works

- **Will the work be sporadic & low intensity?**
  - No: Arrange for decontamination of room
  - Yes: Delegate task to a trained individual

- **Is the operative trained?**
  - No: Delegate task to a trained individual
  - Yes: Provide PPE:
    - P3 disposable RPE
    - Type 5/6 disposable overalls
    - Disposable gloves
    - Disposable overshoes
  
  Equipment required:
  - Wet wipes for decontamination (person & equipment)
  - Red “Asbestos” bag for waste disposal (leave in plant room)
  - “Buddy” system for safety and outside comms (See separate procedure)
APPENDIX G – ACCESS TO LIVE ENCLOSURE PROCEDURE
**ACCESS TO LIVE ENCLOSURE PROCEDURE**

Requirement for entering a live asbestos enclosure to undertake critical maintenance works for both internal/external engineers

Event occurs resulting in a requirement for a maintenance activity within a live asbestos enclosure

Assessment made to ascertain if the issue can be resolved by the engineer providing instructions to operative without entering the enclosure

Issue can be resolved Yes

Issue can not be resolved No

No further action

Operatives clean the enclosure prior to engineer entering area

Enclosure allowed to purge for suitable period of time

Fibre concentrations OK <0.010 F/cm³

Yes

Face fitted engineer enters decontamination unit and dons coveralls & RPE and is escorted into enclosure. AAC undertakes personal air monitoring on engineer and engineer enters enclosure under the supervision of the AAC to resolve issue

Issue resolved

Engineer leaves area and decontaminates accordingly

End

Issue not resolved

Area re cleaned and allowed to purge

Fibre concentrations exceed control limits

No

Continue with asbestos removal until a four stage clearance is issued then resolve the issue

End
GUIDE TO ASBESTOS ABATEMENT
AT THE UNIVERSITY
OF LIVERPOOL

Purpose and application of the document:

The purpose of this document is to provide guidance to those tendering for works involving the identification/abatement of Asbestos Containing Materials (ACMs) and the procedure for recording the identified/removed asbestos occurrences (assets).

Process owner: Date:

Name/Title: Michael Eastwood/Asbestos Manager

Authorised By: Date:

Name/Title: Martin Foster/Head of Facilities Management

Any proposed changes or improvement documentation should be raised on a change request form

Document History

<table>
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<td>1</td>
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<td>2</td>
<td>Feb 2013</td>
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SECTION 2 - Preliminaries & Set Up
SECTION 3 - Specific Requirements
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1.0 - Analytical Work
2.0 - University Approved Asbestos Consultant (AAC)/ Asbestos Manager (AM) – Overseeing Consulting Role

3.0 - Survey Works

APPENDICES:

A: Management of Planon TSI Module-v1.0
B: Asbestos Asset Management
SECTION 1 - GENERAL REQUIREMENTS

1.0 High Temperature Work

1.1 Working Conditions in Relation to Thermal Environment

(i) The Contractor shall note and make all necessary allowances for the effects of heat and cold on his operatives as a result of undertaking and completing the work described. The Contractor shall be deemed to have included for all necessary medical surveillance and/or restricted working.

(ii) Wherever practicable, 'High Temperature' working should be avoided. Where 'High Temperature Hot Working is required or specified to be undertaken, The Contractor will attempt to predict the effects of working in a hot environment. A suitable index needs to take into account of a number of factors which include ambient air temperature, the rate of air movement over the body, relative humidity and radiant heat. In almost all cases a Wet Bulb Globe Temperature index (WGBT index) should be used as a way of assessing heat stress, rather than a simple temperature measurement.

(iii) The Contractor shall keep a log of temperatures as described in the regulations and shall submit this to the Asbestos Consultant or their nominated representative on a weekly basis.

(iv) Hot working shall only be carried out in exceptional circumstances and the method statement shall be submitted to the Asbestos Consultant or their nominated representative and the HSE Inspectorate prior to commencement.

2.0 Legal Requirements

2.1 The Services provided shall comply with all relevant legislation and guidance current at the date of submission and in particular comply fully with the following at all times:

2.2 Legislation – General Health and Safety

1) Health and Safety at Work Act 1974 (as amended)
2) Management of Health and Safety at Work Regulations 1999
3) Control of Substances Hazardous to Health Regulations 2002
4) Electricity at Work Regulations 1989
5) Reporting Injuries, Disease and Dangerous Occurrences Regulations 1995
6) Construction (Design and Management) Regulations 2007

2.2.1 All works are to conform to the statutory requirements as laid down in:

1) The Health and Safety at Work Act etc.1974 (as amended)
2) The Management of Health and Safety at Work Regulations 1999
3) The "Control of Asbestos Regulations" 2012
4) The Control of Substances Hazardous to Health Regulations 2002 (as amended)
5) EN ISO/IEC 17020: "General Criteria for the Operation of Various Types of Bodies Performing Inspection
7) HSG 247: Asbestos: The Licensed Contractors Guide
2.2.2 All works are to be carried out in accordance with the following Health & Safety Executive Guidance Notes:

1) EH 50 Training Operatives and Supervisors for Work with Asbestos Insulation Coating
2) EH 57 The Problems of Asbestos Removal at High Temperatures
3) INDG 228 Selection of suitable Respiratory Equipment for work with asbestos 1999.

Also any appropriate amendments, to the aforementioned documentation.

2.2.3 Legislation - Asbestos
1) Control of Asbestos Regulations 2012

2.2.4 Legislation – Environmental, Carriage and Disposal
1) Control of Pollution Act 1974 (as amended 1989)
2) Environmental Protection Act 1990
3) Hazardous Waste Regulations 2005
4) Chemicals (Hazard Information and Packaging for Supply) regulations 2002 (as amended)
5) Carriage of Dangerous Goods (Classification, Packaging and Labeling) and Use of Transportable Pressure Receptacles Regulations 1996
6) Carriage of Dangerous Goods by Road Regulations 1996

2.2.5 Other Guidance/License Conditions
1) Any conditions contained within the license issued to the Contractor by the Health and safety Executive in accordance with the Control of Asbestos Work Regulations 2012
2) HSE Asbestos Removal License
4) Any special requirements of local Electricity, Gas and water undertakings
5) Any requirements of the Health and Safety Executive

2.2.6 Accreditations

The Contractor must comply with any other requirements of legislation, British Standards Specifications or Codes of Practice applicable to the Services to be provided. Where a Service Provider proposes to use a sub-contractor(s) this must be clearly identified and copies of the appropriate certificates for the sub-contractor(s) must be provided.

3.0 Quality Inspection

3.1 The University shall at random carry out audits on active works & post inspection on works completed to ensure all applicable regulations are being met, and standards as defined under the University’s Specifications are being adhered to. Any work found not to be of a reasonable standard or not complying with regulations will be brought to the attention of the Principal Contractor and should be corrected at the Contractor’s expense.
3.2 The Principal Contractor will be required to submit a report to the University when examples of poor workmanship are identified through random inspections, detailing the Contractor’s actions.

3.3 The University reserves the right to instruct the Principal Contractor in writing to remove any operative from the contract on the grounds of unsatisfactory performance in any way. The University shall under no circumstances be liable to the Principal Contractor or Sub contractor in respect of such action taken.

3.4 The Principal Contractor shall carry out their own Quality Assurance Inspections on at least 10% of all work carried out, and provide evidence of this effect to the Employer.

4.0 **Daily Record Log**

The Contractor shall keep a Daily Site Log. The site log shall record, number of operatives on site, and description of the activities undertaken.

5.0 **Information to the Public and Occupants**

Publicity and information regarding the relative hazards of asbestos are the responsibility of the Asbestos Consultant or their nominated representative. The Contractor and his employees shall refrain from passing any comments but shall refer any queries to the Asbestos Consultant or their nominated representative.

6.0 **General Plant Tools and Equipment Maintenance and Inspection**

6.1 The number of high efficiency (type H) vacuum cleaning units, complete with HEPA filters to be provided by the Asbestos Contractor shall be appropriate for the scope of the "works".

6.2 All sheeting used to enclose working areas, airlocks, transit area and shower facilities, shall be visually inspected at the start of each shift. Any repairs, if necessary shall be carried out before work commences and adequately recorded.

6.3 The Contractor shall ensure that filters on air extraction equipment are changed at least once per shift and contaminated filters disposed of as asbestos waste.

6.4 No plant or equipment shall be removed from the work area until it has been adequately cleaned within the work area and again within the inner airlock.

6.5 The Contractor shall nominate a person to be responsible for carrying out tests and inspection of sheeting, plant and equipment and keeping accurate records of dates and result of tests which shall be available for inspection by the Asbestos Consultant or their nominated representative and or HSE Inspectorate. Such tests shall be at intervals recommended by manufacturers, suppliers or as required by the Asbestos Consultant or their nominated representative.

6.6 If scaffolding is to be used in a contaminated area this shall be erected/dismantled by an asbestos licensed scaffolding Contractor and in accordance with approved Facilities Management guidance document for Scaffolding Contractors.

7.0 **Control of Substances Hazardous to Health**

The appointed Contractor is to comply with the Control of Asbestos Regulations (2012) and the Control of Substances Hazardous to Health Regulations in every respect. The appointed Contractor is to identify those substances/materials which give rise to potentially hazardous emissions (e.g. fumes, dust etc) and clearly state in his assessment of risk the control/procedures which he intends to adopt to reduce such exposure risks and emissions as far as possible.
8.0 Asbestos Removal/Abatement Strategy

8.1 This technical specification is part of a developed strategy for controlling asbestos abatement during the majority of asbestos work. It is anticipated that in certain circumstances for practical reasons a different strategy of asbestos abatement works may be required.

8.2 Any working method or variation from this specification shall be agreed in advance with the Asbestos Consultant or their nominated representative.

8.3 Where any such agreement is made the Contractor shall confirm the method in writing to the Asbestos Consultant or their nominated representative prior to undertaking the work.

9.0 Approved Domestic Sub Asbestos Contractor

9.1 The employer stipulates the appointment of an approved domestic sub contractor to undertake all related asbestos abatement/remediation works. The contractor should conform to all requirements as detailed within The Control of Asbestos Regulations (CAR) 2012 and applicable supporting legislation as detailed within Section 1 of this document.

9.2 The employer has identified the below named licensed asbestos removal contractors to be considered during associated works:

- Forest Environmental Ltd.
- Rhodar Ltd
- C & D Industrial Services Ltd
- LAR Ltd
SECTION 2 - PRELIMINARIES & SET UP

1.0 The following details the general requirements for all works, followed by additional procedures to be applied for specific work activities and an overview of the application of analytical support.

1.1 The remediation of asbestos should be undertaken in accordance with the Control of Asbestos Regulations 2012 and be completed to the complete satisfaction of the Employer and Asbestos Consultant. Work procedures should be in accordance with HSG 247 The Contractors Guide, with analysis conforming to HSG 248 The Analysts Guide.

1.2 A copy of the Contractor's license must be kept on the site and be available for inspection at all times. Contractors shall not employ sub contract or agency workforce for asbestos removal without the written permission of the Asbestos Consultant or their nominated representative.

1.3 Prior to commencement, the Contractor will liaise with the Asbestos Consultant or their nominated representative and satisfy themselves that all requested documentation is present and correct. This shall include the following:

2.0 Notices

A copy of all Notices required under any act or Regulation, including:

a. Notification to HSE (ASB5) Intention to Start Work (unless works are considered as unnotifiable in accordance with HSG 247).

b. Disposal of Waste (waste consignment note and tip receipt tickets) etc.

c. Names and details of Sub-Contractors.

d. Any changes to Method Statement.

e. Risk Assessments.

The above shall be submitted in writing by the Principal Contractor to the appointed Asbestos Consultant/ University Asbestos Consultant or their nominated representative and the HSE for approval. The Contractor shall assume approval unless instructed in writing to the contrary.

3.0 Licenses, Medical Certificates & Training Records

Copies of the Contractor's current license, medical certificates and training records for all employees shall be submitted prior to the commencement of any works by the Contractor to the Asbestos Consultant or their nominated representative. A copy shall be retained on site.

4.0 Programme and Supporting Documentation

4.1 The Contractor shall provide, in addition to the programme chart for the work, the following:

a. Plan of Work/Method Statement
b. Proposals for the organisation and execution of the works.
c. The commencement and completion dates and relationship between various activities.
d. Labour resource plan, materials and plant requirements.
e. Emergency Procedures, including power failure procedures.
f. Site plan to indicate enclosure, air extract, transit and site establishment.
g. Condition Survey of proposed work area.

4.2 The Contractor shall submit copies of the Plan, Method Statement and programme to the Appointed Asbestos Consultant and University Asbestos Manager or their nominated representative and one copy to the Health & Safety Executive. The Contractor shall keep a further copy on-site.
4.3 The Contractor shall record progress on a copy of the programme kept on site. Update or redraft without delay if any circumstances arise which affect the progress of the Works and submit copies of all revisions to the Appointed Asbestos Consultant/ University Asbestos Manager or their nominated representative within 48 hours.

4.4 The Contractor shall give maximum possible notice to the Asbestos Consultant/ Asbestos Manager or their nominated representative before changing the designated Person in Charge.

4.5 Once on site the Contractor shall satisfy themselves that the health & safety conditions of the work area are as expected. Pre-cleaning should be completed if required as previously specified.

5.0 Plan of Work/Method Statement

5.3 Acceptance of the working method and assessment will not release the Contractor from any responsibilities from the specified works or specific requirement of the Health & Safety Executive. Any additional requirements stipulated by the Enforcing Authority shall be complied with at the Contractor's expense.

5.4 The Contractor's method statement shall include details of the following:

a) The name of the licensed Contractor's supervisor on site. This person shall be responsible for ensuring that only duly authorised persons enter the working area and shall keep a record of all entry and exits into those areas. In addition this/these person/s shall be responsible for the correct keeping of any documentation required to be kept on site by regulations, or the provisions of this Contract, including:

- The size, capacity and proposed position of the hygiene unit.
- The enclosure construction and sealing materials.
- The number and location of air locks and bag locks.
- The air extraction equipment and its location.
- The Contractors nominated waste facility (under the control of relevant Local Authority).
- The proposed transit route in detail (where applicable).
- How it is intended to keep persons out of the transit route who are not suitably equipped. Supervision of the Transit route when going through occupied areas (where applicable).
- On completion of the work the Contractor shall liaise with the Analyst and shall provide the Asbestos Consultant and University Asbestos Manager or their nominated representative with a copy of the asbestos survey report showing all asbestos containing materials which have been removed and their positions within the building. He shall also show any asbestos containing materials which are retained within the area of asbestos removal or shown on the report.

5.5 Reference must be given to the University's asbestos register, that details unique references (Asset numbers) for each occurrence of asbestos. Reference to such asset numbers must be made on all documentation in order that appropriate certification be allocated to each unique asbestos asset.

6.0 Pre-Commencement Survey Notification of Existing Defects

6.1 Prior to the commencement of any works the Contractor shall carry out a photographic and written survey of the work zone and transit route to locate any defective equipment, materials, fixtures and fittings, which shall be made available to the Employer, or their nominated representative.
6.2 Any such defects shall be brought to the attention of the Asbestos Consultant or their nominated representative prior to commencement of work.

7.0 Notification to Enforcing Authorities

7.1 The Contractor shall give the appropriate notification of the proposed work to the Health & Safety Executive, in accordance with the Control of Asbestos at Regulations (2012).

7.2 In cases where notifiable work is required to be undertaken within the 14 day notification period, the University or their nominated representative and Contractor shall carry out a joint site visit. The Contractor shall submit the necessary documentation for the approval of the enforcing authority.

7.3 In case of emergency works where a waiver of the 14 days notice from the Enforcing Authority has been obtained, a copy of the Enforcing Authorities approval form shall be submitted with the invoice.

7.4 A 14 day Exemption notice shall only be applied for on the instructions of the Asbestos Consultant or their nominated representative. The Asbestos Consultant or their nominated representative shall submit to the Contractor, in writing, his grounds for the application to be made.

8.0 Hygiene Facilities

8.1 The Contractor shall provide on-site, a hygiene unit either mobile or modular for the use of all persons who must enter the work or transit zone and/or are engaged in asbestos disturbance works. The hygiene or modular facilities shall be accordance with Regulation 23 and meet with the satisfaction of the HSE Inspectorate. This shall include all Contractor's own staff, Asbestos Consultant or their nominated representative or necessary specialist contractors.

8.2 The hygiene facilities shall be maintained on-site throughout the whole works and be of the appropriate size to provide the necessary showers, washing and storage facilities to meet the requirements of the Contractor for the works.

8.3 The position of the hygiene unit shall be agreed on-site with the Asbestos Consultant or their nominated representative or as specified in the Scope of Work.

8.4 All temporary services (electrical, water & draining) to the hygiene facility shall be ascertained, agreed by the client, provided and connected by the Contractor at his own expense. The Contractor shall ensure that the security of the Employer is not compromised and that all necessary precautions to protect personnel and property are taken.

8.5 The hygiene facility shall have continuous hot and cold water supplies fed from a water outlet with a double check valve in accordance with Water Board regulations and filtered waste water outlets connected to a suitable point of drainage.

8.6 Discharge of waste onto open land is not acceptable.

8.7 The hygiene waste filter shall be replaced as necessary and the used filter disposed of as asbestos waste.

8.8 The hygiene facility shall be locked at all times when not in use.

9.0 Personal Hygiene

9.1 Liquid soap, nail brushes, dry towels, hangers, hooks, storage lockers for RPE and protective clothing and personal lockers in adequate quantities shall be provided in the clean side of the
hygiene unit. A mirror for fitting respirators shall be positioned on outer chambers or airlock adjacent to work area.

9.2 Nothing shall be removed from site for "home" laundering. Laundry shall be bagged, sealed and sent to a licensed laundry willing to clean asbestos contaminated clothing,

9.3 Disposable clothing shall be disposed of as asbestos waste.

9.4 Shower facilities are to be sited between transit and clean areas so as to deter users from retracing their steps from clean to "dirty" areas without having to pass through the showers.

9.5 In circumstances where female operatives are involved special considerations shall be taken and these shall be approved on an individual basis.

10.0 Respiratory Protective Equipment (RPE)

10.1 The Contractor shall provide respiratory protective equipment for all operatives engaged in pre-cleaning work or working in designated asbestos areas and transit zones.

10.2 It is the Contractors responsibility to ensure that all respiratory equipment, provided by him, is adequate for the works, adequately maintained and cleaned. Maintenance records are to be kept for all equipment and shall be available for inspection by the Asbestos Consultant or their nominated representative.

10.3 The Equipment shall be face fit to the wearer, and shall not be shared with others. Face fit testing certification shall be available for inspection.

10.4 One set of PPE shall be kept on site for the use of the Asbestos Consultant or their nominated representative or his representative in emergency circumstances.

10.5 The Asbestos Consultant or their nominated representative shall provide his own RPE which the Contractor shall ensure is fit for purpose.

11.0 Protective Clothing

11.1 The Contractor shall provide disposable Type 5 protective overalls for all persons who are liable to be exposed to contamination.

11.2 Clothing and footwear shall completely enclose the body, head and feet in such a manner as to prevent contamination.

11.3 Protective clothing worn in the working and "dirty" areas shall be of a different colour to clothing worn in transit between the "dirty" area and showers.

11.4 Suitable hand protection, e.g. gloves, shall be available for use in undertaking the works.

11.5 No street clothes or footwear shall be worn in the "dirty" area (i.e. dirty side of the showers).

11.6 No transit clothing or footwear shall be worn in the clean area (i.e. clean side of the showers).

12.0 Negative Pressure (Air Handling) Equipment

12.1 Sufficient negative pressure units must be used in order to maintain a constant negative pressure throughout the Work. These must have a viable means of indicating the pressure drop across the filter. The Contractor must provide calculations to indicate the number of air changes provided by this system which must not be less than eight per hour. Unless exceptional circumstances dictate and with the Asbestos Consultant or their nominated representative’s agreement the negative pressure units should be vented to outside air.
12.2 The negative pressure units may be checked by the Asbestos Consultant or their nominated
representative at regular intervals and if found to be operating at less than an adequate
efficiency to provide the required negative pressure the Asbestos Consultant or their
nominated representative shall ensure the Contractor rectifies the situation by either
changing or increasing the number of units at the Contractor's own expense. The Contractor
shall include for all costs and additional equipment necessary in overcoming the building
design or environmental conditions which may affect the specified provision or criteria in
relation to negative pressure and air movement.

12.3 Sitting of Negative Pressure Equipment

The negative pressure equipment should be vented externally. Air tests shall be taken
periodically on the outlet of negative pressure equipment and if found to be in excess of
0.010 flm³ remedial action shall be taken. If it is found that any piece of equipment fails to
meet this standard or is found to be unacceptable in any other aspect of its performance
then the Asbestos Consultant or their nominated representative shall require its removal from
site and its replacement by a suitable unit. The equipment shall be checked daily and if
found to be operating below the minimum required to maintain an adequate negative
pressure shall be changed. It is the Contractors responsibility to ensure that the negative
pressure equipment filters are regularly checked and changed as required.

12.4 Negative Pressure Unit - Exhaust Ventilation System Filter Type

The discharge of the ventilation system shall be subject to "absolute filtration". The filtration
system must be as a "HEPA" filter assembly to BS 3928 or similar approved by the Health
and Safety Executive. A pre fitter shall be fitted to the unit which shall be changed daily

12.5 Negative Pressure Unit - Exhaust Ventilation Discharge Position

The Contractor shall, where practicable, include for discharging the ventilation system to
external atmosphere. Consideration shall be given to securing the proposed outlet positions
against intruders and to ensuring the safety of the public.

12.6 Negative Pressure Unit - Exhaust Ventilation System Continued Operation

On works lasting longer than one day the air mover/negative pressure unit shall remain in
continuous operation and shall be adequately maintained unless otherwise approved in
writing by the Asbestos Consultant or their nominated representative. The Contractor shall
ensure that the security of the Employer is not compromised and that all necessary
precautions to protect personnel and property are taken.

12.7 Where exhaust ventilation system units are sited externally the Asbestos Removal Contractor
shall provide necessary insulation to minimise/reduce noise emission to acceptable levels.

12.8 All extension hoses used in conjunction with the above equipment shall be constructed of
purpose made extendable rigid coil with UPVC coating.

13.0 Enclosure (Asbestos Area) Permit to Work

13.1 The Contractor shall operate a permit to work system as detailed in HSE Guidance Note GS5
ensuring only people wearing protective equipment/clothing may enter the general work
area. This shall apply to all areas previously indicated to have been made restricted access or
where pre-cleaning work has commenced.

13.2 The enclosure shall include vision panels as a minimum and CCTV where the enclosure is
greater than 10 cubic metres.
13.3 The Contractor shall keep a record of all authorised persons who have entered the enclosure and shall submit these to the Asbestos Consultant or their nominated representative.

13.4 The licensed asbestos contractor will start the works by forming a suitable enclosure that shall be constructed from 1000 gauge polythene, 2x2 timber and cloth back tape. Viewing panels of suitable size shall be placed in the third stage of the airlock and within the enclosure to allow for all areas to be viewed. The Contractor should therefore undertake a detailed investigation during the site visit in order to familiarise themselves with the area of work and the access restrictions associated with the project. The Contractor shall ensure that all materials and plant utilised in the enclosure construction are suitable and appropriate for the enclosure location with regards to fire resistance.

13.5 All external enclosures including airlocks etc. will be constructed from 2x2 timber and shall be clad with suitable ply. Air/bag locks shall have a suitable door fitted with hasp and staple so to ensure the area remains secure at all times. The use of A frames shall not be permitted at any time.

14.0 The Work Zone

14.1 The asbestos work zone shall be totally enclosed. The asbestos work zone shall be of a minimum practicable size and consideration should be given to segmenting areas to achieve this.

14.2 Entry into and Working in Confined Spaces

The Contractor shall not allow individual operatives to work unaccompanied on site in:

a. Areas subject to negative pressure.
b. Unoccupied/derelict areas.
c. All areas as defined in HSE Approved Code of Practice L101.

14.3 Where the Contractor does not deploy an operative outside the enclosure at all times during disturbance works the Contractor shall provide an electrical or mechanical system of contact between the inside and outside of the enclosure.

15.0 Enclosure Materials

15.1 The Contractor shall isolate the work zone from surrounding areas by the use of minimum 1000 gauge 125 microns low density virgin polythene which shall be supported by a rigid framework where required. All enclosures shall have adequate vision panels installed to allow external viewing of the whole enclosure.

15.2 In certain circumstances by virtue of quantity or location i.e. fire escape routes, public areas etc., flame retardant polythene will be necessary and shall be included for. The isolation of the work zone shall be completed by the use of other appropriate sealing methods.

15.3 The enclosure shall not impede the means of escape in case of fire. Flame retardant polythene, adhesive tape and sealants used to form the enclosure shall be treated and disposed of as contaminated special waste. Where adhesive tapes, staples, etc., have caused damage to the paintwork, wall paper and the like, the Contractor is to include for making good to the satisfaction of the Asbestos Consultant or their nominated representative.

15.4 The Contractor shall be responsible for adopting where existing and/or providing, maintaining, amending and removing temporary screens and enclosures during the full period of the contract and at the commencement of each phase for the purposes of preventing asbestos migration.
15.5 If the enclosure compromises a fire escape the contractor shall provide a means of opening the enclosure in case of fire (a sharp blacked knife taped to the outside of the enclosure will suffice). The contractor shall provide a notice stating "IN CASE OF FIRE CUT THE ASBESTOS ENCLOSURE AND EXIT. NO ENTRY UNDER ANY OTHER CIRCUMSTANCES".

15.6 The Contractor shall be responsible where necessary for providing and maintaining all temporary means of escape from enclosures to the requirements of the Asbestos Consultant or their nominated representative.

16.0 Enclosure Erection/Dismantling

It is appreciated that whilst damage may occur to finishes as a result of enclosure sealants which come into contact with certain wall, floor and ceiling finishes, the Contractor shall, however, use reasonable judgment to minimise any such damage. Any damage caused by the contractor or their nominated representatives shall be reinstated by the contractor at no cost to and to the total satisfaction of the Employer.

17.0 Application of Expanding Hard setting Foam

Where expanding hard setting flame retardant foam has been used to seal gaps in walls and spaces between walls and pipes etc., this shall be non combustible. On completion of the work, expanding foam shall either be removed or cut back and finished flush with surrounding surfaces and left in a neat and workmanlike manner and made good.

18.0 Air Locks and Bag Locks

At the entrance to the work zone the Contractor shall construct a three chamber air-lock in accordance with the regulations and HSG247 (2006). The sides top and bottom of each chamber shall be completely sealed and the ends shall be covered by sheeting flaps, fixed to a rigid frame that may be pushed aside on entry. The chamber shall provide sufficient space to accommodate cleaning equipment and for operatives to change from work zone protective clothing into transit zone overalls. Where the entrance is not continually supervised a lockable physical barrier shall be provided. The air lock/Bag lock shall be constructed to a commensurate standard with that of the enclosure previously stated.

19.0 Externally Sited Enclosure Transit Tunnel Protection

Where the work requires flame retardant polythene enclosure/transit tunnels to be sited in open air these shall be protected externally by 4mm sheeting plywood, or suitable alternative approved by the Asbestos Consultant or their nominated representative, securely fixed in position to a rigid framework.

20.0 Access "Direct" System

A system of direct access involving the construction of an enclosed walkway connecting the contaminated end of the hygiene unit to the working zone shall be used where possible.

21.0 Access "Transit" System

In certain circumstances, which shall be specified in the Description of Works, the contractor shall comply with the requirements of Asbestos Regulations 2006 for transiting back and forth between the enclosure and the hygiene unit.

22.0 Pre-Smoke Test - Enclosure

22.1 The contractor shall ensure all smoke detection equipment within the property which may be affected by the smoke test is arranged to be isolated before such tests are carried out and re-activated on its completion.
22.2 The Contractor shall carry out an initial smoke test to check the integrity of the enclosure and the efficiency and ventilation system from the enclosure prior to requesting the presence of the Asbestos Consultant or their nominated representative.

23.0 Smoke Test of Enclosure

23.1 Prior to any removal works commencing a smoke test shall be carried out by the Contractor in the enclosure to confirm the effectiveness of the sealing system and the efficiency of the ventilation system in effecting a minimum 6 full enclosure air changes per hour.

23.2 Therefore all smoke must have cleared from the enclosure within 10 minutes.

23.3 Consideration shall be given to the size and position of the ventilation system and the segmenting of enclosures in order to achieve this. In certain circumstances it may not be practical to smoke test the enclosure or possible to clear an enclosure within 10 minutes. In such cases the Asbestos Consultant or their nominated representative's approval (confirmed in writing) to commence must be obtained.

23.4 Arranging the isolation of local smoke alarms is the responsibility of the asbestos removal contractor. The smoke test shall be witnessed and recorded by the Asbestos Consultant or their nominated representative.

24.0 Smoke Test Failure Recharge

24.1 The contractor shall liaise with the Asbestos Consultant or their nominated representative as regards to specific times and dates. The Contractor shall give reasonable notice with regard smoke and clearance testing.

24.2 Should there be any failure of the initial smoke test of the enclosure all further costs incurred by the Asbestos Consultant or their nominated representative in witnessing satisfactory initial testing shall be borne by the Contractor.

25.0 Transit Procedures

25.1 The Contractor shall satisfy the Asbestos Consultant or their nominated representative that he has a safe procedure to transit between the airlocks and the decontamination unit which does not endanger the health, safety and welfare of:
   - His own personnel
   - Others in the building or on the adjacent site.

25.2 Clear distinction must be possible between protective clothing used for the purpose of asbestos removal and transiting and the following colour coding should be adopted:
   - Work zone - Red overalls
   - Transit zone - Blue overall
   - Other areas - White overalls

25.3 In addition to the Contractors own inspections, tests, both visual and analytical shall be carried out on the transit route by the Asbestos Consultant or their nominated representative to make sure it has not become contaminated with asbestos fibres. If this is found to be the case then the Contractor shall clean this area to the satisfaction of the Asbestos Consultant or their nominated representative at the Contractor's own expense. Any additional costs to the Employer due to delays at this stage shall be borne by the Contractor as well as the cost of any additional analytical work. These costs shall be deducted from the Contractor's final account.

25.4 The Asbestos Consultant or their nominated representative shall carry out any tests on the instructions of the Employer.
26.0 Light Fittings & Ancillary Equipment

26.1 The Contractor shall ensure that all electrical equipment has been isolated and a permit to work issued where applicable for the safe disconnection, decontamination and setting aside for re-use of all light fittings and ancillary equipment affected by the works unless instructed to dispose of as waste.

26.2 Where cables are released from their fixings, the cables shall be re-fixed on completion of the project following inspection by the appointed analyst.

27.0 Mechanical Protection

Where considered applicable the University will consider the application of Ventureclad to insulation that shoes minimal damage. All application of mechanical protection shall be in accordance with the University’s Mechanical Standards, which are detailed in Appendix G.

28.0 Ventilation Equipment/Plant

28.1 Provision will need to be made for the isolation of ventilation equipment/plant within work areas in order for the contaminated filters/materials to be removed/cleaned.

28.2 Prior to isolation of ventilation equipment, the Contractor shall obtain the permission from the employer, so to ensure that any critical plant is maintained.

29.0 Service Ducts

Should service ducts of any nature be present within the areas of work, the contractor shall be responsible for sealing these areas with Supalux, that shall be fitted in the form of an access hatch on to a timer frame. A hasp and staple should also be fitted to the hatch.

30.0 Scaffolding and Access Equipment

30.1 The Contractor shall provide, erect, maintain and strike on completion all necessary access equipment to complete the works described. Boilers and other plant shall not be used as working platforms. All such access equipment shall be delivered to site in a clean condition free from all dust, debris and deleterious materials.

30.2 The Contractor shall be responsible for all statutory requirements in relation to inspection and recording details of the scaffold/platform conditions for the duration of the works. Scaffolding shall be erected by a specialist scaffoldier who holds a HSE license to work in an asbestos contaminated area.

30.3 All persons erecting or using access equipment shall be fully trained in its use in accordance with the Working at Height Regulations.

31.0 Lighting

The Contractor shall provide, maintain and remove on completion of the work all necessary temporary lighting to complete the work described both for his own works and that of the Asbestos Consultant or their nominated representative.

32.0 Temporary Support Protection

The Contractor shall include for providing all necessary temporary support to pipework, fittings and equipment to prevent damage or disruption arising from the work.
33.0 Asbestos Material Outside the Scope of the Work

33.1 Should the Contractor locate any suspect asbestos material/debris during the course of the works which, in his opinion, at that time is not covered by the specification, then all work liable to disturb this material shall cease and the Asbestos Consultant or their nominated representative shall be notified for further instructions.

33.2 The Contractor shall include for all costs in protecting, sealing and encapsulating asbestos materials identified outside the "scope of works", which may be affected by the "works".

34.0 Contractor Responsibility

It is the sole responsibility of the Contractor to ensure all materials and work covered by the Specification and Description of Works are satisfactorily completed. Monitoring and clearance by the Asbestos Consultant or their nominated representative shall not be taken by the Contractor as solely indicating an acceptable standard of work.

35.0 Subcontractor Attendances

The Contractor shall include for and engage the services of competent electrical, mechanical engineers and general building trade contractors who are suitably trained and equipped to effect repairs etc, within a designated asbestos work enclosure. These contractors shall be available on a 24-hour call out basis with a maximum 4-hour response to any call out. These persons shall be approved by the Asbestos Consultant or their nominated representative who must be consulted prior to their commencing on site.

36.0 Disposal of Waste

36.1 Bagged waste shall be carefully transferred to vehicles provided by the Contractor for transport to an authorised waste tipping site or transit station. Any asbestos spillage to be dealt with as defined under “Control of Asbestos Waste”.

36.2 The transfer of asbestos waste from site to tip shall be in accordance with the latest edition of the "Hazardous Waste" regulations.

36.3 The Contractor shall obtain from the Employer as the producer of the waste, the "Environment Agency Registration Number" which shall be included in all the necessary paperwork. A completed copy sent to the Facilities Management (Health & Safety) team.

36.4 Disposal of all asbestos waste shall be in accordance with the latest edition of the relevant regulations.

36.5 The Contractor shall, prior to submission of his account, provide a copy of the fully documented and signed consignment note form HWCNO1 v051 shall be forwarded to the employers asbestos section.

36.6 All asbestos shall be disposed of at a landfill site licensed to receive asbestos waste and the Contractor shall include for all charges connected therewith in his tender and for the transportation to site.

37.0 Procedure for Removing Loose Fill/Earth

37.1 When working on/or in areas containing loose fill earth the Contractor shall include for carrying out the following procedure:

a) Removing specified material from all surfaces with the exception of the loose fill/earth up to and including decontaminating all other surfaces.

b) Remove all surface rubble and debris from surface of loose fill/earth.
c) Remove all loose fill/earth down to specified depth or to virgin ground until the results of random bulk sample analysis taken by the Asbestos Consultant or their nominated representative indicate no asbestos material to be present.

d) In some circumstances which shall be specified the area shall be capped with concrete topped with cordex or equal and approved and recorded. Notices shall be affixed as necessary.

38.0 Procedure for Cased Boilers During Asbestos Abatement

38.1 The metal boiler casing or jacket is to be carefully removed, cleaned down and decontaminated and set aside within the enclosure for inspection and re-use. Any residual insulation within the casing is to be removed/disposed of as asbestos waste.

38.2 If the boiler is to be removed for scrap the Contractor shall clean off all asbestos from between the sections, or by arrangement disposed of as contaminated waste.
SECTION 3 - SPECIFIC REQUIREMENTS

1.0 ASBESTOS REMOVAL

In addition to the previously detailed requirements, the following shall apply for projects involving asbestos removal:

1.1 Pre-Cleaning of the Work Area

The Contractor may clean surfaces and fittings in areas covered by the Works before any work involving the disturbance of asbestos materials commences. After cleaning, items such as electric meter and switch gear these shall be adequately sealed to prevent ingress of asbestos fibres.

1.2 Operatives Engaged in Pre-Cleaning

All Contractor's operatives engaged on this cleaning work shall wear protective clothing and respirators of an approved type and go through the hygiene unit and procedures as previously described at the end of work/shift as applicable.

1.3 Moveable Items in Work Zone

1.3.1 When specified on the description of works the Contractor shall clean and remove, through the air-locks, contaminated items stored in the work zone.

1.3.2 This work shall be carried out before any work involving the disturbance of asbestos materials is commenced. Vacuums and tack cloths shall be used. All cleaned items shall be inspected and tested by the Asbestos Consultant or their nominated representative.

1.4 The Enclosure

1.4.1 The enclosure shall be constructed in accordance with the requirements of HSG 247 and the terms set out elsewhere in this tender document.

1.4.2 The enclosure shall provide vision panels for enclosures of <10m$^3$ and CCTV for enclosures >10m$^3$. Once the enclosure has been constructed, it shall be inspected by the Asbestos Consultant or their nominated representative and a smoke test will be undertaken. It is the responsibility of the Contractor to arrange the isolation of all smoke alarm within the vicinity.

1.4.3 Once the integrity of the enclosure is deemed satisfactory by the asbestos consultant, the works may commence and background or leak air tests will be performed by the Asbestos Consultant.

1.5 Asbestos Removal Technique

1.5.1 Asbestos materials shall be removed by methods creating the minimum practicable fibre release. Fibre release within the enclosure should be reduced to the lowest reasonable level. The Contractor shall include for the provision and use of approved fibre suppressants.

1.5.2 "Strippling by High Pressure Water Jets" shall not be permitted. The Contractor shall include for all techniques which may include abrasive blasting to achieve satisfactory removal of both asbestos residue and encapsulant.

1.5.3 Unless specified or agreed by the Asbestos Consultant or their nominated representative all asbestos abatement work is to be undertaken within a controlled enclosure.
1.5.4 The Asbestos shall be removed by controlled methods by persons (over the age of eighteen years) who have received adequate training in correct working procedures, who are wearing the correct respirators and protective clothing and who are maintaining all safeguards necessary for the safe abatement of the asbestos.

1.5.5 Immediately the asbestos waste is produced, it shall be bagged and sealed in impermeable durable plastic containers.

1.5.6 Asbestos waste shall not be left lying around in the working areas.

1.5.7 The working area shall be clear of all asbestos waste at the end of each shift unless transit procedures preclude this when specific arrangements shall be detailed by the Asbestos Consultant or their nominated representative.

1.5.8 Elastomeric paint such as PVA and/or ET150 or any other sealant shall not be applied until authorised by the Asbestos Consultant or their nominated representative.

1.5.9 Where possible bag locks shall be used. Bagged, sealed waste is to be transferred to the inner chamber of the triple air lock, where it shall be thoroughly vacuumed and cleaned down and placed in a second bag, sealed again and clearly marked "Asbestos Waste". The first bag shall be red, the second bag shall be clear. Both bags shall be appropriately labeled. This double bagged waste shall then be transferred to a suitable fully enclosed lockable steel waste skip kept locked at all times it is unattended. The waste shall be subsequently transported in the manner specified below.

1.5.10 Any accidental spillage of asbestos waste must be vacuumed up immediately using 'H' type vacuum cleaners and split bags further double bagged, sealed and marked.

1.5.11 All skips are to be locked when not being accessed. The skip condition and security will remain the responsibility of the Contractor.

1.5.12 Waste shall not be taken through the main hygiene facilities. If the hygiene facilities are attached to the enclosure, separate openings for the removal of waste should be provided.

1.5.13 On completion of the removal works the Contractors Person in Charge shall satisfy themselves that the identified asbestos materials have been removed and that area is dry and free from all visible signs of dust & debris. Only then will the Asbestos Consultant or their nominated representative be invited to perform their visual inspection.

1.5.14 Once the visual inspection is complete and deemed satisfactory, the Asbestos Consultant or their nominated representative will perform clearance or reassurance air monitoring, as defined by HSG 248 The Analysts Guide.

1.5.15 Once satisfactory air monitoring has been performed, the Contractor will carefully dismantle the enclosure, making good as specified. Any damage to the Employer’s property will immediately be communicated to the Employer or the Asbestos Consultant.

1.5.16 On completion of the works, copies of waste disposal notices (waste consignment notes and landfill receipt tickets) will be provided to the Asbestos Consultant without delay.

2.0 ENCAPSULATION OF ASBESTOS MATERIALS

In addition to the previously detailed requirements, the following shall apply for projects involving encapsulation of asbestos containing materials:

2.1 The encapsulation of asbestos should be undertaken in accordance with the Control of Asbestos Regulations 2012 and should conform to all applicable legislation.
2.2 Asbestos materials shall be encapsulated by methods creating the minimum practicable fibre release. Fibre release within the enclosure should be reduced to the lowest reasonable level. The Contractor shall include for the provision and use of approved fibre suppressants. It is possible that the Contractor will be required to utilise a lance (or other suitable technique) in order to encapsulate the surfaces of certain sections of insulation. Prior to this occurring, the Asbestos Consultant or their appointed representative will firstly visually inspect all surfaces within each enclosure, to ensure that all residues etc. have been removed. Once the surfaces have been cleaned to a suitable standard, the Contractor will be required to sheet out the walls and floors prior to the application of the sealant, via a lance or other appropriate technique.

2.3 The Asbestos shall be encapsulated by controlled methods by persons (over the age of eighteen years) who have received adequate training in correct working procedures, who are wearing the correct respirators and protective clothing and who are maintaining all safeguards necessary for the safe abatement of the asbestos.

2.4 Elastomeric paint such as PVA and/or ET150 or any other sealant shall not be applied until authorised by the Asbestos Consultant or their nominated representative.

2.5 Any accidental spillage of asbestos waste must be vacuumed up immediately using 'H' type vacuum cleaners and split bags further double bagged, sealed and marked.

2.6 Where encapsulation is specified to take place, the encapsulation inclusive of reinforcing membranes shall be detailed in the scope of work with due regard to the particular site conditions.

2.7 Where brand name encapsulation is specified, the Contractor shall include for all preparatory works and application procedures either specified or required by the specified encapsulant manufacturers technical information. All encapsulation work is to be guaranteed for a minimum period of 5 years by the Contractor.

2.8 Unless otherwise specified the Contractor shall include for the use of "Decadex fire check" or equal and approved of and an approved colour to match decorations.

2.9 Should MMMF insulation be present within any of the work areas that is not wrapped and cannot be cleaned then this material shall be removed and the pipework beneath cleaned of all residues. Contractors are therefore advised to inspect such areas prior to submitting their quotations.

2.10 Asbestos rope seals to ventilation flange joints within the areas of work are to be suitably encapsulated with a suitable sealant such as ET150.

2.11 Asbestos insulation to pipework is to be repaired where necessary (at the discretion of the Asbestos Consultant or their representative) and ensure all ends/repairs of the pipework insulation are encapsulated. The ends of repaired areas of such should be wrapped with a calico wrap and sealed with a suitable sealant such as ET150 (The ends of / repaired pipe insulation will be assessed by the asbestos consultant or their representative, to ensure that the encapsulation of the pipe work is to a suitable standard, i.e. extent of calico wrap or enough coats of ET150). The number of layers and coats of sealant shall be at the discretion of the Asbestos Consultant or their representative. Sections of pipework shall be wrapped and sealed in full to avoid unsightly patchy work.

2.12 On completion of the removal works the Contractors Person in Charge shall satisfy themselves that the identified asbestos materials have been encapsulated in accordance with the specification and that area is dry and free from all visible signs of dust & debris. Only then will the Asbestos Consultant or their nominated representative be invited to perform their visual inspection.
2.13 Once the visual inspection is complete and deemed satisfactory, the Asbestos Consultant or their nominated representative will perform clearance or reassurance air monitoring, as defined by HSG 248 The Analysts Guide.

2.14 Once satisfactory air monitoring has been performed, the Contractor will carefully dismantle the enclosure, making good as specified. Any damage to the Employer’s property will immediately be communicated to the Employer or the Asbestos Consultant.

3.0 **DECONTAMINATION OF ASBESTOS DEBRIS – ENVIRONMENTAL CLEAN**

In addition to the previously detailed requirements, the following shall apply for projects involving encapsulation of asbestos containing materials:

3.1 The removal of asbestos debris should be undertaken in accordance with the Control of Asbestos Regulations 2012.

3.2 The Contractor shall base his works on the Analyst Guide HSG 248 and the Contractors Guide HSG247. These shall be modified to suit the Asbestos Regulations 2012.

3.3 Prior to commencement, the Contractor will liaise with the Asbestos Consultant or their nominated representative and go satisfy them that all requested documentation is present.

3.4 All non-asbestos wall/ceiling surfaces within all areas covered by the Contract shall have all loose or flaking materials scraped or wire brushed down to a firm base. All such work to be undertaken within the enclosure. This shall include the scraping back of loose and flaky paint to walls and the removal of residues that may remain to exposed areas, including pipework, plant, flanges etc. or beneath damaged insulation that requires removal. Application of a suitable sealant may also be required once the visual inspection has been performed by the analyst. This however will be at the discretion of Employer or the Asbestos Consultant.

3.5 In some circumstances, the Employer may wish to encapsulate asbestos debris located to walls, rather than remove. In these instances, the Contractor will only be required to encapsulate the identified debris and will not be required to remove all loose flaking paint. All such projects will be clearly specified by the Asbestos Consultant prior to commencement.

3.6 The asbestos debris shall be removed by controlled methods by persons (over the age of eighteen years) who have received adequate training in correct working procedures, who are wearing the correct respirators and protective clothing and who are maintaining all safeguards necessary for the safe abatement of the asbestos.

3.7 Immediately the asbestos waste is produced, it shall be bagged and sealed in impermeable durable plastic containers.

3.8 Asbestos waste shall not be left lying around in the working areas.

3.9 The working area shall be clear of all asbestos waste at the end of each shift unless transit procedures preclude this when specific arrangements shall be detailed by the Asbestos Consultant or their nominated representative.

3.10 Elastomeric paint such as PVA and/or ET150 or any other sealant shall not be applied until authorised by the Asbestos Consultant or their nominated representative.

3.11 Where possible bag locks shall be used. Bagged, sealed waste is to be transferred to the inner chamber of the triple air lock, where it shall be thoroughly vacuumed and cleaned down and placed in a second bag, sealed again and clearly marked "Asbestos Waste". The first bag shall be red, the second bag shall be clear. Both bags shall be appropriately labeled. This double bagged waste shall then be transferred to a suitable fully enclosed lockable steel waste skip kept locked at all times it is unattended.
3.12 Any accidental spillage of asbestos waste must be vacuumed up immediately using 'H' type vacuum cleaners and split bags further double bagged, sealed and marked.

3.13 All skips are to be locked when not being accessed. The skip condition and security will remain the responsibility of the Contractor.

3.14 Waste shall not be taken through the main hygiene facilities. If the hygiene facilities are attached to the enclosure, separate openings for the removal of waste should be provided.

3.15 On completion of the removal works the Contractors Supervisor shall satisfy themselves that the identified asbestos materials have been removed and that area is dry and free from all visible signs of dust & debris. Only then will the Asbestos Consultant or their nominated representative be invited to perform their visual inspection.

3.16 Once the visual inspection is complete and deemed satisfactory, the Asbestos Consultant or their nominated representative will perform clearance or reassurance air monitoring, as defined by HSG 248 The Analysts Guide.

3.17 Once satisfactory air monitoring has been performed, the Contractor will carefully dismantle the enclosure, making good as specified. Any damage to the Employer’s property will immediately be communicated to the Employer or the Asbestos Consultant.

3.18 On completion of the works, copies of waste disposal notices (waste consignment note and landfill receipt ticket) will be provided to the Asbestos Consultant without delay.
Section 4 - Analytical/Consultation Support

1.0 Analytical Work

1.1 The Asbestos Consultant or their nominated representative shall carry out the following:

- Obtain, read and acknowledge the specification, plan of work, method statement, programme and site working hours.

- Inspect Contractors asbestos removal license and other required documentation on site.

- From completion of enclosure integrity testing (smoke test) up to the completion of satisfactory clearance testing the Asbestos Consultant or their nominated representative shall carry out monitoring of the negative pressure within the enclosure during the works. Should the reading fall below 5 pascals (or 0.5mm.wg) the Contractor shall be immediately notified and take all necessary actions to remedy the situation.

- Witness the smoke tests of enclosures in which asbestos is to be disturbed. On satisfactory completion the Asbestos Consultant or their nominated representative shall complete and sign a copy of an integrity of enclosure certificate.

- Check that Contractors operatives wear appropriate PPE & RPE.

- Undertake background and leak air monitoring outside the enclosure to test the effectiveness of the measures taken to prevent the escape of asbestos fibres. The frequency and length of test shall be dependent on site circumstances. All works shall be carried out in accordance with the Asbestos Regulations 2012 and MDHS3914 or any subsequent regulations.

- Undertake personal air monitoring and background monitoring within the enclosure to confirm the adequacy of the asbestos Contractors assessment with regards to fibre levels and level of PPE, also to confirm that fibre levels within the enclosure are kept to the lowest level reasonably practicable and below the levels shown in the Asbestos Regulations 2012.

- Carry out periodic visual inspection of the enclosure and bring to the attention of the Contractor any defects noted.

- Complete pro-forma daily inspection checklists and monitoring report sheets as necessary.

- In accordance with the Control of Asbestos Regulations 2012, HSG 248 The Analysts Guide, or subsequent regulations, carry out clearance procedure following completion of disturbance work. Record all details of clearance certification.

1.2 Air Monitoring

1.2.1 The Asbestos Consultant or their nominated representative shall remain on-site whilst air monitoring equipment is in operation.

1.2.2 Air monitoring equipment shall be in accordance with the requirements of HSE guidance note HSG 248 The Analysts Guide, or subsequent guidance or regulations, and shall be suitably calibrated.

1.2.3 The monitoring sample shall normally be a period and flow rate volume of 60 minutes at 8 litres per minute giving a 480 litre sample. Counting shall be as shown in HSG 248 The Analysts Guide.
1.2.4 When applicable air monitoring shall normally commence between 30 and 60 minutes from the start of disturbance removal work. The number and frequency of samples shall stipulated by the Asbestos Consultant or their nominated representative.

1.2.5 The Asbestos Consultant or their nominated representative shall immediately inform the Contractor and the Employer if any monitoring sample outside of the enclosure exceeds 0.010 f/ml.

1.2.6 The Asbestos Consultant or their nominated representative shall immediately inform the Contractor and Employer if any monitoring sample taken within the work enclosure exceeds that stated in the Contract Method Statement.

1.2.7 The Asbestos Consultant or their appointed analyst shall carry out Leak testing during removal or encapsulation works.

1.2.8 The appointed analytical organisation shall hold UKAS accreditation to ISO 17025 standards.

1.3 Monitoring Strategy

1.3.1 Where, in exceptional circumstances, the area around the enclosure is to remain occupied and/or serves as an access route, continuous monitoring, normally consisting of 1 hour sampling periods, may be undertaken. This shall be detailed by the Asbestos Consultant or their nominated representative.

1.4 Assistance in Access

The Contractor shall provide the Asbestos Consultant or their nominated representative with a suitable area and power supply to carry out site monitoring and all the necessary assistance to complete the required inspection and testing including: access equipment, electrical supply, decontamination facilities and lighting to complete the work. The Asbestos Consultant or their nominated representative shall normally provide protective clothing and appropriate respiratory protection for his own use.

1.5 Clearance Procedure

This shall be in accordance with Regulation 16 of the Control of Asbestos at Work Regulations 2012 or subsequent regulations.

1.6 Information

Information referring to the extent of the contracts can be found in the Specification and/or description of works.

1.7 Monitoring Sheets & Certificates

All records shall be kept by the Asbestos Consultant or their nominated representative when on site and be open to viewing by authorised persons including the Contractor.

1.8 Air Monitoring Failure Procedure

If any air sample taken outside the enclosure has a fibre concentration in excess of 0.01 f/ml the Contractor shall stop asbestos removal work and take all practicable steps to check and improve his enclosure, ventilation system and decontamination procedures. The Contractor shall not recommence asbestos removal work until further air samples confirm that the fibre concentration level does not exceed 0.010f/ml. The cost of these further samples shall be borne by the Contractor.
1.9 Re-Cleaning of Enclosure

If any of these criteria are not met the Contractor shall re-clean the whole of the enclosed area.

1.10 Air Monitoring, Clearance Testing & Bulk Sample Analysis for Asbestos Work

The Contractor shall include for the costs of the provision and individually exclusive use of the hygiene facilities by the Asbestos Consultant or their nominated representative and for the provision of safe access including lighting to complete the analytical testing works:

1.11 Site Surveillance

Any dangerous working practices on the part of the Contractor noted by the Asbestos Consultant or their nominated representative shall cease immediately and shall be brought to the attention of the Employer.

1.12 Hygiene Procedures & Protective Clothing

1.12.1 The Asbestos Consultant or their nominated representative shall have use of the Contractor’s hygiene facilities on-site.

1.12.2 The Asbestos Consultant or their nominated representative shall liaise with the Contractor prior to entering any enclosure/work area to determine the level of appropriate personal protection required.

1.12.3 The Asbestos Consultant or their nominated representative shall provide upon request of the Contractor, evidence of suitable training and medical surveillance records to the Contractor prior to entering the works enclosure.

1.13 Site Clearance

This shall be carried out in accordance with the Control of Asbestos at Work Regulations 2012, or the latest edition of the asbestos regulations.

1.14 Site Clearance Certification for Re-occupation

This shall be carried out in accordance with the Control of Asbestos at Work Regulations 2012, or the latest edition of the asbestos regulations or guidance notes.

1.15 Four Stage Site Clearance Certification

1.15.1 The Contractor shall include for liaising with the Asbestos Consultant or their nominated representative and the Analyst Contractor to ensure that the necessary works are carried out and the four stages are witnessed and the certification is completed by the analyst.

1.15.2 The four stage clearance shall be in accordance with the Control of Asbestos at Work Regulations 2012, or the latest edition of the asbestos regulations or guidance notes.

2.0 University Approved Asbestos Consultant (AAC)/ Asbestos Manager (AM) – Overseeing Consulting Role

2.1 The Employers AM/AAC shall act in an overseeing consulting/Auditing role during all asbestos abatement/remediation works and therefore ensure Duty of Care for the Employer. The AM/AAC shall act in the below mentioned capacity although not exhaustive:
- Informed of and involved with all pre start/site meetings in conjunction with asbestos abatement/remediation works;
- Provide suitable training/advice as required in relation the employers bespoke asbestos register and space management system;
- Liaise with the appointed asbestos analyst so to clarify specific space codes and known asbestos asset details within each relevant location, prior to the production of Method Statements and so to ensure that such information is specified on all applicable air monitoring certification;
- Review specifications/method statements and comment accordingly when required;
- Witness smoke testing of enclosures as and when required;
- Auditing of all abatement/remediation processes;
- Carrying out final inspections of all areas that have undergone asbestos abatement in conjunction with the appointed analytical organisation and producing reports accordingly;

3.0 **Survey Works**

3.1 The organisation appointed to undertake Refurbishment/Demolition Asbestos Surveys shall be accredited to ISO 17020 standards.

3.2 All asbestos data derived during the course of asbestos survey/investigative work shall be passed to the employers AM/AAC for review and those ACMs to be retained within the periphery of the employers estate shall be assigned with suitable space/asset codes and recorded in a suitable manner so to enable such data to be uploaded onto the employers bespoke asbestos register.

3.3 All known asset/space data relating to individual asbestos occurrences shall be transferred from survey data and clearly referenced within specifications/ method statements and associated air monitoring certification.
APPENDIX A

MANAGEMENT OF PLANON TSI MODULE-V1.0

Production of Asbestos Information for Planon Asbestos TSI Module - v1.0

Start Process

Define Scope of Works to include:
1. Building Numbers
2. Space Codes
   (See Note 1)

Print survey document pack:
Risk Assessment
Planon Specific Algorithm Sheets
(see 1.0.1 definition below)
Current CAD plans
(See Note 2)

Survey Areas within Scope of Works

Submit Samples To Laboratory for Bulk Sample Analysis

Enter material data into Planon spreadsheet
(See Note 3)

Peer review of Planon spreadsheet against surveyor notes

Format photograph, rename, define physical location, and enter hyperlink data into Planon spreadsheet
(See Note 4)

Are corrections required?

Weekly quality check of randomly generated extract from weekly surveyed
(See Note 6)

Are corrections required?

Enter priority assessment scores as defined by UoL process
(See Note 7)

Yes

No

Yes

No

Additions made to current asbestos CAD drawings to reflect new survey information
(See Note 8)

The data is issued to the UoL Asbestos Manager/Approved Asbestos Consultant for review and Upload onto the Asbestos Register
(See Note 9)

1.0.1 Each Line of Algorithm to Record
1. Date of survey
2. Building number
3. Space code (single space code only)
4. Material Description (50 character limit)
5. Single photo reference direct from camera
6. Product Type (from 20 possible types)
7. Extent of Damage (from 8 possible types)
8. Surface Treatment (from 15 possible types)
9. Surveyor Recommendation (from 12 possible types)

Format photograph, rename, define physical location, and enter hyperlink data into Planon spreadsheet
(See Note 4)

Are corrections required?

Weekly quality check of randomly generated extract from weekly surveyed
(See Note 6)

Are corrections required?

Enter priority assessment scores as defined by UoL process
(See Note 7)

Additions made to current asbestos CAD drawings to reflect new survey information
(See Note 8)

The data is issued to the UoL Asbestos Manager/Approved Asbestos Consultant for review and Upload onto the Asbestos Register
(See Note 9)
Survey Process Notes – v1.0

Note 1:

Having made the decision to survey a defined area, project manager should gather available information on the area to survey.

University owned buildings are identified by a 3 or 4 digit code; areas within the buildings are identified by space codes.

Note 2:

Having defined the scope of the survey in the previous process, a survey pack should be gathered to include:

1. Risk assessment
2. Up to date site plans clearly showing building layout and space codes
3. Survey algorithm sheets which allow the recording of:

   Each Line of Algorithm to Record
   1. Date of survey
   2. Building number
   3. Space code (single space code only)
   4. Material Description (50 character limit)
   5. Single photo reference direct from camera
   6. Product Type (from 20 possible types)
   7. Extent of Damage (from 8 possible types)
   8. Surface Treatment (from 15 possible types)
   9. Surveyor Recommendation (from 12 possible types)

Note 3:

Following sample analysis, obtain a copy of the most recent Planon Template, proceed to enter information in required format (see over). In order (left-right) the columns accept data as follows:
<table>
<thead>
<tr>
<th>Column</th>
<th>Mandatory/Required/Optional/Unique/Calculated</th>
<th>Data format</th>
<th>Maximum length</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>Mandatory, required and unique</td>
<td>Free text</td>
<td>8 characters</td>
<td>Unique asset number. WYG have controlled this centrally to avoid duplication of numbers.</td>
</tr>
<tr>
<td>B</td>
<td>Mandatory</td>
<td>Free text</td>
<td>15 characters</td>
<td>Building number (3 or 4 digit code)</td>
</tr>
<tr>
<td>C</td>
<td>Calculated</td>
<td>N/A</td>
<td>N/A</td>
<td>This column is not used</td>
</tr>
<tr>
<td>D</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>50 characters</td>
<td>Describes the floor level (currently 24 choices)</td>
</tr>
<tr>
<td>E</td>
<td>Mandatory</td>
<td>Free text</td>
<td>15 characters</td>
<td>This is the space code in which the asset resides. Space codes are unique within buildings</td>
</tr>
<tr>
<td>F</td>
<td>Calculated</td>
<td>N/A</td>
<td>N/A</td>
<td>This column is not used</td>
</tr>
<tr>
<td>G</td>
<td>Mandatory</td>
<td>Free text</td>
<td>50 characters</td>
<td>This is a textual description of the asset.</td>
</tr>
<tr>
<td>H</td>
<td>Mandatory</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>This is a path to a single image file located on the facilities management server. It is always prefixed: \fm07\Asbestos\images\</td>
</tr>
<tr>
<td>I</td>
<td>Calculated</td>
<td>N/A</td>
<td>N/A</td>
<td>Contains a predefined formula which allows column H to work correctly online</td>
</tr>
<tr>
<td>J</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the asset as either Initial entry, Reinspection/Update or Remediation</td>
</tr>
<tr>
<td>K</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines how the asbestos has been identified in the asset as one of (6 choices)</td>
</tr>
<tr>
<td>L</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the product as one of 21 types</td>
</tr>
<tr>
<td>M</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the damage seen to the asset as one of 9 levels</td>
</tr>
<tr>
<td>N</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the surface treatment to the asset as one of 17 levels</td>
</tr>
<tr>
<td>O</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes the fibre types in the asset as one of 9 sets</td>
</tr>
<tr>
<td>P</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes the recommendation of the surveyor as one of 12 possibilities</td>
</tr>
<tr>
<td>Q</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes how often the asset is likely to be disturbed (4 levels)</td>
</tr>
<tr>
<td>R</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes the location of the asset (5 choices)</td>
</tr>
<tr>
<td>S</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes how easily material can be accessed (7 choices)</td>
</tr>
<tr>
<td>T</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>30 characters</td>
<td>Textual description of the amount of material present</td>
</tr>
<tr>
<td>U</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the amount of material as one of 9 quantities</td>
</tr>
<tr>
<td>V</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the usual number of people in the area at any one time (5 choices)</td>
</tr>
<tr>
<td>W</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the frequency the area is in use (5 choices)</td>
</tr>
<tr>
<td>X</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines the average time the area is in use (5 choices)</td>
</tr>
<tr>
<td>Y</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines how likely the material will be disturbed due to maintenance (5 choices)</td>
</tr>
<tr>
<td>Column</td>
<td>Type</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Description</td>
</tr>
<tr>
<td>--------</td>
<td>------</td>
<td>-----------</td>
<td>-----</td>
<td>-------------</td>
</tr>
<tr>
<td>Z</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Defines how often the material will be disturbed due to maintenance (5 choices)</td>
</tr>
<tr>
<td>AA</td>
<td>Calculated</td>
<td>N/A</td>
<td>N/A</td>
<td>WYG has not been informed what this column contains</td>
</tr>
<tr>
<td>AB</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Contains the management action for the asset (6 choices)</td>
</tr>
<tr>
<td>AC</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes to what level the asset is notifiable (4 choices)</td>
</tr>
<tr>
<td>AD</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>Unknown</td>
<td>“Agresso” supplier number</td>
</tr>
<tr>
<td>AE</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>30 characters</td>
<td>The name of the surveyors who made this assessment</td>
</tr>
<tr>
<td>AF</td>
<td>Mandatory and required</td>
<td>Date dd/mm/yyyy</td>
<td>Date</td>
<td>The date this assessment was made</td>
</tr>
<tr>
<td>AG</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>Describes the asbestos survey type in MDHS100 format (4 choices)</td>
</tr>
<tr>
<td>AH</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>30 characters</td>
<td>The name of the laboratory that did sample analysis</td>
</tr>
<tr>
<td>AI</td>
<td>Mandatory</td>
<td>Date dd/mm/yyyy</td>
<td>Date</td>
<td>The date the sample was analysed</td>
</tr>
<tr>
<td>AJ</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>20 characters</td>
<td>The name of the original sample as on the bulk sample analysis certificate</td>
</tr>
<tr>
<td>AK</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>20 characters</td>
<td>The bulk analysis certificate number</td>
</tr>
<tr>
<td>AL</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>This column does not work on the spreadsheet</td>
</tr>
<tr>
<td>AM</td>
<td>Mandatory</td>
<td>Drop Down</td>
<td>N/A</td>
<td>This categories the asbestos as one of 11 types</td>
</tr>
<tr>
<td>AN</td>
<td>Mandatory</td>
<td>Free Text</td>
<td>200 characters</td>
<td>This column allows additional comments from University Management</td>
</tr>
<tr>
<td>AO</td>
<td>Mandatory</td>
<td>Date dd/mm/yyyy</td>
<td>Date</td>
<td>The date asset should be next inspected</td>
</tr>
<tr>
<td>AP</td>
<td>Optional</td>
<td>Free Text</td>
<td>100 characters</td>
<td>Description of remediation works carried out</td>
</tr>
<tr>
<td>AQ</td>
<td>Optional</td>
<td>Date dd/mm/yyyy</td>
<td>Date</td>
<td>Date when remediation works were complete</td>
</tr>
<tr>
<td>AR</td>
<td>Optional</td>
<td>Free Text</td>
<td>50 characters</td>
<td>Name of contractor doing remediation</td>
</tr>
<tr>
<td>AS</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF bulk analysis certificate, if appropriate It is always prefixed: \fm07\Asbestos\bsc\</td>
</tr>
<tr>
<td>AT</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF report, if produced separately It is always prefixed: \fm07\Asbestos\si\</td>
</tr>
<tr>
<td>AU</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF file combining Risk Assessments, ASB5 and Plan of Works It is always prefixed: \fm07\Asbestos\pow\asb5-ra\</td>
</tr>
<tr>
<td>AV</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF file containing smoke test certificates It is always prefixed: \fm07\Asbestos\stc\</td>
</tr>
<tr>
<td>AW</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF file containing Waste Consignment Note It is always prefixed: \fm07\Asbestos\wcn\</td>
</tr>
<tr>
<td>AX</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF file containing CAD plans with enhanced Asbestos Information It is always prefixed: \fm07\Asbestos\cad\</td>
</tr>
<tr>
<td>AY</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path the PDF file containing Key Performance Indicator documents</td>
</tr>
</tbody>
</table>
Where bulk samples and references to these materials have returned No Asbestos Detected in Sample, material and priority assessments should be entered as "N/A [0]" from the drop downs except column P, which will be "No Action Required [8]".

**Note 4:**

For each Planon ID entered into the Planon Template, a single photograph should be uploaded to the `\fm07\Asbestos\images` folder on the FM server at the University. Photographs must be uniquely named and 1 photograph must exist for each new Planon ID and subsequent re inspections and updates.

**Note 5:**

Following entry of all relevant fields, Planon Templates should be reviewed by colleagues at peer level to check that data has been entered as required and links to supporting documentation reference the correct files. Inaccurate data should be corrected.

**Note 6:**

In accordance with the quality check procedures currently in place, data entered every 7 days should be compiled and using a recognised random number generator, 10% of the data should be checked from instruction, through to survey and data entry. Any inaccurate data found should be noted and these projects re-surveyed to determine the source of inaccuracies.

**Note 7:**

Once Material Assessment Scores have been fully updated, for all Planon IDs where asbestos remains in situ, the Priority Assessment Scores matrix should be completed.

**Note 8:**

Following all data entry, CAD plans should be updated with markers showing items with the following approved symbols:

<table>
<thead>
<tr>
<th>AZ</th>
<th>Optional</th>
<th>Hyperlink</th>
<th>100 characters</th>
<th>It is always prefixed: <code>\fm07\Asbestos\kpi</code></th>
</tr>
</thead>
<tbody>
<tr>
<td>BA</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path to PDF file containing all Air Monitoring Certification during remediation works It is always prefixed: <code>\fm07\Asbestos\amc</code></td>
</tr>
<tr>
<td>BB</td>
<td>Optional</td>
<td>Hyperlink</td>
<td>100 characters</td>
<td>Path the PDF file containing final report following remediation works, including all handover documents It is always prefixed: <code>\fm07\Asbestos\ahr</code></td>
</tr>
</tbody>
</table>
Once markers have been added, CAD plans should be made into PDFs and links updated.

**Note 9:**

Finally, the data is uploaded first onto Planon ‘TEST’ to check the data will successfully upload to the Planon Asbestos TSI module. Upon successful upload, the data should be uploaded to Planon ‘LIVE’.
APPENDIX I – RELEVANT CONTACT DETAILS
<table>
<thead>
<tr>
<th>POSITION</th>
<th>NAME</th>
<th>CONTACT DETAILS</th>
</tr>
</thead>
<tbody>
<tr>
<td>Asbestos Manager</td>
<td>Mike Eastwood</td>
<td>0151 794 2908</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Mike.eastwood@liverpool.ac.uk">Mike.eastwood@liverpool.ac.uk</a></td>
</tr>
<tr>
<td>FM Safety &amp; Risk Manager</td>
<td>Stewart Crowe</td>
<td>0151 794 3172</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Stewart.crowe@liverpool.ac.uk">Stewart.crowe@liverpool.ac.uk</a></td>
</tr>
<tr>
<td>University Safety Officer</td>
<td>Stephen Dunkley</td>
<td>0151 794 3244</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:sdunkley@liverpool.ac.uk">sdunkley@liverpool.ac.uk</a></td>
</tr>
<tr>
<td>Approved Asbestos Consultants – WYG</td>
<td>Peter Worth</td>
<td>07766 998646</td>
</tr>
<tr>
<td></td>
<td>Jonathan Ford</td>
<td>07717 540961</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Peter.worth@wyg.com">Peter.worth@wyg.com</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Jonathan.ford@wyg.com">Jonathan.ford@wyg.com</a></td>
</tr>
<tr>
<td>Responsible Person</td>
<td>Steven Dickson</td>
<td>0151 794 2179</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:sdickson@liverpool.ac.uk">sdickson@liverpool.ac.uk</a></td>
</tr>
<tr>
<td>Deputy Responsible Person</td>
<td>Martin Foster</td>
<td>0151 794 2181</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Martin.foster@liv.ac.uk">Martin.foster@liv.ac.uk</a></td>
</tr>
<tr>
<td>Asbestos Framework Contractors</td>
<td>Rhodar: Chris Bourne</td>
<td>07971 951365</td>
</tr>
<tr>
<td></td>
<td>CESL: Darren Sinners</td>
<td>07966 232515</td>
</tr>
<tr>
<td></td>
<td>C&amp;D: Jim Hogan Forest: Phil Roe</td>
<td>077023 49432</td>
</tr>
<tr>
<td></td>
<td></td>
<td>07825 071642</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:C.Bourne@rhodar.co.uk">C.Bourne@rhodar.co.uk</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Darren.sinners@countrywide-environmental.co.uk">Darren.sinners@countrywide-environmental.co.uk</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Jim.hogan@candgroup.co.uk">Jim.hogan@candgroup.co.uk</a></td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:philroe@forestenvironmental.co.uk">philroe@forestenvironmental.co.uk</a></td>
</tr>
<tr>
<td>FM Help Desk</td>
<td>N/A</td>
<td>0151 794 43000</td>
</tr>
<tr>
<td></td>
<td></td>
<td><a href="mailto:Fmhelp@liverpool.ac.uk">Fmhelp@liverpool.ac.uk</a></td>
</tr>
</tbody>
</table>