

Hazardous Building Materials Report

Revised Exhibition Draft The Gap, Watsons Bay

Prepared for Ray Fitz-Gibbon & Associates Pty Ltd

Project 85743.01 July 2017





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The undersigned, on behalf of Douglas Partners Pty Ltd, confirm that this document and all attached drawings, photographic logs and Register have been checked and reviewed for errors, omissions and inaccuracies.

	Signature	Date		
Author	Mint	11 July 2017		
Reviewer		11 July 2017		





Executive Summary

Douglas Partners Pty Ltd (DP) conducted a full access sampling and identification survey (predemolition / upgrade survey) of six buildings at Watsons Bay National Park, namely Green Point Cottage, Constables Cottage, 30 Cliff Street, the Armoury, Gap Bluff Cottage, and the Officers' Mess (see Drawing 1, Appendix A). The survey was undertaken to facilitate the identification and location of asbestos-containing materials (ACM) and other hazardous materials (Hazmat Survey) to enable their removal prior to proposed demolition and refurbishment works. It involved visually identifying known or suspected hazardous materials, collecting representative samples from suspected ACM and other hazardous materials, and recording the type and location of hazardous materials throughout the accessed areas of the buildings.

From the site survey and laboratory analysis results an *Asbestos Materials and Other Hazardous Materials Register* (the Register) has been produced in accordance with the requirements of the Work Health and Safety Regulation 2011 (NSW) and other relevant legislation.

The surveyors were unable to gain full access to the following areas:

The ceiling cavity of the Officers' Mess due to height.

All areas where access was not possible must be presumed to contain asbestos until proven otherwise. See also Limitations in Section 6.

The information in this report is supplied on the understanding that the area surveyed is subject to demolition works, and that all identified asbestos and other hazardous materials will be removed prior to, or as part of these works. Any asbestos or other hazardous materials remaining *in situ* at the conclusion of the project will need to be detailed in a site specific Register and Asbestos Management Plan as required by the Work, Health and Safety Regulation 2011 (NSW).

The client should be made aware of the limitations of a survey being conducted in a destructive manner and is referred to in Section 6 – Limitations.

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Pre-demolition Hazardous Building Materials Report Various Locations – The Gap National Park

1. Introduction

This report presents the findings of an asbestos and other hazardous building materials survey undertaken by Matthew Hyde of Douglas Partners Pty Ltd (DP) at client specified buildings at The Gap National Park on 1 and 2 December 2016. The survey was undertaken in accordance with DP's proposal SYD161384, dated 10 November 2016. The survey and report was commissioned by Mr Ray Fitz-Gibbon of Ray Fitz-Gibbon & Associates Pty Ltd. The survey was undertaken to facilitate the identification and location of asbestos-containing materials (ACM) and other hazardous materials (Hazmat Survey) to enable their removal prior to proposed demolition works. It involved collecting representative bulk samples from suspected ACM and recording the type, extent and location of these and other hazardous materials throughout the buildings. This type of survey may involve intrusive or destructive inspection techniques in an attempt to locate potential concealed ACM.

The purpose of the survey was to comply with current regulations regarding proposed demolition of the buildings on the subject site. The assessment was conducted on the basis of the condition of the materials at the time of the survey and the future anticipated activities at the site.

HBMs include asbestos containing materials (ACM), synthetic mineral fibre (SMF) products, lead-containing paint (LCP) and polychlorinated biphenyl (PCB) contained in capacitors in fluorescent light fittings. The survey was undertaken to identify and record the type and location of hazardous building materials and involved visually identifying known or suspected hazardous materials, and collecting representative samples from suspected ACM and potential lead-containing paint systems throughout the buildings. Other hazardous building materials (HBMs) were identified visually (see below).

From the site survey and laboratory analysis results a Register of ACM and other hazardous materials has been produced in accordance with the requirements of the Work Health and Safety Regulation 2011 (NSW) and other relevant legislation.

HBMs including asbestos were identified or suspected during the survey. Details of the material assessments and photographs can be found within the *Asbestos Materials and Other Hazardous Materials Register* (the Register) in Appendix B.

A Certificate of Analysis for bulk samples obtained during the survey is included within Appendix C of this report.



2. Scope of Work

The scope of the hazardous building materials survey included:

- Undertake a building survey to identify HBMs in the accessible areas of the subject buildings at the client specified buildings at The Gap National Park, Watsons Bay. All floors including the roof (where accessible) were accessed;
- ii. Where accessible, collect samples of building materials suspected of or commonly known to contain hazardous material (e.g. asbestos materials, potential lead-containing paint, and settled dust for lead). SMF installations and PCBs are identified by visual assessment only;
- iii. Submit building material samples to a NATA accredited laboratory for analysis, document the results and provide photographs of positive findings; and
- iv. Provision of an Asbestos Materials Register (and other HBMs) in accordance with the requirements of WHS Regulation 2011 (NSW) as part of this Hazardous Building Materials Assessment Report.

No survey inspection can be guaranteed to locate all asbestos and other hazardous materials without extensive destruction of the building and therefore this assessment cannot be regarded as absolute.

Planned or future demolition to site structures may expose situations which were concealed or otherwise impractical or a health hazard to access during this assessment. The client should be aware that asbestos ceilings and panels etc. may conceal further ACM, for example asbestos insulated duct or lagged pipework. Removal of asbestos products to identify concealed ACM requires additional controlled conditions and is beyond the scope of a normally executed survey.

3. Site Description

The site at The Gap national Park consists of six buildings on two lots, specified as Lot 3 DP 605078, and DP455565. The buildings covered by this report include those identified as Green Point Cottage, Constables Cottage, 30 Cliff Street, The Armoury, Gap Bluff Cottage, and the Officers' Mess, as per the client supplied site plan. The individual addresses are shown on Drawing 1, Appendix A.

Green Point Cottage is a single storey timber framed building with external weatherboards and a corrugated sheet metal roof with timber weatherboard gables. The floor is constructed of floating timber floorboards. A small timber framed extension to the west is covered with a skillion roof, and is sheeted internally and externally with flat fibre cement.

The Constables Cottage is a single storey timber framed weather board building with a hipped corrugated sheet metal roof and timber floor boards. A corrugated sheet metal verandah faces the west, and to the east there are multiple skillion roofed extensions on concrete hardstand.

30 Cliff Street is a single storey brick veneer building with a hipped corrugated sheet metal roof and timber floorboards.

The Armoury is single storey double brick building with hipped corrugated sheet metal roof and timber floorboards.



The Gap Bluff Cottage is a single storey timber framed weather board building with a gable ended tiled roof on timber floorboards, with a skillion roofed extension to the north on concrete hardstand.

The Officers' Mess is a masonry building with two sections; the older original building is to the west and consists of a double brick, two storey, masonry construction with a hipped tiled roof and timber floorboards. The extension to the east is a masonry and suspended concrete two storey building connected by a hallway

Hazardous building materials have been identified in all of the buildings. Refer to Appendix B for the types and locations.

4. Fieldwork Methodology

4.1 Inspection Methods

The DP licensed asbestos assessor (Matthew Hyde) undertook a systematic survey of the nominated areas with a view to identifying the type, location and extent of asbestos and other hazardous building materials prior to the proposed demolition / refurbishment at the site.

In order to expose potential concealed construction materials, survey techniques may involve the use of destructive techniques and the opening up of holes in fixtures or fittings in an intrusive manner to facilitate sample collection. DP is not liable for any reinstatement or associated costs to make good. These techniques are employed on the understanding that the area is to be demolished and any hazardous materials identified are removed prior to the building being demolished/re-occupied.

Where the surveyor encounters access restrictions during the survey, these situations are documented and reported (refer Executive Summary).

4.2 Sampling Methodology

All sampling was undertaken according to DP's field procedures HAZSAMP. Asbestos bulk samples were obtained using fibre suppressant techniques in order to minimise fibre release and breaking small portions from the bulk of the suspected ACM using hand tools.

Lead-paint samples were taken by scraping off paint from the suspect area and dust swabs taken with 'ghost' wipes. The sampling tools were decontaminated prior to collecting each sample in accordance with DP's field procedures HAZDEC.

The collected samples were recorded, placed in sealed, labelled plastic bags and sent to a laboratory NATA accredited to ISO/IEC 17025 for the scientific identification methods of analysis employed. For similar or repetitive building elements, a representative bulk sampling protocol has been adopted following visual examination and assessment.

SMF materials were identified by visual inspection only. Serial numbers of capacitors in fluorescent light capacitors were recorded only where it was safe to do so and the details of the capacitor



identified within were checked against the 1997 ANZECC register for Identification of PCB-Containing Capacitors. Only one of each type of fluorescent light fitting was inspected.

4.3 Analytical Methods

The asbestos materials were qualitatively identified in the laboratory by polarised light microscopy (PLM) in conjunction with dispersion staining in accordance with AS: 4964-2004 Method for the qualitative identification of asbestos in bulk samples.

The testing of paint and dust samples for lead content involved the quantitative analysis of lead following sample digestion using ICP-AES/MS, ICP-OES and or CV/AAS. All laboratory analytical methods employed are NATA endorsed.

The Certificate of Analysis is attached in Appendix C.

5. Recommendations Summary

Refer to Appendix B for the Asbestos Materials Register and Other Hazardous Materials Register for recommendations, comments and suggested actions.

5.1 Asbestos-containing Materials Identified

Prior to any demolition, decommissioning, or refurbishment, ACM liable or likely to be disturbed by those works should be removed in accordance with the Code of Practice: How to Safely Remove Asbestos [Safe Work Australia (2011)]. The transport and disposal of asbestos waste is regulated by the EPA. According to the *Waste Classification Guidelines, Part 1 Classifying Waste* (NSW EPA 2014), asbestos waste is considered Special Waste and has unique regulatory requirements. All asbestos waste must be legally disposed of at an appropriately licensed waste disposal facility and records must be kept of disposal i.e. waste dockets or receipts.

5.1.1 Friable and Bonded Asbestos

ACM are referred to as either friable or bonded. Friable ACM exhibits the greatest risk to human health as fibres are released upon minimal disturbance.

Friable asbestos is in the form of a powder, or can be crumbled, pulverized or reduced to powder by hand pressure when dry. Friable asbestos includes materials such as: sprayed insulation, pipe or cylinder insulation, low density boards, woven textiles, millboard, paper and gaskets. These products can release fibres with only minimal disturbance.

Bonded asbestos products are ones in which the asbestos fibres are bound within the matrix of the material. Bonded asbestos is difficult to damage or cause the release of fibres by hand and includes materials such as asbestos cement products (fibre cement or 'fibro'), vinyl floor tiles, linoleum, mastic



and 'zelemite' electrical backing boards. However, bonded ACM that have been subjected to weathering, physical damage, water damage, fire or other conditions may present exposed fibre bundles or loose fibres which could be released upon disturbance.

The asbestos information contained within this report is insufficient to meet the requirement for a full risk assessment for an ongoing management plan (if required). Any asbestos or other hazardous materials remaining *in situ* at the conclusion of the demolition project will need to be detailed in a site Asbestos Materials Register (and other hazardous materials register) and Management Plan as required by the Work, Health and Safety Regulation 2011 (NSW), and detailed in the Code of Practice: How to Manage and Control Asbestos in the Workplace [Safe Work Australia (2011)]. Handling and disposal must be undertaken according to these guidelines and the Waste Classification Guidelines as noted above.

5.2 Other Hazardous Materials Identified

5.2.1 Synthetic Mineral Fibre

Prior to any demolition, synthetic mineral fibre materials liable or likely to be disturbed by those works should be removed in accordance with the Code of Practice for the Safe Use of Synthetic Mineral Fibres [NOHSC:2006 (1990)]. SMF waste must be disposed of in accordance with EPA and local guidelines at a licensed land fill facility.

Loose or bonded SMF that has severely deteriorated has the potential of becoming airborne. Health effects that may occur with exposure to certain SMF materials include: irritation of the skin, eyes and upper respiratory tract.

5.2.2 Lead-based Paint and Dust

The selection of the most appropriate removal control measures should be determined from risk assessments and detailed knowledge of the workplace and proposed activities. Removal is to be undertaken prior to any demolition or decommissioning in accordance with AS 4361.2 - 1998 *Guide to lead paint management, Part 2: Residential and commercial buildings*'. Disposal of waste contaminated with lead (including lead paint waste/dust) should be undertaken according to EPA *Waste Classification Guidelines, Part 1 Classifying Waste* (2014).

5.2.3 PCBs

All capacitors containing or suspected as containing PCB should be removed by a specialist electrical contractor prior to any demolition or decommissioning, in accordance with the Code of Practice for the safe handling of equipment containing Polychlorinated Biphenyl (PCB) Electrical Contractors' Association of Australia (1993).

PCB material and waste must be transported in accordance with the Australian Dangerous Goods Code, EPA guidelines, Chemical Control Order (CCO 1997) and other applicable legislative requirements. PCB waste must be legally disposed of or treated at an appropriately licensed waste disposal facility and records kept of disposal i.e. waste dockets or receipts.



Should any further suspect ACM or other hazardous materials become evident during demolition works, then works should stop in that area and the suspect material be inspected by a competent person.

6. Limitations

Douglas Partners (DP) has prepared this report for a project at client specified buildings at The Gap National Park in accordance with DP's proposal, SYD161384 dated 10 November 2016 and acceptance received from Mr Ray Fitz-Gibbon of Ray Fitz-Gibbon & Associates Pty Ltd in November 2016.

The work was carried out under DP's Conditions of Engagement. The report is provided for the exclusive use of Ray Fitz-Gibbon & Associates Pty Ltd It should not be used by or relied upon for other projects or purposes on the same or other site or by a third party. Any party so relying upon this report beyond its exclusive use and purpose as stated above, and without the express written consent of DP, does so entirely at its own risk and without recourse to DP for any loss or damage. In preparing this report DP has necessarily relied upon information provided by the client and/or their agents.

The results provided in the report are indicative of the conditions observed on the date of inspection. Changes may occur after DP's inspection and field testing has been completed. Whilst the surveyors make every reasonable effort, DP cannot guarantee that every ACM has been identified and survey results are definitive. Some ACM could be present in the building that may only be discovered by extensive invasion of structures, or when the building is subject to demolition or major refurbishment works.

DP's advice is based upon the conditions encountered during this investigation and by the scope and feasibility of the investigations based on accessibility and other limitations. The accuracy of the advice provided by DP in this report may be limited by inaccessible areas and differing conditions between observed locations. The advice may also be limited by budget constraints imposed by others and the scope of works undertaken constrained as a result, or may have been limited by site accessibility. This report must be read in conjunction with all of the attached and should be kept in its entirety without separation of individual pages or sections. DP cannot be held responsible for interpretations or conclusions made by others unless they are supported by an expressed statement, interpretation, outcome or conclusion stated in this report.

The scope of the survey was to identify every reasonably accessible ACM. Reasonably accessible does not extend to searching for concealed ACM within concrete encased structural beams or beneath concrete floors, behind other ACM, or any other locations which, to access, would cause structural damage that could potentially destabilise the structure or the building. Given the way in which ACM was used in the construction of buildings, some ACM may only be detected during the course of subsequent demolition.

The sampling regime is dictated by the building nature. Sufficient representative bulk samples were taken throughout the building i.e. one like sample per consistent material type, situation or item. It is advisable to assume that materials similar to those positively identified as asbestos also contain asbestos until proven to be otherwise. It should not automatically be assumed that materials similar in



appearance to those tested and found not to contain asbestos also do not contain asbestos. Due to the very low concentration of asbestos fibres and the non-homogenous matrix of vinyl floor tiles, false negative results may be obtained. With some asbestos containing bulk material it can be very difficult or impossible to detect the presence of asbestos using the polarised light microscopy analytical method, even after ashing or disintegration of samples. This is due to the small length or diameter of asbestos fibres present in the material, or attributed to the fact that very fine fibres have been dispersed individually throughout the material.

Any areas within the scope of the survey but not described within the body of the report or in the Asbestos Materials Register and other hazardous materials register should be regarded by the client as not having been surveyed, and thus may potentially contain ACM. A competent person should assess such areas before any work affecting them is carried out.

It must be assumed that building materials visually assessed as asbestos contain amphibole asbestos, until sampled and laboratory analysis proves otherwise. All areas where access was not possible must also be assumed to contain asbestos until proven otherwise. Subsurface drains, pipes and formwork or surrounds may be constructed of asbestos cement but subsurface areas are not accessed. Any subsurface pipes, particularly those constructed of cement, should be assumed to contain asbestos until otherwise assessed.

Please note the following limitations and restrictions to specific installations and locations that are commonly found during surveys of this nature. Even if safe access can be provided through consultation with the client, this survey and report may not include the following areas:

- Risers, ceiling, floor, wall cavities and voids may be completely blocked or bricked in.

 Occasionally may only be detected if shown on building construction plans or during demolition;
- Columns or structural elements these will not be penetrated if doing so will damage the stability of the building;
- Roofs and external areas these will only be inspected if safe access can be achieved;
- Confined spaces these will only be inspected if safe access can be achieved;
- Restricted access areas subject to restricted or specialist access will not be inspected unless prior arrangements have been made through the client within the scope of the survey;
- Lifts / lift shafts these will not be inspected for safety reasons unless a lift engineer accompanies the surveyor;
- Live plant or electrical installations live electrical installations including fuse boxes, electrical control cabinets, distribution panels etc. are not routinely inspected for safety reasons. Electrical equipment will only be examined if it is locked off and an isolation certificate has been issued. Under exceptional circumstances, when arranged by the client, examination of non-isolated equipment may take place under the supervision of an electrician;
- **Boilers** may contain asbestos internally, or conceal further ACM, which are not accessible until the boiler is dismantled. Note: Where a bulk sample is obtained from a non-dismantled boiler it should not be regarded as definitive of all materials contained within the boiler's structure;
- Live refrigerators, cold rooms, mechanical equipment, heater units, kilns may contain asbestos internally, which is not visible or accessible until the unit is isolated and dismantled; and
- Safes the walls of some safes cannot be penetrated even where access arrangements have been made.



The recommendations and conclusions contained in this report shall not abrogate a person of their responsibility to work in accordance with Statutory Requirements, Codes of Practice, Guidelines, Material Safety Data Sheets, Work Instructions or industry best practices.

7. Legislation and References

- Work Health and Safety Act and Regulations 2011 (Commonwealth, NSW, ACT & QLD).
- Dangerous Substances Act and Regulations 2004 (ACT).
- Work Health and Safety Act and Regulations 2012 (SA, TAS).
- Occupational Health and Safety Act 2004 and Regulations 2007 (VIC).
- Occupational Health and Safety Act 1984 [Amended 7 January 2011] and Regulations 1996 (WA). Health (Asbestos) Regulations 1992 (WA).
- Work Health and Safety (National Uniform Legislation) Act 2011 (NT)
- Work Health and Safety (National Uniform Legislation) Regulations 2013 (NT).

Asbestos

- Code of Practice: How to Manage and Control Asbestos in the Workplace [Safe Work Australia (2011)].
- Code of Practice: How to Safely Remove Asbestos [Safe Work Australia (2011)].
- Code of Practice for the Management and Control of Asbestos in Workplaces [NOHSC: 2018 (2005)].
- Code of Practice for the Safe Removal of Asbestos, [NOHSC: 2002 (2005)].
- Compliance Code Managing asbestos in workplaces [Worksafe VIC (2008)].
- Compliance Code Removing asbestos in workplaces [Worksafe VIC (2008)].
- AS 4964 2004 "Australian Standard™ Method for the qualitative identification of asbestos in bulk samples".
- Guidance Note on the Membrane Filter Method for Estimating Airborne Asbestos Fibres 2nd Edition, [NOHSC:3003 (2005)].
- AS 2601 2001 "Australian Standard™ The Demolition of Structures, Section 1.6".
- Demolition Work Code of Practice (NSW WorkCover 2014).
- Health and Safety Laboratory UK HSG 264 Asbestos The Survey Guide 2010.
- Health and Safety Laboratory UK Methods for the Determination of Hazardous Substances (MDHS) 100 Surveying, sampling and assessment of asbestos-containing materials 2001.
- Health and Safety Laboratory UK HSG 227 A Comprehensive Guide to Managing Asbestos in Premises 2002.



SMF

- National Standard for Synthetic Mineral Fibres [NOHSC: 1004 (1990)].
- Code of Practice for the Safe Use of Synthetic Mineral Fibres [NOHSC: 2006 (1990)].
- "Position Paper on Synthetic Mineral Fibres (SMF) & Occupational Health Issues", AIOH including exposure Standards Committee 2011.
- "Industry Code of Practice for the Safe Use of Glass Wool and Rock Wool Products", jointly developed by AMNWU, CFMEU, CEPU and FARIMA, 2003.

Lead in Paint

- AS 4361.2 1998 "Australian Standard™ Guide to lead paint management, Part 2: Residential and commercial buildings".
- AS 4361.1—1995 "Australian Standard™ Guide to lead paint management, Part 1: Industrial applications".
- National Code of Practice for the Control and Safe Use of Inorganic Lead at Work [NOHSC: 2015 (1994)].
- AS 4874 2000 "Australian Standard™ Guide to the investigation of potentially contaminated soil and deposited dust as source of lead available to humans".
-) 'Standard for the Uniform Scheduling of Medicines and Poisons No. 3', National Health and Medical Research Council (NHMRC), Poisons Standard 2012.
- AS 3640 2009 "Australian Standard™ Workplace Atmospheres Method for Sampling and Gravimetric Determination of Inhalable Dust".

PCBs

- Identification of PCB–containing capacitors [(ANZECC) 1997].
- Polychlorinated Biphenyls Management Plan, [(ANZECC) 1999 revised 2003].
- Code of Practice for the safe handling of equipment containing Polychlorinated Biphenyl (PCB) Electrical Contractors' Association of Australia, 1993.
- Polychlorinated Biphenyl (PCB) Chemical Control Order 1997

Classification and Wastes

- Approved Criteria for Classifying Hazardous Substances, [NOHSC: 1008 (2004)].
- EPA Waste Classification Guidelines, Part 1 Classifying Waste (2014).

Douglas Partners Pty Ltd

Appendix A Site Drawing Notes About this Inspection Report



Source: Sixmaps



CLIENT:	Ray Fitz-Gibbon & Associates Pty Ltd					
OFFICE:	Sydney	DRAWN BY:	СВ			
SCALE:	No Scale	DATE:	14 Nov 2016			

TITLE: Site Location
Hazardous Building Materials
The Gap, Watsons Bay

PROJECT No:	85743.00
DRAWING No:	1
REVISION:	0

About this Inspection Report



Introduction

These notes are provided to amplify DP's inspection report in regard to the limitations of carrying out inspection work. Not all notes are necessarily relevant to this report.

Standards

This inspection report has been prepared by qualified personnel to current engineering standards of interpretation and analysis.

Copyright and Limits of Use

This inspection report is the property of DP and is provided for the exclusive use of the client for the specific project and purpose as described in the report. It should not be used by a third party for any purpose other than to confirm that the construction works addressed in the report have been inspected as described. Use of the inspection report is limited in accordance with the Conditions of Engagement for the commission.

DP does not undertake to guarantee the works of the contractors or relieve them of their responsibility to produce a completed product conforming to the design.

Reports

This inspection report may include advice or opinion that is based on engineering and/or geological interpretation, information provided by the client or the client's agent, and information gained from:

- an investigation report for the project (if available to DP);
- inspection of the work, exposed ground conditions, excavation spoil and performance of excavating equipment while DP was on site;
- investigation and testing that was carried out during the site inspection;
- anecdotal information provided by authoritative site personnel; and

DP's experience and knowledge of local geology.

Such information may be limited by the frequency of any inspection or testing that was able to be practically carried out, including possible site or cost constraints imposed by the client/contractor(s). For these reasons, the reliability of this inspection report is limited by the scope of information on which it relies.

Every care is taken with the inspection report as it relates to interpretation of subsurface conditions and any recommendations or suggestions for construction or design. However, DP cannot anticipate or assume responsibility for:

- unexpected variations in subsurface conditions that are not evident from the inspection; and
- the actions of contractors responding to commercial pressures.

Should these issues occur, then additional advice should be sought from DP and, if required, amendments made.

This inspection report must be read in conjunction with any attached information. This inspection report should be kept in its entirety without separation of individual pages or sections. DP cannot be held responsible for interpretations or conclusions from review by others of this inspection report or test data, which are not otherwise supported by an expressed statement, interpretation, outcome or conclusion stated in this inspection report.

Appendix B

Asbestos and other Hazardous Materials Register



Asbestos Materials Register

For Action Classification, Material Descriptions and Register Terminology please refer to GLOSSARY.

Client:	Ray Fitz-Gibbon & Associates Pty Ltd	Assessment by:	Matthew Hyde
Site location:	The Gap National Park	Assessment date:	1 & 2 December 2016

Location Description Sample No Asbestos Type Friability Status Product Type Recommendation (A1 - A4)*	Comments / Action
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Green Point Cottage is a single storey timber framed building with external weatherboards and a corrugated sheet metal roof with timber weatherboard gables. The floor is constructed of floating timber floorboards. A small timber framed extension to the west is covered with a skillion roof, and is sheeted internally and externally with flat fibre cement.



Walls to west extension, internal and external	18	Chrysotile, Amosite, and Crocidolite Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Electrical backing board	VO	Presume asbestos	Non Friable	Electrical backing board	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	

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Location Description	Sample No	Asbestos Type	Friability Status	Product Type	Recommendation (A1 - A4)*	Comments / Action	Photo
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The Constables Cottage is a single storey timber framed weather board building with a hipped corrugated sheet metal roof and timber floor boards. A corrugated sheet metal verandah faces the west, and to the east there are multiple skillion roofed extensions on concrete hardstand.



Rear bathroom walls	9	No Asbestos detected Organic Fibres Detected	Non Friable	Flat Asbestos Cement Sheet	-	-	_
Internal walls to original building	11	Chrysotile, Amosite, and Crocidolite Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Internal ceiling to original building	13	Chrysotile, and Crocidolite Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	_
Ceiling to rear extension	15	Chrysotile Asbestos detected Organic Fibres Detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Eaves to rear extension	16	Chrysotile Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	

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Location Description	Sample No	Asbestos Type	Friability Status	Product Type	Recommendation (A1 - A4)*	Comments / Action	Photo
Flat panel behind weatherboard to rear extension	VO	Presume asbestos	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Front verandah	VO	Presume asbestos	Non Friable	Electrical backing board	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	

30 Cliff Street is a single storey brick veneer building with a hipped corrugated sheet metal roof and timber floorboards.



Eaves and soffit of car port	22	Chrysotile, Amosite, and Crocidolite Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
·			Friable	Cement Sheet	,	be affected by the works, leave <i>in-situ</i> , affix aspestos warning labels, manage and re-inspect.	





Location Description	Sample No	Asbestos Type	Friability Status	Product Type	Recommendation (A1 - A4)*	Comments / Action	Photo
Front verandah	VO	Presume asbestos	Non Friable	Electrical backing board	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Rear verandah	VO	Presume asbestos	Non Friable	Electrical backing board	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	The state of the s
Laundry	23	No Asbestos detected Organic Fibres Detected	Non Friable	Vinyl Floor Tile	-	_	-
Laundry, bathroom, and toilet wall sheeting	24	Chrysotile, Amosite, and Crocidolite Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	-	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	



Location Description	Sample No	Asbestos Type	Friability Status	Product Type	Recommendation (A1 - A4)*	Comments / Action	Photo
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The Armoury is a single storey double brick building with hipped corrugated sheet metal roof and timber floorboards.



Toilet wall sheeting	2	No Asbestos detected Organic Fibres Detected	Non Friable	Flat Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	
Eaves sheeting	3	No Asbestos detected Organic Fibres Detected	Non Friable	Flat Cement Sheet	_	-	-
Packers to joists	5	Chrysotile Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	A1	Remove prior to any demolition or refurbishment works that may disturb the installation. Should the material not be affected by the works, leave <i>in-situ</i> , affix asbestos warning labels, manage and re-inspect.	

The Gap Bluff Cottage is a single storey timber framed weather board building with a gable ended tiled roof on timber floorboards, with a skillion roofed extension to the north on concrete hardstand.



Bathroom walls	25	No Asbestos detected Organic Fibres Detected	Non Friable	Flat Cement Sheet	-	-	-
Kitchen floor	26	No Asbestos detected Organic Fibres Detected	Non Friable	Vinyl Floor Tile	-	-	-



Location Description	Sample No	Asbestos Type	Friability Status	Product Type	Recommendation (A1 - A4)*	Comments / Action	Photo
Verandah soffit	27	No Asbestos detected	Non Friable	Flat Asbestos Cement Sheet	-	_	-

The Officers' Mess is a masonry building with two sections; the older original building is to the west and consists of a double brick, two storey, masonry construction with a hipped tiled roof and timber floorboards. The extension to the east is a masonry and suspended concrete two storey building connected by a central hallway.



Eaves sheeting	28	No Asbestos detected Non Organic Fibres Detected Friable	Flat Cement Sheet	-		-			
Mens Toilet to second floor	30	No Asbestos detected Non Organic Fibres Detected Friable	Flat Cement Sheet	-		-			

Other Hazardous Materials Register

Lead Paint and Lead Dust

Location and description	Sample ID	Lead	Recommendation	Photo
Green point cottage ceiling – Lead (Pb) Dust	19	3.1mg/m ²	Remove without discharge to the environment	-
Green point cottage – cream pain to external walls	20	<0.05	<1% not classified as lead containing paint	



Location and description	Sample ID	Lead	Recommendation	Photo
Constables Cottage – Lead flashing to chimney	VO	+ve	Remove without discharge to the environment	
Constables Cottage – cream paint to exterior weatherboard	10	0.1%	<1% not classified as lead containing paint.	
Constables Cottage – dust to ceiling cavity	12	8.0mg/m²	5 mg/m². Above Pb levels permissible on window sills. Remove using appropriately trained and equipped personnel without discharge to the environment.	-
Constables Cottage – cream paint to internal window frames	14	0.3%	<1% not classified as lead containing paint.	-
Constables Cottage – white paint to external window frames	17	0.1%	<1% not classified as lead containing paint.	CONTRACTOR FOR SECURITY OF SEC
30 Cliff Street – no lead paint / lead dust sampled	-	-	_	-
The Armoury – Pb paint, Black to infill panel to ceiling of male toilets	1	12%	>1% lead-containing paint. Remove using appropriately trained and equipped personnel without discharge to the environment.	



Location and description	Sample ID	Lead	Recommendation	Photo
The Armoury – Pb paint cream to external walls	4	6.4%	>1% lead-containing paint. Remove using appropriately trained and equipped personnel without discharge to the environment.	
The Armoury – Pb paint, green to underfloor access door	6	3.2%	>1% lead-containing paint. Remove using appropriately trained and equipped personnel without discharge to the environment.	
The Armoury – Pb dust to ceiling cavity	7	0.26mg/m ²	No action necessary	-
The Armoury – Pb paint, white to walls of interior store room	8	<0.05	<1% not classified as lead containing paint.	-
Gap Cottage – no lead paint / lead dust sampled	_	-	-	-
Officers' Mess – Pb paint,grey-blue paint to gutters and windows	29	0.1%	<1% not classified as lead containing paint.	
Officers' Mess – Pb Flashing to roof	VO	+ve	Remove using appropriately trained and equipped personnel without discharge to the environment.	-
Officers' Mess – Pb paint, cream to foyer	31	0.1%	<1% not classified as lead containing paint.	



Synthetic Mineral Fibres (SMF)

Location and description	Sample ID	Friability	Recommendation	Photo Identification
30 Cliff Street – Laundry Medium Hot water unit	VO	Non-friable	Remove prior to major demolition works	
The Armoury – Roof Cavity SMF insulation	VO	Friable	Remove prior to major demolition works	
The Armoury – instant hot water unit (Zip Hydroboil)	VO	Non-friable	Remove prior to major demolition works	
The Officers' Mess – AC ductwork	VO	Non-friable	Remove prior to major demolition works	



Location and description	Sample ID	Friability	Recommendation	Photo Identification
The Officers' Mess – instant hot water unit (Zip Hydroboil)	VO	Non-friable	Remove prior to major demolition works	

Polychlorinated Biphenyls (PCB)

Location and description	Sample ID	Recommendation	Photo identification
Number 43 – internal light fitting throughout	VO	Remove prior to major demolition / refurbishment works.	-



Glossary

The asbestos information in this report is supplied on the understanding that the area surveyed is to be subject to demolition or major refurbishment and that all the identified **ACM** and other hazardous materials will be removed as part of those works.

Action *

		Remove prior to demolition, refurbishment, decommissioning or maintenance
A1	Action 1	All asbestos and other hazardous materials likely or liable to be disturbed should be removed prior to, or during demolition, refurbishment, decommissioning or maintenance.

Douglas Partners adopt the following material assessments for asbestos in order to assess the risks associated with the **ACM** identified:

Friability

Variable	Score	Description
Friable	Y	Material which when dry may become crumbled, pulverised or reduced to powder by hand pressure. Includes severely weathered or damaged cement products.
	N	Bonded

Materials Assessment

Variable	Scores	Score Description			
Asbestos Type	0	No asbestos			
	1	Chrysotile only			
	2	Amphibole asbestos (excluding Crocidolite)			
	3	Crocidolite			
Product Type	0	No asbestos detected			
	1	Bonded asbestos in good condition			
	2	Friable asbestos in good condition or cement in poor condition			
	3	Friable asbestos in poor condition			



Douglas Partners adopt the following material assessments in order to assess the risks associated with hazardous materials identified other than asbestos:

Friability

Variable	Score	Description
Friable	Υ	Loose or unsealed SMF
	N	Sealed SMF
	NA	Applicable to PCB, Lead in paint

The following abbreviations or acronyms may be used in the report or register:

СН	Chrysotile (white) asbestos
CR	Crocidolite (blue) asbestos
AM	Amosite (brown) asbestos
NAD	No asbestos detected
SMF	Synthetic Mineral Fibre
PCB	Polychlorinated Biphenyls
LCP	Lead-containing paint
VO	Visual observation

Appendix C

Laboratory Report of Analysis





email: sydney@envirolab.com.au envirolab.com.au

Envirolab Services Pty Ltd - Sydney | ABN 37 112 535 645

CERTIFICATE OF ANALYSIS 158649

Client:

Douglas Partners Pty Ltd 96 Hermitage Rd West Ryde NSW 2114

Attention: Matthew Hyde, Paul Gorman

Sample log in details:

Your Reference: 85743.01, Watsons Bay
No. of samples: 3 swabs 15 materials13 paints
Date samples received / completed instructions received 07/12/16 / 07/12/16

Analysis Details:

Please refer to the following pages for results, methodology summary and quality control data. Samples were analysed as received from the client. Results relate specifically to the samples as received. Results are reported on a dry weight basis for solids and on an as received basis for other matrices.

Please refer to the last page of this report for any comments relating to the results.

Report Details:

Date results requested by: / Issue Date: 14/12/16 / 12/12/16

Date of Preliminary Report: Not Issued

NATA accreditation number 2901. This document shall not be reproduced except in full.

Accredited for compliance with ISO/IEC 17025 - Testing

Tests not covered by NATA are denoted with *.

Results Approved By:

General Manager



	ı					
Asbestos ID - materials						
Our Reference:	UNITS	158649-2	158649-3	158649-5	158649-9	158649-11
Your Reference		2	3	5	9	11
D . O . I .	-	00/44/0040	00/44/0040	00/44/0040	00/44/0040	00/44/0040
Date Sampled		30/11/2016	30/11/2016	30/11/2016	30/11/2016	30/11/2016
Type of sample		paint	paint	material	material	material
Date analysed	-	12/12/2016	12/12/2016	12/12/2016	12/12/2016	12/12/2016
Mass / Dimension of Sample	-	20x20x3mm	40x25x4mm	15x10x5mm	50x40x5mm	20x10x3mm
Sample Description	-	Beige layered fibre cement material	Beige layered fibre cement material	Grey compressed fibre cement material	Beige layered fibre cement material	Grey fibre cement material
Asbestos ID in materials	-	No asbestos detected Organic fibres detected	No asbestos detected Organic fibres detected	Chrysotile asbestos detected	No asbestos detected Organic fibres detected	Chrysotile asbestos detected Amosite asbestos detected Crocidolite asbestos detected
				T	T	T
Asbestos ID - materials						
Our Reference:	UNITS	158649-13	158649-15	158649-16	158649-18	158649-22
Your Reference		13	15	16	18	22
Data Canada d	-	00/44/0040	00/44/0040	00/44/0040	00/44/0040	00/44/0040
Date Sampled		30/11/2016	30/11/2016	30/11/2016	30/11/2016	30/11/2016
Type of sample		material	material	material	material	material
Date analysed	-	12/12/2016	12/12/2016	12/12/2016	12/12/2016	12/12/2016
Mass / Dimension of Sample	-	15x15x5mm	25x20x5mm	250x50x5mm	38x13x5mm	30x15x4mm
Sample Description	-	Grey compressed fibre cement material	Beige layered fibre cement material	Pink layered fibre cement material	Grey compressed fibre cement material	Grey compressed fibre cement material
Asbestos ID in materials	-	Chrysotile asbestos detected Crocidolite asbestos detected	Chrysotile asbestos detected Organic fibres detected	Chrysotile asbestos detected	Chrysotile asbestos detected Amosite asbestos detected Crocidolite asbestos detected	Chrysotile asbestos detected Amosite asbestos detected Crocidolite asbestos detected

Asbestos ID - materials						
Our Reference:	UNITS	158649-23	158649-24	158649-25	158649-26	158649-27
Your Reference		23	24	25	26	27
Date Sampled Type of sample		30/11/2016 material	30/11/2016 material	30/11/2016 material	30/11/2016 material	30/11/2016 material
Date analysed	-	12/12/2016	12/12/2016	12/12/2016	12/12/2016	12/12/2016
Mass / Dimension of Sample	-	60x58x2mm	25x25x3mm	40x35x4mm	60x50x2mm	30x20x4mm
Sample Description	-	Beige brittle vinyl tile	Grey fibre cement material	Beige layered fibre cement material	Beige brittle vinyl tile & adhesive	Brown layered fibre cement material
Asbestos ID in materials	-	No asbestos detected Organic fibres detected	Chrysotile asbestos detected Amosite asbestos detected Crocidolite asbestos detected	No asbestos detected Organic fibres detected	No asbestos detected Organic fibres detected	No asbestos detected

Asbestos ID - materials			
Our Reference:	UNITS	158649-28	158649-30
Your Reference		28	30
	-		
Date Sampled		30/11/2016	30/11/2016
Type of sample		material	material
Date analysed	-	12/12/2016	12/12/2016
Mass / Dimension of Sample	-	35x20x3mm	40x30x4mm
Sample Description	-	Beige layered fibre cement material	Beige layered fibre cement material
Asbestos ID in materials	-	No asbestos detected Organic fibres detected	No asbestos detected Organic fibres detected

Lead in swab Our Reference: Your Reference	UNITS	158649-7 7	158649-12 12	158649-19 19
Date Sampled Type of sample		30/11/2016 swab	30/11/2016 swab	30/11/2016 swab
Date prepared Date analysed	-	08/12/2016 08/12/2016	08/12/2016 08/12/2016	08/12/2016 08/12/2016
Lead in Swabs	μg/swab	260	8,000	3,100

Lead in Paint						
Our Reference:	UNITS	158649-1	158649-4	158649-6	158649-8	158649-10
Your Reference		1	4	6	8	10
	-					
Date Sampled		30/11/2016	30/11/2016	30/11/2016	30/11/2016	30/11/2016
Type of sample		paint	paint	paint	paint	paint
Date prepared	_	08/12/2016	08/12/2016	08/12/2016	08/12/2016	08/12/2016
Bate propared				00,12,2010		
Date analysed	-	08/12/2016	08/12/2016	08/12/2016	08/12/2016	08/12/2016
Lead in paint	%w/w	12	6.4	3.2	<0.05	0.1
			•	•	•	•
Lead in Paint						

	Lead in Paint						
	Our Reference:	UNITS	158649-14	158649-17	158649-20	158649-21	158649-29
	Your Reference		14	17	20	21	29
		-					
	Date Sampled		30/11/2016	30/11/2016	30/11/2016	30/11/2016	30/11/2016
_	Type of sample		paint	paint	paint	paint	paint
-	Date prepared	-	08/12/2016	08/12/2016	08/12/2016	08/12/2016	08/12/2016
	Date analysed	-	08/12/2016	08/12/2016	08/12/2016	08/12/2016	08/12/2016
	Lead in paint	%w/w	0.3	0.1	<0.05	0.1	0.1

Lead in Paint		
		450040.04
Our Reference:	UNITS	158649-31
Your Reference		31
	-	
Date Sampled		30/11/2016
Type of sample		paint
Date prepared	-	08/12/2016
Date analysed	-	08/12/2016
Lead in paint	%w/w	0.1

Method ID	Methodology Summary
ASB-001	Asbestos ID - Qualitative identification of asbestos in bulk samples using Polarised Light Microscopy and Dispersion Staining Techniques including Synthetic Mineral Fibre and Organic Fibre as per Australian Standard 4964-2004.
Metals-005	Digestion of Dust wipes/swabs and /or miscellaneous samples for Metals determination by ICP-AES/MS and/or CV-AAS
Metals-004	Digestion of Paint chips/scrapings/liquids for Metals determination by ICP-AES/MS and or CV/AAS.

		0110	III IZEIEIEIIC	· ·	743.01, Wat	Jone Bay		
QUALITYCONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Lead in swab						Base II Duplicate II %RPD		
Date prepared	-			08/12/2 016	[NT]	[NT]	LCS-1	08/12/2016
Date analysed	-			08/12/2 016	[NT]	[NT]	LCS-1	08/12/2016
Lead in Swabs	μg/swa b	1	Metals-005	<1	[NT]	[NT]	LCS-1	101%
QUALITYCONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Lead in Paint						Base II Duplicate II %RPD		
Date prepared	-			08/12/2 016	[NT]	[NT]	LCS-1	08/12/2016
Date analysed	-			08/12/2 016	[NT]	[NT]	LCS-1	08/12/2016
Lead in paint	%w/w	0.05	Metals-004	<0.05	[NT]	[NT]	LCS-1	98%

Report Comments:

Asbestos ID was analysed by Approved Identifier: Lucy Zhu
Asbestos ID was authorised by Approved Signatory: Paul Ching

INS: Insufficient sample for this test PQL: Practical Quantitation Limit NT: Not tested

NR: Test not required RPD: Relative Percent Difference NA: Test not required

<: Less than >: Greater than LCS: Laboratory Control Sample

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Revision No: R 00

Quality Control Definitions

Blank: This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.

Duplicate: This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.

Matrix Spike: A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.

LCS (Laboratory Control Sample): This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.

Surrogate Spike: Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

Laboratory Acceptance Criteria

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the batch were within the laboratory acceptance criteria.

Filters, swabs, wipes, tubes and badges will not have duplicate data as the whole sample is generally extracted during sample extraction.

Spikes for Physical and Aggregate Tests are not applicable.

For VOCs in water samples, three vials are required for duplicate or spike analysis.

Duplicates: <5xPQL - any RPD is acceptable; >5xPQL - 0-50% RPD is acceptable.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals; 60-140% for organics (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

In circumstances where no duplicate and/or sample spike has been reported at 1 in 10 and/or 1 in 20 samples respectively, the sample volume submitted was insufficient in order to satisfy laboratory QA/QC protocols.

When samples are received where certain analytes are outside of recommended technical holding times (THTs), the analysis has proceeded. Where analytes are on the verge of breaching THTs, every effort will be made to analyse within the THT or as soon as practicable.

Where sampling dates are not provided, Envirolab are not in a position to comment on the validity of the analysis where recommended technical holding times may have been breached.

Measurement Uncertainty estimates are available for most tests upon request.

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Revision No: R 00

											Geotechnics Environment Groundwater	rironment Ground	dwater
Client:		Douglas Partners	ners			Project Number	lber	85743.01		To:	Envirolab Services		
Contact Person:	son:	Matthew Hyde	de			Project Name:	.e:	Watsons Bay		Contact Person:	Aileen Hie		
Project Mgr:		Paul Gorman				PO No.:				Address:			
						lab Quote No. :		1	1110		ISW	2068	
Address:	96 Hermitage Road	Road SW 2114				Date results		3	Standery	Phone:	02 9910 6200		
	west kyde in	+117 MG				Note: Inform	lab in advance	if urgent turna	or cnoose: Note: Inform lab in advance if urgent turnaround is required - surcharges apply	Fax:	02 9910 6201 ahie@envirolab.com.au		
Phone:	9990 6086	Mob:	+61413886051			Report form	Report format: esdat / PDF / Excel	DF / Excel		Laboratory Report No:			
Email:	Matthe Paul.G	Matthew Hyde Paul.Gorman	@doug	@douglaspartners.com.au @douglaspartners.com.au	com.au	Comments:				Lab Comments:			
		Sample	Sample information						Tests Required	uired			Comments
Lab Sample ID	Field Sample ID	Depth	Date sampled	Container	Type of sample	Asbestos	% Peaq	Lead mg				Provide as	Provide as much information about the sample as you can
	-	NA	30/11/2016	BAG			×						
	2	NA	30/11/2016	BAG		×						7	
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	9	AN AN	30/11/2016	BAG			×						
	7	NA A	30/11/2016	BAG				×					
	8	NA	30/11/2016	BAG			×						
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	15	NA	30/11/2016	BAG	S. C. C. C. C.	×							7.0.1
sk.	16	NA	30/11/2016	BAG		×						Date Re	Date Received: 7-12-10
	17	NA NA	30/11/2016	BAG			×					Time Re	Time Received: 12.00
	18	AA	30/11/2016	BAG	8	×						Receive	Received by: JE
	19	¥ ×	30/11/2016	BAG			>	×				Temp: C	Temp: Cool/Ambient
1	21	NA NA	30/11/2016	BAG			< ×					Cooling	Cooling: Ice/Icepack
	22	NA NA	30/11/2016	BAG		×						Security	Security Intacy Broken None
	23	NA	30/11/2016	BAG	1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	×)
	24	NA	30/11/2016	BAG	No. of the latest	×							
	25	¥:	30/11/2016	BAG		×							
	26	N N	30/11/2016	BAG		××							
T	28	N AN	30/11/2016	BAG		×							
	29	AN	30/11/2016	BAG			×						
	30	NA	30/11/2016	BAG		×							
	31	NA	30/11/2016	BAG	100 M		×						
uished	Relinquished by: Douglas Partners	Partners /	1			Sample Receipt	eipt			Lab use only:			
r (by	Courier (by whom)	1 mm	588			Received by	(Company): ELS	ELS		Samples Received	Ambient		
TO HOL	Condition of Sample at dispara-	spatten Cool or	Temperature (if Applicable):			Date 8. Time	200	1 13		Temperature Received at:	ived at: (if applicable)	(e)	
Print Name:	e (II Applicaci	Matthew Hyde	0			Signature:	1. 14	16.33	0	Iransported by: r	Transported by: Hand delivered / courier		
Date & Time:		6/12/2016	1300	18.00			0			COM - CTODE CEMENT MATERIAL	ı		
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