

LEAD DUST AND DPM INVESTIGATION (DELINEATION) & RISK ASSESSMENT REPORT

JOINT EMERGENCY SERVICES CENTRE
31 ANTHONY ROLFE AVE, GUNGAHLIN
ACT 2912

COMPLETE CONSTRUCTIONS (AUST) PTY LTD





PRA INSPECTION BODY ACCREDITATION

Accreditation	NATA Accreditation Number 20447.
Inspection Body	Accredited for compliance with ISO/IEC 17020



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DOCUMENT QUALITY CONTROL

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EXECUTIVE SUMMARY

Introduction and Background

This report presents the findings of a Lead Dust and Diesel Particulate Matter (DPM) Investigation (Delineation) and Risk Assessment conducted by Property Risk Australia (ACT) Pty Ltd (PRA), at the Joint Emergency Services Centre (JESC) located at 31 Anthony Rolfe Ave, Gungahlin ACT 2912. This report has been prepared following the findings of a Targeted Limited Destructive Hazardous Materials Survey PRA conducted (Ref: J02218_LDHMR_JESC_CCA_2024_02_08_V1) of the ACTAS Front of House (Stage 1) and ACT Ambulance Back of House (Stage 3) sections of JESC Gungahlin which identified lead dust in a ceiling space within Stage 1 and suspected diesel particulate matter on high-level non touchable surfaces within Stage 2. Works have commenced within the Stage 1.

This report has been prepared to assist Complete Constructions (Aust) Pty Ltd in fulfilling its obligations under the *Work Health and Safety Regulation 2011* (ACT) to ensure that any lead paint and dust that may be disturbed by the works have been identified and appropriate recommendations and risk assessment are provided.

Methodology

PRA undertook a documentation review, on-site survey and sampling (air monitoring and surface samples), analysis of sample results and the preparation of an investigation report and register. The hazardous building materials covered by this report include Lead-containing Dust (LCD) and Diesel Particulate Matter (DPM).

Lead Dust and DPM Results

Lead-containing dust was identified, refer to Register in **Appendix A**, which includes a site plan mark up of identified areas.

No presence of elemental carbon was identified in the DPM swabs taken on touchable surfaces in occupied areas, refer to Register in **Appendix A**, which includes a site plan mark up of identified areas.

Lead Dust Discussion

Threshold values of $1,075 \mu\text{g}/\text{m}^2$ for high-level areas (ceiling spaces) and areas below were adopted from the United States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017) as there are currently no Australian threshold values for commercial properties. **In this current use scenario, there were twelve (12) exceedances of adopted criteria** which are mapped in **Appendix A**. All exceedances were detected in the ceiling spaces. For the samples taken within the Plant Room there is not an appropriate criterion to compare the results against. No lead-containing dust was identified to lower-level staff occupied surfaces.

The results for the air monitoring samples were all below the Workplace Exposure Standard (WES) of $0.05 \text{ mg}/\text{m}^3$ ($\text{TWA}_{8\text{hr}}$). The personal results indicate there was no airborne lead exposure as a result of lifting ceiling tiles conducted during the collection of dust samples at the site. The background monitoring results indicate that airborne lead conditions were below the adopted action limit and lead dust was not generated during sampling.

Potential Sources of Lead Dust

During the survey no obvious source of lead dust could be identified within the ceiling space or building throughout. It is suspected that potential sources of lead dust may originate from external atmospheric factors which have collected over time in the ceiling space which does not regularly get



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cleaned. Some possible external sources considering the age of the building may include the Excavation and disturbance of soil adjacent highways/roads where leaded vehicles operated. This soil may have been reused on nearby construction sites and earthworks projects and potentially could contribute to lead dust collecting in the ceiling. It is also possible that lead painted buildings that burnt down during the 2020 bushfires may have left a residue of lead dust due to smoke contamination throughout Canberra, however, no certainty can be made on any of these lead dust contamination theories as no direct source was identified in the investigation.

Lead Dust Recommendations

Based on the results the time of sampling, no lead dust above the adopted criteria has been identified on lower-level staff occupied surfaces and airborne lead conditions are also within the adopted criteria.

Based on the results, PRA considers that no action is required regarding lead dust remediation for lower-level staff occupied surfaces.

Based on the results for the high-level areas (ceiling spaces) adopted criteria exceedances, it is recommended access to the ceiling spaces should be restricted unless necessary maintenance or emergency access is required (i.e., urgent plumbing or air conditioning works).

It is recommended personnel entering the ceiling space should adopt suitable Respiratory Protection Equipment (RPE) and Personal Protective Equipment (PPE) (i.e., nitrile gloves) and practice good hygiene (i.e., washing hands) to limit and reduce potential for lead dust absorption into the body.

Lead-containing dust should be removed prior to demolition or refurbishment or other dust raising activities in accordance with AS/NZS 4361.2:2017 Guide to hazardous paint management, Part 2: Lead paint in residential, public and commercial buildings.

For the samples taken within the Plant Room there is not an appropriate criterion to compare the results against.

DPM Discussion

A total of twelve (12) DPM swabs were taken as part of the investigative sampling on touchable surfaces within occupied areas within the engine bay and surrounds. The testing found there was no presence of elemental carbon found on any of the surfaces sampled suggesting there was no presence of DPM on the surfaces tested.

All DPM air monitoring samples returned results below the adopted action value of $\geq 50\%$ of the guidance exposure value for DPM as Elemental Carbon.

DPM Recommendations

Based on the results, PRA considers that no action is required regarding DPM.



1 INTRODUCTION

This report presents the findings of a Lead Dust and DPM Investigation (Delineation) and Risk Assessment Survey conducted by Property Risk Australia Pty Ltd (PRA) on behalf of Complete Constructions (Aust) Pty Ltd, at Joint Emergency Services Centre located at 31 Anthony Rolfe Ave, Gungahlin ACT 2912.

The works were requested following the targeted pre-refurbishment Limited Destructive Hazardous Materials Survey of the ACTAS Front of House and ACT Ambulance Back of House sections PRA conducted (ref: J02218_LDHMR_JESC_CCA_2024_02_08_V1) which identified lead dust in one sample location in the ceiling space and the presence of DPM.

2 LEGISLATIVE CONTEXT

This report has been prepared to assist Complete Constructions (Aust) Pty Ltd in fulfilling its legislative obligations to ensure that Lead dust and DPM and have been identified and quantified by a competent person.

This report has been prepared in accordance with the following ACT Legislation, Australian Standards and Codes of Practice:

- Work Health and Safety Act 2011;
- Work Health and Safety Regulation 2011;
- Code of Practice: How to manage and control asbestos in the workplace (SafeWork ACT, 2022);
- Code of Practice: How to safely remove asbestos (SafeWork ACT, 2022);
- Code of Practice: Demolition Work (SafeWork ACT, 2020));
- AS 2601 - 2001 "Australian Standard™ The Demolition of Structures;
- National Code of Practice for the Safe Use of Synthetic Mineral Fibres [NOHSC:2006(1990)]; and
- AS/NZS 4361.2:2017 Guide to hazardous paint management, Part 2: Lead paint in residential, public and commercial buildings.

With exception to lead paint definitions (as per AS/NZS 4361.2:2017) and lead process work requirements, there is no current Australian guidelines for lead dust. As such the following will be referenced to and adopted where suitable for the purpose of the assessment:

- National Code of Practice for the Control and Safe Use of Inorganic Lead at Work [NOHSC: 2015 (1994)];
- 'Standard for the Uniform Scheduling of Medicines and Poisons No. 3', National Health and Medical Research Council (NHMRC), Poisons Standard 2012;
- NSW Remediation Guidelines for Clandestine Drug Laboratories and Hydroponic Drug Plantation September 2015 indication for lead contamination threshold of 10ug/m²; and
- United States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017):

Dust Lead Action Level

- Floors ≥ 10 ug/ft² (107.6 $\mu\text{g}/\text{m}^2$)
- Windowsills ≥ 100 ug/ft² (1,076 $\mu\text{g}/\text{m}^2$)

Lead Clearance Action Level



- Interior Floors <10 ug/ft² (107.6 µg/m²)
- Porch Floors <40 ug/ft² (426 µg/m²)
- Windowsills <100 ug/ft² (1,076 µg/m²)
- Window Troughs <100 ug/ft² (1,076 µg/m²)

There is currently no national exposure standard for DPM. As such the following will be referenced to and adopted where suitable for the purpose of the assessment:

- MDG29: *Guideline for the management of diesel engine pollutants in underground environments*. Mine Safety Operations Division, New South Wales Department of Primary Industries (2008).

The MDG29 exposure limit recommendation is 50% of the 0.1mg/3 workplace exposure standard for DPM (as elemental carbon).

There is currently no standard for acceptable DPM dust levels found on surfaces. As such PRA will provide a presence/absence assessment based on the presence of elemental carbon identified in the sample taken.

3 SITE DESCRIPTION

A summary of the buildings on site during the survey, are provided in **Table 1**.

Table 1: Site Details

Building Name	Year Built (circa)	No. Levels:	Area (approximate sqm)
JESC Gungahlin	1998	1	-

4 METHODOLOGY

4.1 Site Survey and Sampling

A site survey was undertaken between 1 and 4 March 2024 by [REDACTED] and [REDACTED] of PRA. Surveying and sampling are undertaken in accordance with PRA's NATA accredited QSE-2M and QSE-3M in-house procedures. The following was undertaken during the survey:

- Sampling lead dust of representative areas below:
 - Occupied areas throughout JESC.
 - High level (partitions, shelving, ledges);
 - Mid-level (desks, chairs, monitors, shelving etc);
 - Low level (low-level shelves)
 - Ceiling spaces throughout JESC:
 - Top of ceiling tiles;
 - Top of services (ducts, cabling, wet fire, cable trays etc).
- Sampling DPM dust of representative areas below:
 - Touchable surfaces within the engine bay and occupied surfaces on areas surrounding the engine bay JESC.
 - High level (partitions, shelving, ledges);
 - Mid-level (desks, chairs, monitors, shelving etc);
 - Low level (low-level shelves)
- Providing NATA accredited laboratory results and marked site plans.



No survey can be guaranteed to locate all lead and DPM dust and without extensive destruction of the building therefore the survey findings cannot be regarded as being absolute. Planned or future demolition to the site structures may expose building voids or other areas which were concealed or otherwise impractical to access during this assessment.

4.1.1 *Sample Collection and Analysis*

Lead dust samples are taken in accordance with PRA procedures, placed in labelled plastic sealed clip-lock bags and transported under Chain of Custody to an external laboratory. The testing of samples for lead content involved the quantitative analysis of lead using ICP-AES/MS, ICP-OES and or CV/AAS following sample digestion. Sample analysis is carried out by an external laboratory accredited by NATA for the scientific methods employed.

DPM dust was sent to an External NATA Accredited Laboratory where the samples were tested for Total Carbon INORG-137 Nitrogen Sulfur by high temperature catalytic combustion with IR detection. This testing provided the amounts of elemental carbon and organic carbon in the samples taken.

Refer to **Appendix C** for Laboratory Certificates of Analysis.

Lead Containing Dust

Only ceiling tile surface (ceiling space side) have been previously sampled. Areas previously identified as lead contaminated were not resampled.

Samples were collected by competent consultants, placed in plastic sealed clip-lock bags, labelled (job-site-sample location) and transported under Chain of Custody to external NATA accredited laboratory facility for analysis of lead ($\mu\text{g}/\text{swab}$ for lead dust and converted to suit relevant thresholds).

Threshold values were adopted from the United States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017). The adopted threshold for window sills was utilised in this assessment for lead dust samples taken from high shelves, tops of cupboards and ceiling spaces and low level touchable surfaces such as desks etc. The adopted threshold for floors was not utilised in this assessment.

Dust Lead Action Level

- Floors $\geq 10 \mu\text{g}/\text{ft}^2$ ($107.6 \mu\text{g}/\text{m}^2$)
- Window Sills $\geq 100 \mu\text{g}/\text{ft}^2$ ($1,076 \mu\text{g}/\text{m}^2$)

Lead Clearance Action Level

- Interior Floors $< 10 \mu\text{g}/\text{ft}^2$ ($107.6 \mu\text{g}/\text{m}^2$)
- Porch Floors $< 40 \mu\text{g}/\text{ft}^2$ ($426 \mu\text{g}/\text{m}^2$)
- Window Sills $< 100 \mu\text{g}/\text{ft}^2$ ($1,076 \mu\text{g}/\text{m}^2$)
- Window Troughs $< 100 \mu\text{g}/\text{ft}^2$ ($1,076 \mu\text{g}/\text{m}^2$)

It should be noted that the laboratory detection limit in Australia is $1 \mu\text{g}/\text{swab}$ which equates to $100 \mu\text{g}/\text{m}^2$.

4.1 Lead Air Monitoring

Lead air monitoring during sampling was undertaken to provide an indication of potential exposure to workers during activities that may disrupt ceiling space for maintenance works. Static monitoring was also conducted to provide an indication of likely disturbance effect of airborne environment during maintenance type works and the effect current background air conditions on site.



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Sampling and analysis were conducted in accordance with Australian Standard (AS) 3640-2009 *Workplace Atmospheres – Method for sampling and gravimetric determination of inhalable dust* and Envirolab Services in-house method involving ICP-MS (Metals-006). Sampling was performed using SKC portable sampling pumps fitted with IOM samplers containing 25 mm MCE membrane filters that were flow tested at the commencement (2.0 L/min) and completion of sampling.

The Workplace Exposure Standard (WES) for lead is 0.05 mg/m³ (TWA_{8hr}) in accordance with the Workplace Exposure Standards for Airborne Contaminants, Safe Work Australia (January 2024). Action Limits for each health hazard will be proposed as ≥ 50% of the TWA-WES.

4.1 DPM Surfaces Swabs

A total of six (6) bulk collections of dust were taken in the initial Targeted Limited Destructive Hazardous Materials Survey PRA conducted (Ref: J02218_LDHMR_JESC_CCA_2024_02_08_V1) which identified suspected diesel particulate matter on high-level non-touchable surfaces within Stage 2. Following these results, it was requested by CCA that further investigative surface swab testing for DPM was carried out on touchable surfaces within the engine bay and surrounds to analyse the presence of elemental carbon and organic carbon on the samples collected.

4.2 DPM Monitoring

Background (static) monitoring samples were used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES/guidance exposure value. Instead, an action value for DPM has been established at ≥ 50% of the guidance exposure value AIOH), and recommended exposure limit (MDG29).

Sampling and analysis were conducted in accordance with United States National Institute for Occupational Safety and Health (NIOSH) Method 5040: Diesel Particulate Matter (as Elemental Carbon (EC)). The Australian Laboratory Services (ALS) Environmental laboratory in Smithfield NSW (NATA accreditation No. 825) in-house method for the analysis of diesel particulates, as elemental carbon, by thermal optical analyser was used.

The sampling was performed using constant flow portable sampling pumps fitted with 37mm 3-piece cassettes with quartz filters that were flow tested at the commencement (2.0 L/min) and completion of sampling. The sampling pumps were placed in fixed locations between one to two metres above ground for a duration considered representative of the task being assessed.

Based on the AIOH Position Paper – Diesel Particulate Matter and Occupational Health Issues, the AIOH recommended an 8-hour time weighted average (TWA) guidance exposure value of 0.1 mg/m³ (as EC).

4.3 Report Preparation

The purpose of this report is to communicate the findings of the site survey and bulk sample analysis into a Lead and DPM Dust Register, refer to **Appendix A**. This assessment will assist the Client in understanding the extent, risk and possible source of lead and DPM contamination on the site and provide recommendations based on the results.

5 RESULTS

5.1 Lead and DPM and Dust Register

A detailed lead dust and DPM register of the site is provided in **Appendix A**.

Lead-containing Dust. Representative samples of suspected lead-containing dust (greater than 3 g) were sent to an external NATA-accredited laboratory and analysed for lead content. As no criteria for ceiling spaces is present in Australia, the dust was compared to the level published by the United



States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017). A threshold of 1,076 $\mu\text{g}/\text{m}^2$ was adopted for ceilings spaces and touchable surfaces below in occupied areas.

DPM-containing Dust. Representative samples of suspected Diesel Particulate Matter dust (DPM) were sent to an external laboratory for analysis of elemental carbon and organic carbon.

Inaccessible Areas outlines areas excluded from surveying due to inaccessibility and restricted access areas present within the site. The scope of the survey was to further identify the source of elevated lead dust in reasonably accessible areas around the site. Reasonably accessible does not extend to height restricted surfaces or within the structural fabric of the building including wall cavities/voids. See **Table 2**.

Table 2: Inaccessible Areas

Inaccessible Areas	Location
Building area restrictions	
N/A	N/A
Hazard restrictions	
Height restricted areas	Throughout site
Inside confined spaces	Throughout site
Live mechanical plant and equipment	Throughout site
Live electrical plant and equipment	Throughout site

Refer to **Section 6** for recommendations relating to inaccessible areas.

5.2 Site Plans

Site plans were provided by the client and have been annotated with locations of Lead Dust and DPM swab locations as well as Lead Dust and DPM air monitoring locations. Refer to **Appendix A**.

5.1 Lead Air Monitoring Results

The results for the air monitoring samples were all below the Workplace Exposure Standard (WES) of 0.05 mg/m^3 ($\text{TWA}_{8\text{hr}}$). The personal results indicate there was no airborne lead exposure as a result of lifting ceiling tiles conducted during the collection of dust samples at the site. The background monitoring results indicate that airborne lead conditions were below the adopted action limit and lead dust was not generated during sampling. Refer to **Appendix C** for Lead Air Monitoring Report.

6 DISCUSSION

6.1 Lead Dust

Threshold values of 1,075 $\mu\text{g}/\text{m}^2$ for high-level areas (ceiling spaces) and areas below were adopted from the United States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017) as there are currently no Australian threshold values for commercial properties. **In this current use scenario, there were twelve (12) exceedances of adopted criteria** which are mapped in **Appendix A**. All exceedances were detected in the ceiling spaces. For the samples taken within the Plant Room there is not an appropriate criterion to compare the results against. No lead-containing dust was identified to lower-level staff occupied surfaces.



6.1 DPM Dust

A total of twelve (12) DPM swabs were taken as part of the investigative sampling on touchable surfaces within occupied areas within the engine bay and surrounds. The testing found there was no presence of elemental carbon found on any of the surfaces sampled suggesting there was no presence of DPM on the surfaces tested.

7 RECOMMENDATIONS

7.1 Lead-containing Dust Management

Based on the results the time of sampling, no lead dust above the adopted criteria has been identified on lower-level staff occupied surfaces and airborne lead conditions are also within the adopted criteria.

Based on the results, PRA considers that no action is required regarding lead dust remediation for lower-level staff occupied surfaces.

Based on the results for the high-level areas (ceiling spaces) adopted criteria exceedances, it is recommended access to the ceiling spaces should be restricted unless necessary maintenance or emergency access is required (i.e., urgent plumbing or air conditioning works).

It is recommended personnel entering the ceiling space should adopt suitable Respiratory Protection Equipment (RPE) and Personal Protective Equipment (PPE (i.e., nitrile gloves)) and practice good hygiene (i.e., washing hands) to limit and reduce potential for lead dust absorption into the body.

Lead-containing dust should be removed prior to demolition or refurbishment or other dust raising activities in accordance with AS/NZS 4361.2:2017 Guide to hazardous paint management, Part 2: Lead paint in residential, public and commercial buildings.

For the samples taken within the Plant Room there is not an appropriate criterion to compare the results against.

No source of lead dust was identified during the investigation, and it is suspected that external atmospheric factors have contributed to a buildup of dust within the ceiling space that exceeds the adopted criteria for lead.

7.1.1 Remediation Action Plan for Lead Dust

Based on the results of the investigation PRA considers there is no need for remediation to be conducted unless demolition/refurbishment is being conducted in the ceiling that has the potential to generate dust.

If remediation is desired the following process should be followed below:

7.1.2 Removal Process for Lead Dust

Lead-containing dust should be removed prior to demolition or refurbishment or other dust raising activities in accordance with AS/NZS 4361.2:2017 Guide to hazardous paint management, Part 2: Lead paint in residential, public and commercial buildings.

It is recommended lead containing dust is removed under controlled conditions including an enclosure/s with a 3-stage decontamination unit, appropriate PPE/PRE and appropriate dust suppression methods (refer to AS/NZS 4361.2:2017 for further details). Where ceilings are open to one another consideration to the enclosure being one should be preference. Otherwise, ceiling space voids will require sealing to prevent cross contamination.



Refer to the Disposal of waste contaminated with lead (including lead waste) should be undertaken according to ACT EPA Waste Classification Guidelines, Part 1 Classifying Waste (July 2021). For commercial properties, this is usually pre-classified as hazardous waste.

7.2 DPM Dust Management

A total of twelve (12) DPM swabs were taken as part of the investigative sampling on touchable surfaces within occupied areas within the engine bay and surrounds. The testing found there was no presence of elemental carbon found on any of the surfaces sampled suggesting there was no presence of DPM on the surfaces tested.

All DPM air monitoring samples returned results below the adopted action value of $\geq 50\%$ of the guidance exposure value for DPM as Elemental Carbon.

Based on the results, PRA considers that no action is required regarding DPM.

8 RISK ASSESSMENT METHODOLOGY

RISK ASSESSMENT

PRA have assessed the potential risk of exposure from lead dust to occupants of JESC.

The two (2) exposure groups identified includes:

1. Occupants working in areas below ceiling spaces.
2. Workers that need to access the ceiling space.

When determining the risk to workers potentially exposed to lead dust, the following risk factors should be considered:

- Disturbance Potential;
- Environment; and
- Exposure Duration.

Disturbance Potential

- Based on the findings and locations of lead dust this concerns the likelihood of disturbing dust within the ceiling space.

Environment

- The differences of environment should be considered in assessing lead dust exposure such as being outdoors, within the ceiling space etc.

Exposure Duration

- The amount of time spent within the ceiling space should be considered.

Regular Occupants working in areas below the ceiling space

Based on the findings of this report concerning the lead background air monitoring results and lead dust swabs on accessible surfaces, regular workers occupying areas below the ceilings spaces have a low risk of lead dust exposure.

Workers that need to access the ceiling space

Exposure monitoring conducted during the assessment which mimicked a worker accessing the ceiling space by removing tiles for 6 hours did not exceed the Workplace Exposure Standard (WES) of 0.05 mg/m^3 ($\text{TWA}_{8\text{hr}}$) demonstrating there is a low risk of exposure through these activities. It is



recommended It is recommended personnel entering the ceiling space should adopt suitable Respiratory Protection Equipment (RPE) and Personal Protective Equipment (PPE (i.e., nitrile gloves)) and practice good hygiene (i.e., washing hands) to limit and reduce potential for lead dust absorption into the body.

Risk of Exposure to Lead Dust

The total risk score then compared to **Table A** to determine a risk rating of low, moderate, or high.

Table A: Lead Dust Risk Assessment Criteria

Risk Rating	Description
Low	Materials that pose a low health risk to workers and the public. For example, materials that are in good condition, located in areas that are not subject to work activities that may impact upon them.
Moderate	Materials that pose a moderate health risk to workers or the public in their current condition.
High	Materials that pose an immediate or elevated risk to workers or the public in their current condition.

Qualitative Risk Assessment – Regular Occupants			
Disturbance Potential	Environment	Work Activities/ Exposure Duration	Overall Risk
Low	Low	Low	Low
Based on the findings of this report concerning the lead background air monitoring results and lead dust swabs on accessible surfaces, regular workers occupying areas below the ceilings spaces have a low risk of lead dust exposure.			
Recommendations	Restrict access to ceiling space.		

Qualitative Risk Assessment – Workers Accessing Ceiling Space			
Disturbance Potential	Environment	Work Activities/ Exposure Duration	Overall Risk
Low	Low	Low	Low
Exposure monitoring conducted during the assessment which mimicked a worker accessing the ceiling space by removing tiles for 6 hours did not exceed the Workplace Exposure Standard (WES) of 0.05 mg/m ³ (TWA _{8hr}) demonstrating there is a low risk of exposure through these activities.			
Recommendations	It is recommended It is recommended personnel entering the ceiling space should adopt suitable Respiratory Protection Equipment (RPE) and Personal Protective Equipment (PPE (i.e., nitrile gloves)) and practice good hygiene (i.e., washing hands) to limit and reduce potential for lead dust absorption into the body.		



9 LEGISLATION AND INDUSTRY GUIDELINES

The following Legislation, codes of practice, guidelines and standards are considered to form an integral part or are relevant to the preparation of this report:

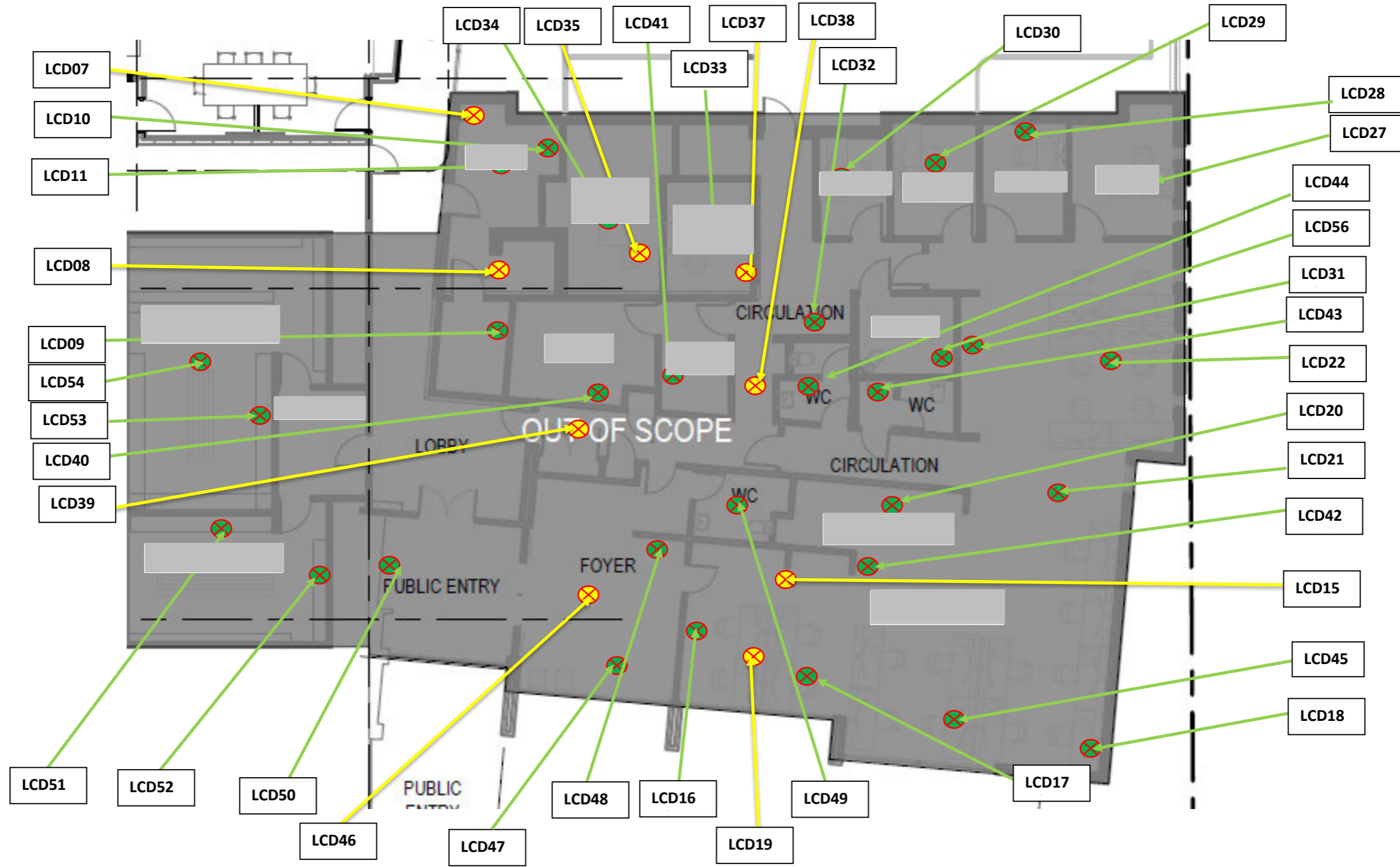
- ACT *Work Health and Safety (WHS) Act, 2011.*
- ACT *WHS Regulations, 2011.*
- AS/NZS 4361.2:2017 Guide to hazardous paint management, Part 2: Lead paint in residential, public, and commercial buildings;
- AS/NZS 4361.1:2017 Guide to hazardous paint management Lead and other hazardous metallic pigments in industrial applications;
- National Code of Practice for the Control and Safe Use of Inorganic Lead at Work [NOHSC: 2015 (1994)];
- 'Standard for the Uniform Scheduling of Medicines and Poisons No. 3', National Health and Medical Research Council (NHMRC), Poisons Standard 2012;
- NSW Remediation Guidelines for Clandestine Drug Laboratories and Hydroponic Drug Plantation September 2015 indication for lead contamination threshold of 10 ug/m².
- United States Department of Housing and Urban Development (HUD) Policy Guidance 2017-01 Rev 1 (April 2017).
- Workplace Exposure Standards for Airborne Contaminants (Safe Work Australia, 2024);
- Guidelines on the interpretation of workplace exposure standards for airborne contaminants (Safe Work Australia, 2013);
- Hazardous Chemicals Requiring Health Monitoring (Safe Work Australia, 2013)
- AIOH Position Paper - Diesel particulate matter and occupational health issues (2017)
- Diesel Particulate Matter (as elemental carbon) Method 5040, NIOSH Manual of Analytical Methods (NMAM), Fourth Edition (2003)
- Australian Standard (AS) 3640: 2009, Workplace atmospheres - Method for sampling and gravimetric determination of inhalable dust
- Guideline for the management of diesel engine pollutants in underground environments MDG29, Mine Safety Operations Division, NSW Department of Primary Industries (2008)



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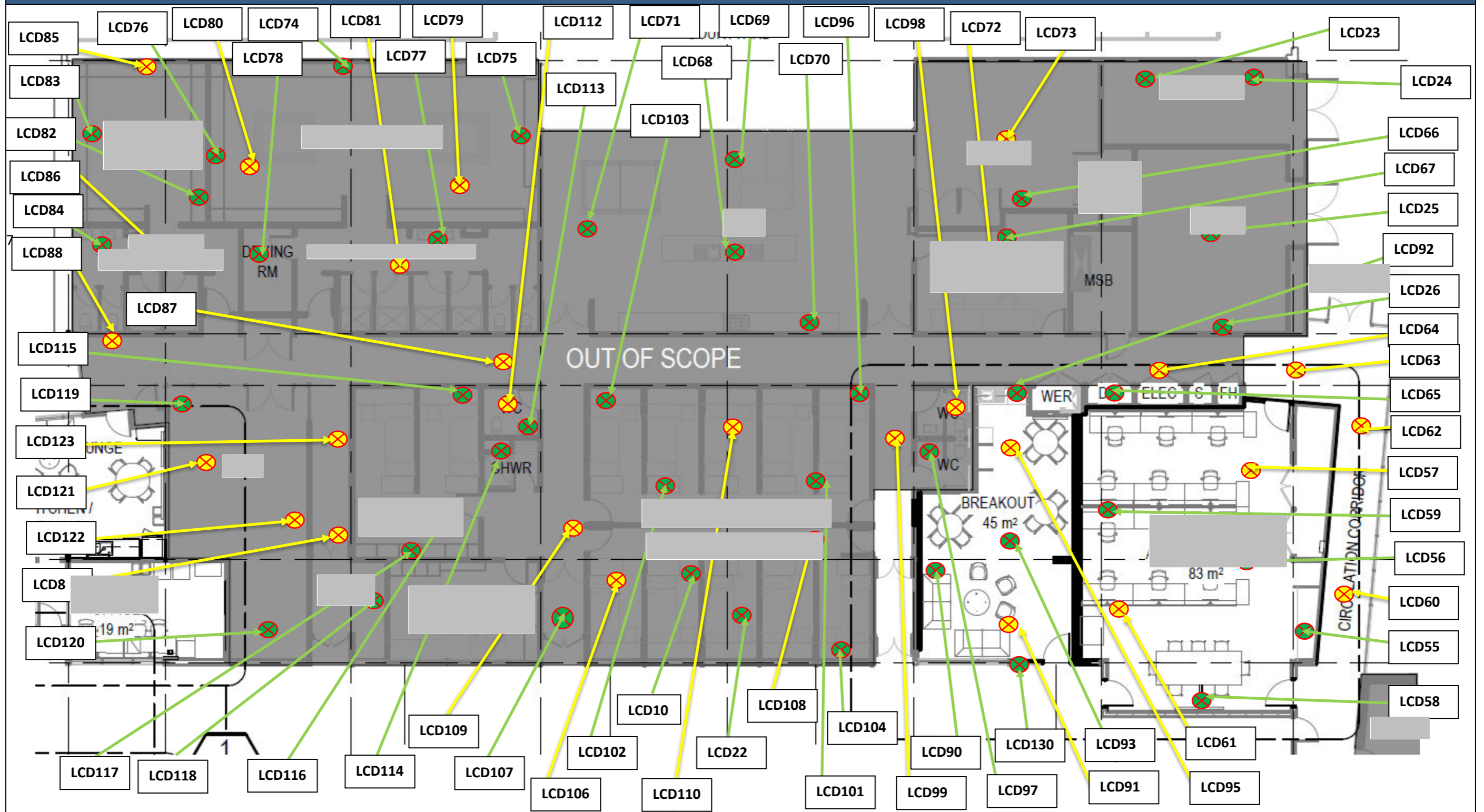
Appendix A LEAD AND DPM DUST REGISTER

Lead Dust Sampling Locations – Police Area



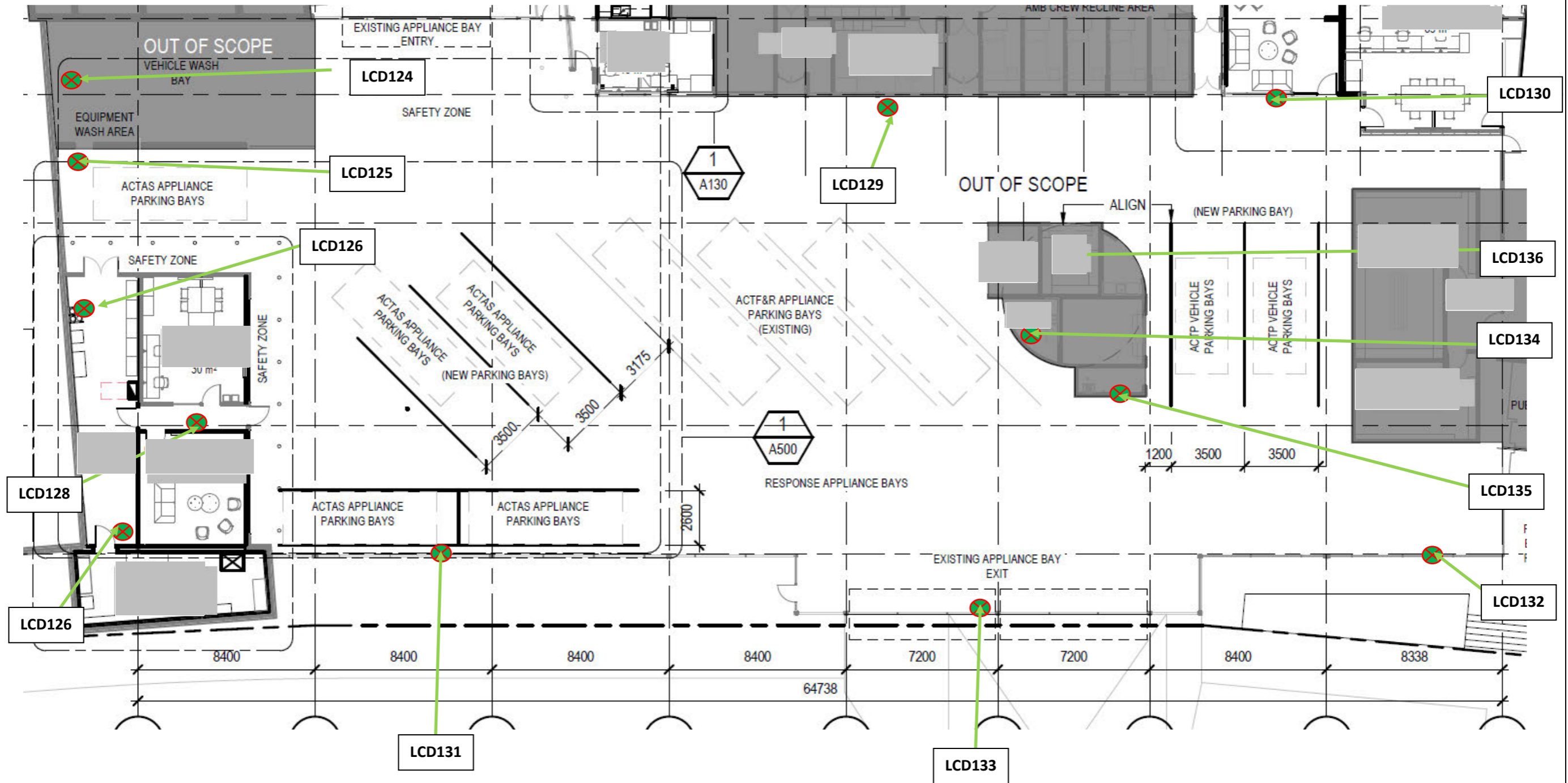
Legend		
Lead Dust Ceiling Sampling locations		Notes: • Drawing not to scale. Stockpile and sample locations are approximate only. Source: GHD Design
Lead Dust Working Area Sampling locations		

Lead Dust Sampling Locations – Fire and Ambulance



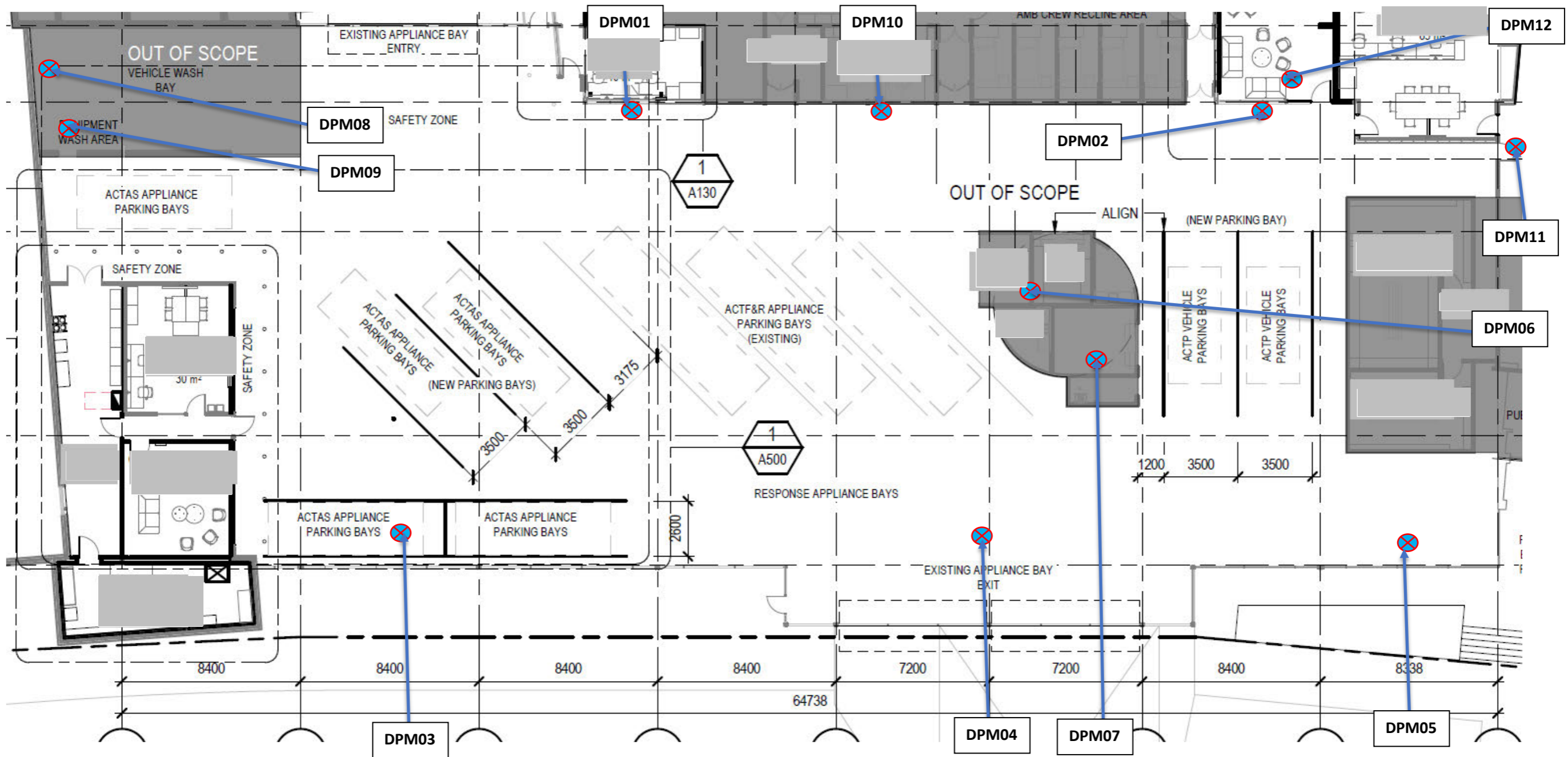
Legend		Notes: • Drawing not to scale. Stockpile and sample locations are approximate only. Source: GHD Design
Lead Dust Ceiling Sampling locations		
Lead Dust Working Area Sampling locations		

Lead Dust Sampling Locations – Engine Bay



Legend		
Lead Dust Ceiling Sampling locations		Notes: • Drawing not to scale. Stockpile and sample locations are approximate only. Source: GHD Design
Lead Dust Working Area Sampling locations		

DPM Swab Sampling Locations – Engine Bay



Legend		Notes:
DPM Sampling locations		
		<ul style="list-style-type: none"> Drawing not to scale. Stockpile and sample locations are approximate only. Source: GHD Design

Lead Dust Sampling Locations Above Adopted Criteria



Legend		Notes: • Drawing not to scale. Stockpile and sample locations are approximate only. Source: GHD Design
Lead Dust Ceiling Sampling Locations		
Lead Dust Working Area Sampling Locations		

Register

Lead Dust

N/A	Sample No.: J02218-LCD07	
	Lead Detected:	Yes 2000 µg/m ²
	Location:	Internal
	Internal, ground floor, [REDACTED], ceiling space - on I Beam.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD08	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, [REDACTED], ceiling space - on top of ceiling tile.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD09	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, ground floor, [REDACTED], [REDACTED], VFC floor.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD10	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, [redacted] - on top of shelving (high level).	
	Extent:	N/A
N/A	Sample No.: J02218-LCD11	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, centre of room - on top of carpet.	
	Extent:	N/A
[redacted]	Sample No.: J02218-LCD12	
	Lead Detected:	No 800 µg/m ²
	Location:	Internal
	Internal, ground floor, FB station office, ceiling space - on top of tile.	
	Extent:	N/A
	Sample No.: J02218-LCD13	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, ground floor, FB station office - on top of light brown wooden shelf.	
	Extent:	N/A

	Sample No.: J02218-LCD14	
	Lead Detected:	No <math><1 \mu\text{g}/\text{m}^2</math>
	Location:	Internal
	Internal, ground floor, FB station office - on top of west desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD15	
	Lead Detected:	No $800 \mu\text{g}/\text{m}^2$
	Location:	Internal
	Internal, ground floor, ceiling space - on top of ceiling tile.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD16	
	Lead Detected:	No <math><1 \mu\text{g}/\text{m}^2</math>
	Location:	Internal
	Internal, ground floor west, shelving outside reception - on top surface.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD17	
	Lead Detected:	No <math><1 \mu\text{g}/\text{m}^2</math>
	Location:	Internal
	Internal, ground floor, western desks, adjacent white shelves - on top of desk.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD18	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, eastern desks - on top of brown desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD19	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, west side, adjacent reception, ceiling space - ceiling tile.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD20	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, kitchen, benchtop adjacent sink.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD21	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, ground floor, on top of desk, centre east opposite hallway.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD22	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, ground floor, air vent opposite hallway.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD23	
	Lead Detected:	No 300 µg/m ²
	Location:	Internal
	Internal, [REDACTED], on unit TN-AR.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD24	
	Lead Detected:	No 1000 µg/m ²
	Location:	Internal
	Internal, [REDACTED], east - on heating unit.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD25	
	Lead Detected:	No 800 µg/m ²
	Location:	Internal
	Internal, [REDACTED], central, pipework to air handling unit.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD26	
	Lead Detected:	Yes 2800 µg/m ²
	Location:	Internal
	Internal, [REDACTED], south - on distribution board.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD27	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, eastern office, central - on desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD28	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, eastern office, central - on desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD29	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, 3rd office from east, central - on desk.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD30	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, [redacted] from east, central - on desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD31	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, police area, circulation, adjacent to [redacted], high sample on top of wall mount cabinets.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD32	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, circulation, adjacent 4th office - inside storage cabinet.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD33	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, [redacted], central - on desk.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD34	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, [redacted] central - on desk.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD35	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, [redacted], east - on toy area middle shelf.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD36	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted], south-eastern elevation - on bed frame.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD37	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, police area, [redacted], ceiling space, eastern portion - on ceiling tile.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD38	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, police area, circulation, adjacent to [redacted], ceiling space - on ceiling.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD39	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, circulation adjacent to data cupboards & entrance door to office - on ceiling tiles.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD40	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, store, south elevation - on shelf unit.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD41	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, [redacted] western elevation on shelf unit.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD42	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, open office, adjacent kitchen - white shelf.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD43	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, ladies toilet north - on sink.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD44	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, men's toilet, central - hand towel dispenser.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD45	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, open office, south south east, desk near window - on desk.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD46	
	Lead Detected:	No 600 µg/m ²
	Location:	Internal
	Internal, police area, foyer, central, ceiling space on ceiling tiles.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD47	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, foyer, south-east elevation on desk, public side.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD48	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, foyer, east elevation on desk, police side.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD49	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, police area, public toilet, eastern elevation - on baby change table.	
	Extent:	N/A

Sample No.: J02218-LCD50	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, police area, public entry, western elevation on shelf in front of notice board.	
Extent:	N/A
Sample No.: J02218-LCD51	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, police area, [redacted], north elevation - inside locker central line.	
Extent:	N/A
Sample No.: J02218-LCD52	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, police area, [redacted], south elevation, high samples - on shelf.	
Extent:	N/A
Sample No.: J02218-LCD53	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, police area, [redacted], east elevation - lower shelf.	
Extent:	N/A

Sample No.: J02218-LCD54	
Lead Detected:	Lead Detected:
Location:	Location:
Internal, police area, [REDACTED], central location - on locker.	
Extent:	N/A
Sample No.: J02218-LCD55	
Lead Detected:	Lead Detected:
Location:	Location:
Internal, [REDACTED], south-east elevation, kitchen, on bench adjacent sick.	
Extent:	N/A
Sample No.: J02218-LCD56	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], east central elevation - on desk.	
Extent:	N/A
Sample No.: J02218-LCD57	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], west central elevation - on desk.	
Extent:	N/A

Sample No.: J02218-LCD58	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], [redacted], southern elevation, storage cabinet - on shelf.	
Extent:	N/A
Sample No.: J02218-LCD59	
Lead Detected:	Yes 1100 µg/m ²
Location:	Internal
Internal, [redacted], eastern elevation, ceiling space - on tiles.	
Extent:	N/A
Sample No.: J02218-LCD60	
Lead Detected:	Yes 1700 µg/m ²
Location:	Internal
Internal, circulation, outside [redacted], [redacted], ceiling space - on beam.	
Extent:	N/A
Sample No.: J02218-LCD61	
Lead Detected:	Yes 1200 µg/m ²
Location:	Internal
Internal, [redacted] south-western elevation, ceiling space - on ceiling tiles.	
Extent:	N/A

Sample No.: J02218-LCD62	
Lead Detected:	Yes 6200 µg/m ²
Location:	Internal
Internal, circulation, adjacent to carpark entrance, ceiling space - A/C Box.	
Extent:	N/A
Sample No.: J02218-LCD63	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, circulation, adjacent [redacted] & carpark entrance, ceiling space - on tiles.	
Extent:	N/A
Sample No.: J02218-LCD64	
Lead Detected:	Yes 3500 µg/m ²
Location:	Internal
Internal, circulation, adjacent main switchboard, ceiling space on ceiling tile.	
Extent:	N/A
Sample No.: J02218-LCD65	
Lead Detected:	No 700 µg/m ²
Location:	Internal
Internal, communication cupboard, central, - on top of Telstra box.	
Extent:	N/A

	Sample No.: J02218-LCD66	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [REDACTED], southern elevation - on tv table.	
	Extent:	N/A
	Sample No.: J02218-LCD67	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [REDACTED], northern elevation - on table.	
	Extent:	N/A
	Sample No.: J02218-LCD68	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [REDACTED], kitchen bench, central location, between sinks - on bench.	
	Extent:	N/A
	Sample No.: J02218-LCD69	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [REDACTED] northern elevation, central table - on table.	
	Extent:	N/A

Sample No.: J02218-LCD70	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], south-east elevation, high sample - on top of food cabinets.	
Extent:	N/A
Sample No.: J02218-LCD71	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] western elevation, high sample - on AC Ducting.	
Extent:	N/A
Sample No.: J02218-LCD72	
Lead Detected:	No 100 µg/m ²
Location:	Internal
Internal, [redacted] central, ceiling space - on ceiling tile.	
Extent:	N/A
Sample No.: J02218-LCD73	
Lead Detected:	No 400 µg/m ²
Location:	Internal
Internal, [redacted] central, ceiling space - on speaker.	
Extent:	N/A

Sample No.: J02218-LCD74	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], northern elevation, inside open locker - on base.	
Extent:	N/A
Sample No.: J02218-LCD75	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], eastern elevation, central locker - on top of lockers.	
Extent:	N/A
Sample No.: J02218-LCD76	
Lead Detected:	No 200 µg/m ²
Location:	Internal
Internal, [REDACTED], western elevation, central lockers - on top of locker.	
Extent:	N/A
Sample No.: J02218-LCD77	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], northern elevation, between sinks - on vanity bench.	
Extent:	N/A

Sample No.: J02218-LCD78	
Lead Detected:	No <math><1 \mu\text{g}/\text{m}^2</math>
Location:	Internal
Internal, drying room, northern elevation - on top of heater.	
Extent:	N/A
Sample No.: J02218-LCD79	
Lead Detected:	No $700 \mu\text{g}/\text{m}^2$
Location:	Internal
Internal, [redacted], eastern elevation, central ceiling space - on top of A/C box.	
Extent:	N/A
Sample No.: J02218-LCD80	
Lead Detected:	No $400 \mu\text{g}/\text{m}^2$
Location:	Internal
Internal, [redacted], western elevation, central portion, ceiling space - on ceiling tile.	
Extent:	N/A
Sample No.: J02218-LCD81	
Lead Detected:	No $100 \mu\text{g}/\text{m}^2$
Location:	Internal
Internal, [redacted], central elevation, ceiling space -on ceiling tile.	
Extent:	N/A

Sample No.: J02218-LCD82	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], eastern elevation, inside locker on box shelf.	
Extent:	N/A
Sample No.: J02218-LCD83	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], western elevation, central section - on top of locker.	
Extent:	N/A
Sample No.: J02218-LCD84	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED] [REDACTED], north-west elevation, between sinks - on vanity bench.	
Extent:	N/A
Sample No.: J02218-LCD85	
Lead Detected:	No 700 µg/m ²
Location:	Internal
Internal, [REDACTED], northern elevation, ceiling space - on ceiling tile.	
Extent:	N/A

	Sample No.: J02218-LCD86	
	Lead Detected:	Yes 3500 µg/m ²
	Location:	Internal
	Internal, [redacted], central elevation, ceiling space - on metal roof truss.	
	Extent:	N/A
	Sample No.: J02218-LCD87	
	Lead Detected:	No 500 µg/m ²
	Location:	Internal
	Internal, circulation, central location, between [redacted] ceiling spaces - on ceiling tile.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD88	
	Lead Detected:	No 900 µg/m ²
	Location:	Internal
	Internal, circulation, eastern elevation, adjacent, staff entry and gym, ceiling space - on ceiling tile.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD89	
	Lead Detected:	Yes 1600 µg/m ²
	Location:	Internal
	Internal, circulation, southern elevation, adjacent to entrance to parking bays, ceiling space - on ceiling tile.	
	Extent:	N/A

Sample No.: J02218-LCD90	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], west, high level surface -on shelf.	
Extent:	N/A
Sample No.: J02218-LCD91	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], south, low level surface - on desk.	
Extent:	N/A
Sample No.: J02218-LCD92	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], north, low level surface - on bench.	
Extent:	N/A
Sample No.: J02218-LCD93	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], central, low-level surface – desk.	
Extent:	N/A

	Sample No.: J02218-LCD94	
	Lead Detected:	No 600 µg/m ²
	Location:	Internal
	Internal, [redacted], south, ceiling space - on top of ceiling tile.	
	Extent:	N/A
	Sample No.: J02218-LCD95	
	Lead Detected:	Yes 1600 µg/m ²
Location:	Internal	
Internal, [redacted] north, ceiling space - on top of ceiling tile.		
Extent:	N/A	

	Sample No.: J02218-LCD98	
	Lead Detected:	No 200 µg/m ²
	Location:	Internal
	Internal, male toilets, adjacent [redacted], ceiling space - on top of ceiling tile.	
	Extent:	N/A
	Sample No.: J02218-LCD99	
	Lead Detected:	No 300 µg/m ²
	Location:	Internal
	Internal, hallway adjacent [redacted] and breakout area - on top of ceiling tile.	
	Extent:	N/A
Sample No.: J02218-LCD96		
Lead Detected:	No <1 µg/m ²	
Location:	Internal	
Internal, male toilets adjacent [redacted], low level surface, south - on sink bench.		
Extent:	N/A	
Sample No.: J02218-LCD97		
Lead Detected:	No <1 µg/m ²	
Location:	Internal	
Internal, female toilet adjacent [redacted], low level surface, north, on sink bench.		
Extent:	N/A	



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	Sample No.: J02218-LCD100	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [REDACTED], north, low level surface - on desk.	
	Extent:	N/A

Sample No.: J02218-LCD104	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], south-east, low level surface - on desk.	
Extent:	N/A
Sample No.: J02218-LCD101	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted], south-west, low level surface - on shelf.	
Extent:	N/A
Sample No.: J02218-LCD102	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] south-west, high level surface - on shelf.	
Extent:	N/A
Sample No.: J02218-LCD103	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] north-west, low-level surface - on desk.	
Extent:	N/A

Sample No.: J02218-LCD105	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], east, low level surface - on desk.	
Extent:	N/A
Sample No.: J02218-LCD106	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED], north-east, high level surface - on shelf.	
Extent:	N/A
Sample No.: J02218-LCD107	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [REDACTED] north-west, high level area surface – shelf.	
Extent:	N/A
Sample No.: J02218-LCD108	
Lead Detected:	No 700 µg/m ²
Location:	Internal
Internal, [REDACTED] hallway, east, ceiling space - on top of ceiling.	
Extent:	N/A



Sample No.: J02218-LCD109	
Lead Detected:	No 500 µg/m ²
Location:	Internal
Internal, [redacted] hallway, west, ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD110	
Lead Detected:	Yes 1500 µg/m ²
Location:	Internal
Internal, [redacted] central room, ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD111	
Lead Detected:	No 500 µg/m ²
Location:	Internal
Internal, west hallway to [redacted] central, ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD112	
Lead Detected:	No 200 µg/m ²
Location:	Internal
Internal, [redacted], central, ceiling spaces - on top of ceiling.	
Extent:	N/A

Sample No.: J02218-LCD113	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] south-east, low level - on sink bench.	
Extent:	N/A
Sample No.: J02218-LCD114	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] north, low level surfaces - on timber bench.	
Extent:	N/A
Sample No.: J02218-LCD115	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] north-east, low level surface from timber bench.	
Extent:	N/A
Sample No.: J02218-LCD116	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, [redacted] south-east high level surface -from timber shelf.	
Extent:	N/A

	Sample No.: J02218-LCD117	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] south hallway, south, high level - on top of lockers.	
	Extent:	N/A
	Sample No.: J02218-LCD118	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] east, middle shelf, low level surfaces - on shelf.	
	Extent:	N/A
	Sample No.: J02218-LCD119	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] north-west, low level surfaces - from table surface.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD120	
	Lead Detected:	No 200 µg/m ²
	Location:	Internal
	Internal, [redacted] south, low level surfaces - on bench press metal frame.	
	Extent:	N/A

Sample No.: J02218-LCD121	
Lead Detected:	No 500 µg/m ²
Location:	Internal
Internal, [redacted] north-west, ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD122	
Lead Detected:	Yes 1300 µg/m ²
Location:	Internal
Internal, [redacted] central east, ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD123	
Lead Detected:	No 900 µg/m ²
Location:	Internal
Internal, hallway between [redacted], central ceiling space - on top of ceiling.	
Extent:	N/A
Sample No.: J02218-LCD124	
Lead Detected:	No <1 µg/m ²
Location:	Internal
Internal, vehicle wash bay, west, low level surfaces - on sink.	
Extent:	N/A

	Sample No.: J02218-LCD125	
	Lead Detected:	No 100 µg/m ²
	Location:	Internal
	Internal, equipment wash area, west, high level surface - on cabinet.	
	Extent:	N/A
N/A	Sample No.: J02218-LCD126	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] west, high level surfaces - from metal shelving.	
	Extent:	N/A
	Sample No.: J02218-LCD127	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] south, low level surfaces - on work bench.	
	Extent:	N/A
	Sample No.: J02218-LCD128	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] north, low level surfaces - on cabinet.	
	Extent:	N/A

	Sample No.: J02218-LCD129	
	Lead Detected:	No 200 µg/m ²
	Location:	Internal
	Internal/external, south façade of [redacted] central, low level - dust from wind sill.	
	Extent:	N/A
	Sample No.: J02218-LCD130	
	Lead Detected:	No 200 µg/m ²
	Location:	Internal
	Internal/external, south façade of [redacted] central, low level surfaces - window sill.	
	Extent:	N/A
	Sample No.: J02218-LCD131	
	Lead Detected:	No 700 µg/m ²
Location:	Internal	
Internal, adjacent [redacted] parking bays, south, low level surfaces - window sill.		
Extent:	N/A	
N/A	Sample No.: J02218-LCD132	
	Lead Detected:	No 300 µg/m ²
	Location:	Internal
	Internal, adjacent public entry porch, west, low level surfaces - on window sill.	
	Extent:	N/A

N/A	Sample No.: J02218-LCD133	
	Lead Detected:	No 600 µg/m ²
	Location:	Internal
	Internal, existing appliance bay exit, low level surfaces - from roller door surface.	
	Extent:	N/A
	Sample No.: J02218-LCD134	
	Lead Detected:	No 200 µg/m ²
	Location:	Internal
	Internal, [redacted], south-east, low level surfaces - on towel dispenser surface	
	Extent:	N/A
	Sample No.: J02218-LCD135	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted], south, low level surfaces - from shelving.	
	Extent:	N/A
	Sample No.: J02218-LCD136	
	Lead Detected:	No <1 µg/m ²
	Location:	Internal
	Internal, [redacted] 1, south, low level surfaces - from timber shelving surfaces.	
	Extent:	N/A

DPM Swabs

	Sample No.: J02218-DPM01	
	Carbon Detected:	No (<20 mg/swab)
	Location:	Internal
	Internal, external south facade of [redacted] - collected from window sill	
	Extent:	N/A
	Sample No.: J02218-DPM02	
	Carbon Detected:	No (<20 mg/swab)
	Location:	Internal
	Internal, external south facade of [redacted] - collected from window sill	
	Extent:	N/A
	Sample No.: J02218-DPM03	
	Carbon Detected:	No (<20 mg/swab)
Location:	Internal	
internal, directly adjacent [redacted] parking bays - collected from window sill		
Extent:	N/A	
Sample No.: J02218-DPM04		
Carbon Detected:	No (<20 mg/swab)	
Location:	Internal	
Internal, existing appliance bay exit - from roller door sill		
Extent:	N/A	

Sample No.: J02218-DPM05	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, directly adjacent public entry porch - collected from window sill	
Extent:	N/A
Sample No.: J02218-DPM06	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, [REDACTED], east - on paper towel holder surface	
Extent:	N/A
Sample No.: J02218-DPM07	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, [REDACTED], south - on shelving surface	
Extent:	N/A
Sample No.: J02218-DPM08	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, vehicle wash bay area west - on top surface of hot water heater unit	
Extent:	N/A

Sample No.: J02218-DPM09	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, vehicle wash bay area south - on surface of wooden work bench	
Extent:	N/A
Sample No.: J02218-DPM10	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, [REDACTED], south window - on window sill surface	
Extent:	N/A
Sample No.: J02218-DPM11	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, circulation corridor, west - on surface of window sill	
Extent:	N/A
Sample No.: J02218-DPM12	
Carbon Detected:	No (<20 mg/swab)
Location:	Internal
Internal, [REDACTED] south - desk surfaces	
Extent:	N/A



Appendix B LABORATORY CERTIFICATES OF ANALYSIS



Envirolab Services Pty Ltd
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CERTIFICATE OF ANALYSIS 345553

Client Details

Client	Property Risk Australia Pty Ltd
Attention	
Address	PO BOX 95, Mascot, NSW, 1460

Sample Details

Your Reference	J02218
Number of Samples	130 Swab
Date samples received	05/03/2024
Date completed instructions received	05/03/2024

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.

Report Details

Date results requested by	05/03/2024
Date of Issue	05/03/2024


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Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Results Approved By

, Development Chemist

Authorised By

, Laboratory Manager

Client Reference: J02218

Lead in swab						
Our Reference		345553-1	345553-2	345553-3	345553-4	345553-5
Your Reference	UNITS	J02218-LCD07	J02218-LCD08	J02218-LCD09	J02218-LCD10	J02218-LCD11
Sampling Period Dates		01/03/2024	01/03/2024	01/03/2024	01/03/2024	01/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	20	<1	1	<1	<1

Lead in swab						
Our Reference		345553-6	345553-7	345553-8	345553-9	345553-10
Your Reference	UNITS	J02218-LCD12	J02218-LCD13	J02218-LCD14	J02218-LCD15	J02218-LCD16
Sampling Period Dates		01/03/2024	01/03/2024	01/03/2024	01/03/2024	01/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	8	1	<1	8	<1

Lead in swab						
Our Reference		345553-11	345553-12	345553-13	345553-14	345553-15
Your Reference	UNITS	J02218-LCD17	J02218-LCD18	J02218-LCD19	J02218-LCD20	J02218-LCD21
Sampling Period Dates		01/03/2024	01/03/2024	01/03/2024	01/03/2024	01/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Lead in swab						
Our Reference		345553-16	345553-17	345553-18	345553-19	345553-20
Your Reference	UNITS	J02218-LCD22	J02218-LCD23	J02218-LCD24	J02218-LCD25	J02218-LCD26
Sampling Period Dates		01/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	1	3	10	8	28

Lead in swab						
Our Reference		345553-21	345553-22	345553-23	345553-24	345553-25
Your Reference	UNITS	J02218-LCD27	J02218-LCD28	J02218-LCD29	J02218-LCD30	J02218-LCD31
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	1

Client Reference: J02218

Lead in swab						
Our Reference		345553-26	345553-27	345553-28	345553-29	345553-30
Your Reference	UNITS	J02218-LCD32	J02218-LCD33	J02218-LCD34	J02218-LCD35	J02218-LCD36
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Lead in swab						
Our Reference		345553-31	345553-32	345553-33	345553-34	345553-35
Your Reference	UNITS	J02218-LCD37	J02218-LCD38	J02218-LCD39	J02218-LCD40	J02218-LCD41
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	1	1	<1	<1	<1

Lead in swab						
Our Reference		345553-36	345553-37	345553-38	345553-39	345553-40
Your Reference	UNITS	J02218-LCD42	J02218-LCD43	J02218-LCD44	J02218-LCD45	J02218-LCD46
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	6

Lead in swab						
Our Reference		345553-41	345553-42	345553-43	345553-44	345553-45
Your Reference	UNITS	J02218-LCD47	J02218-LCD48	J02218-LCD49	J02218-LCD50	J02218-LCD51
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Lead in swab						
Our Reference		345553-46	345553-47	345553-48	345553-49	345553-50
Your Reference	UNITS	J02218-LCD52	J02218-LCD53	J02218-LCD54	J02218-LCD55	J02218-LCD56
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Client Reference: J02218

Lead in swab						
Our Reference		345553-51	345553-52	345553-53	345553-54	345553-55
Your Reference	UNITS	J02218-LCD57	J02218-LCD58	J02218-LCD59	J02218-LCD60	J02218-LCD61
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	11	17	12

Lead in swab						
Our Reference		345553-56	345553-57	345553-58	345553-59	345553-60
Your Reference	UNITS	J02218-LCD62	J02218-LCD63	J02218-LCD64	J02218-LCD65	J02218-LCD66
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	62	<1	35	7	<1

Lead in swab						
Our Reference		345553-61	345553-62	345553-63	345553-64	345553-65
Your Reference	UNITS	J02218-LCD67	J02218-LCD68	J02218-LCD69	J02218-LCD70	J02218-LCD71
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Lead in swab						
Our Reference		345553-66	345553-67	345553-68	345553-69	345553-70
Your Reference	UNITS	J02218-LCD72	J02218-LCD73	J02218-LCD74	J02218-LCD75	J02218-LCD76
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	1	4	<1	<1	2

Lead in swab						
Our Reference		345553-71	345553-72	345553-73	345553-74	345553-75
Your Reference	UNITS	J02218-LCD77	J02218-LCD78	J02218-LCD79	J02218-LCD80	J02218-LCD81
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	7	4	1

Client Reference: J02218

Lead in swab						
Our Reference		345553-76	345553-77	345553-78	345553-79	345553-80
Your Reference	UNITS	J02218-LCD82	J02218-LCD83	J02218-LCD84	J02218-LCD85	J02218-LCD86
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	7	35

Lead in swab						
Our Reference		345553-81	345553-82	345553-83	345553-84	345553-85
Your Reference	UNITS	J02218-LCD87	J02218-LCD88	J02218-LCD89	J02218-LCD90	J02218-LCD91
Sampling Period Dates		02/03/2024	02/03/2024	02/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	5	9	16	<1	<1

Lead in swab						
Our Reference		345553-86	345553-87	345553-88	345553-89	345553-90
Your Reference	UNITS	J02218-LCD92	J02218-LCD93	J02218-LCD94	J02218-LCD95	J02218-LCD96
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	6	16	<1

Lead in swab						
Our Reference		345553-91	345553-92	345553-93	345553-94	345553-95
Your Reference	UNITS	J02218-LCD97	J02218-LCD98	J02218-LCD99	J02218-LCD100	J02218-LCD101
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	2	3	<1	<1

Lead in swab						
Our Reference		345553-96	345553-97	345553-98	345553-99	345553-100
Your Reference	UNITS	J02218-LCD102	J02218-LCD103	J02218-LCD104	J02218-LCD105	J02218-LCD106
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	<1	<1

Client Reference: J02218

Lead in swab						
Our Reference		345553-101	345553-102	345553-103	345553-104	345553-105
Your Reference	UNITS	J02218-LCD107	J02218-LCD108	J02218-LCD109	J02218-LCD110	J02218-LCD111
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	7	5	15	5

Lead in swab						
Our Reference		345553-106	345553-107	345553-108	345553-109	345553-110
Your Reference	UNITS	J02218-LCD112	J02218-LCD113	J02218-LCD114	J02218-LCD115	J02218-LCD116
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	2	<1	<1	<1	<1

Lead in swab						
Our Reference		345553-111	345553-112	345553-113	345553-114	345553-115
Your Reference	UNITS	J02218-LCD117	J02218-LCD118	J02218-LCD119	J02218-LCD120	J02218-LCD121
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	<1	2	5

Lead in swab						
Our Reference		345553-116	345553-117	345553-118	345553-119	345553-120
Your Reference	UNITS	J02218-LCD122	J02218-LCD123	J02218-LCD124	J02218-LCD125	J02218-LCD126
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	13	9	<1	1	<1

Lead in swab						
Our Reference		345553-121	345553-122	345553-123	345553-124	345553-125
Your Reference	UNITS	J02218-LCD127	J02218-LCD128	J02218-LCD129	J02218-LCD130	J02218-LCD131
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	<1	<1	2	2	7

Client Reference: J02218

Lead in swab						
Our Reference		345553-126	345553-127	345553-128	345553-129	345553-130
Your Reference	UNITS	J02218-LCD132	J02218-LCD133	J02218-LCD134	J02218-LCD135	J02218-LCD136
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead in Swabs	µg/swab	3	6	2	<1	<1

Method ID	Methodology Summary
Metals-020/021/022	Acid digestion of Dust wipes/swabs and /or miscellaneous samples for metals determination by ICP-AES/MS and/or CV-AAS

Client Reference: J02218

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	<1	[NT]	[NT]	[NT]	[NT]	97	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-2	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	107	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-3	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	101	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-4	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	103	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-5	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	100	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-6	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	97	[NT]

QUALITY CONTROL: Lead in swab							Duplicate		Spike Recovery %	
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-7	[NT]
Date prepared	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			[NT]	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead in Swabs	µg/swab	1	Metals-020/021/022	[NT]	[NT]	[NT]	[NT]	[NT]	109	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

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.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

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: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-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.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.

CERTIFICATE OF ANALYSIS 345543

Client Details

Client	Property Risk Australia Pty Ltd
Attention	
Address	PO BOX 95, Mascot, NSW, 1460

Sample Details

Your Reference	J02218
Number of Samples	12 Swab
Date samples received	05/03/2024
Date completed instructions received	05/03/2024

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.

Report Details

Date results requested by	07/03/2024
Date of Issue	07/03/2024
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Results Approved By

, Inorganics Supervisor

Authorised By

, Laboratory Manager

Inorganics in Wipes						
Our Reference		345543-1	345543-2	345543-3	345543-4	345543-5
Your Reference	UNITS	DPMS-01	DPMS-02	DPMS-03	DPMS-04	DPMS-05
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Date analysed	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Total Inorganic Carbon in swab*	mg/swab	<20	<20	<20	<20	<20
Total Organic Carbon in swab*	mg/swab	30	30	30	30	30

Inorganics in Wipes						
Our Reference		345543-6	345543-7	345543-8	345543-9	345543-10
Your Reference	UNITS	DPMS-06	DPMS-07	DPMS-08	DPMS-09	DPMS-10
Sampling Period Dates		03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Type of sample		Swab	Swab	Swab	Swab	Swab
Date prepared	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Date analysed	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Total Inorganic Carbon in swab*	mg/swab	<20	<20	<20	<20	<20
Total Organic Carbon in swab*	mg/swab	30	20	20	20	20

Inorganics in Wipes			
Our Reference		345543-11	345543-12
Your Reference	UNITS	DPMS-11	DPMS-12
Sampling Period Dates		03/03/2024	03/03/2024
Type of sample		Swab	Swab
Date prepared	-	06/03/2024	06/03/2024
Date analysed	-	06/03/2024	06/03/2024
Total Inorganic Carbon in swab*	mg/swab	<20	<20
Total Organic Carbon in swab*	mg/swab	20	20

Method ID	Methodology Summary
INORG-137	Total Carbon Nitrogen Sulfur by high temperature catalytic combustion with IR detection.

Client Reference: J02218

QUALITY CONTROL: Inorganics in Wipes					Duplicate			Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			06/03/2024	[NT]	[NT]	[NT]	[NT]	06/03/2024	[NT]
Date analysed	-			06/03/2024	[NT]	[NT]	[NT]	[NT]	06/03/2024	[NT]
Total Inorganic Carbon in swab*	mg/swab	20	INORG-137	<20	[NT]	[NT]	[NT]	[NT]	96	[NT]
Total Organic Carbon in swab*	mg/swab	20	INORG-137	<20	[NT]	[NT]	[NT]	[NT]	96	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

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.
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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.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

Laboratory Acceptance Criteria

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Spikes for Physical and Aggregate Tests are not applicable.

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

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-50% surrogates) and 10-140% for labile SVOCs (including labile surrogates), ultra trace organics and speciated phenols is acceptable.

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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.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.





Appendix C LEAD AIR MONITORING REPORTS

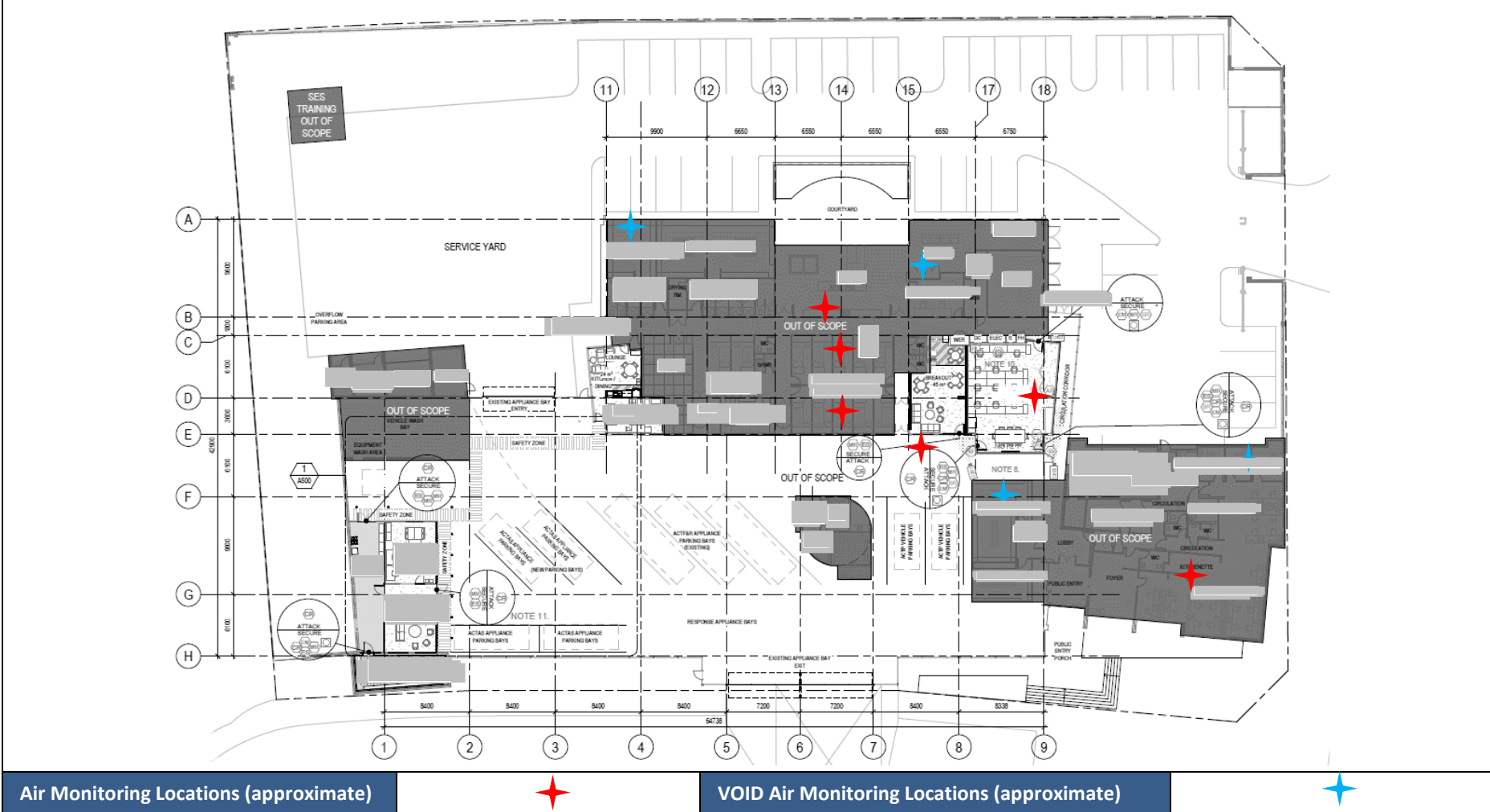


LEAD MONITORING REPORT				
PRA Ref.:	J02218-LM001- V1	Sampling Type:	Background & Exposure Monitoring	
Site Address:	JESC Gungahlin - 31 Anthony Rolfe Avenue, Gungahlin ACT 2902			
Client Details:	Complete Constructions (Aust) Pty Ltd			
Sampled by:	Samples were collected by [REDACTED] and [REDACTED] on 2 March 2024			
Work Activities:	o Investigative background and exposure lead air monitoring at JESC.			
Results				
Sample Location Locations are shown in Figure 1	Filter ID	Average Flow Rate (L/Min)	Sampling Period Start-Finish	Inhalable Lead (mg/m ³)
Field Blank 1	IOM 61	-	-	-
Field Blank 2	IOM 62	-	-	-
Personal – Natasha Phillips	IOM 49	2.00	0921 – 1528	< 0.01
Internal, [REDACTED], south-west – on kitchen cupboard.	IOM 50	2.00	0910 – 1245	< 0.01
Internal, Police area, office, north-west – on shelf.	IOM 51	2.00	Void	-
Internal, Engine bay, north-west elevation – on window sill.	IOM 52	2.00	0941 – 1513	< 0.01
Internal, [REDACTED], south-west – on table.	IOM 53	2.15	Void	-
Internal, [REDACTED], [REDACTED], [REDACTED] – on locker.	IOM 54	2.00	Void	-
Internal, [REDACTED], east – on fridge.	IOM 55	2.00	0933 - 1519	< 0.01
Personal - [REDACTED]	IOM 56	2.00	0921 - 1528	< 0.01
Internal, Police area, open office/kitchen – on shelving unit.	IOM 57	2.00	0937 – 1521	< 0.01
Internal, Police [REDACTED], central location – on locker.	IOM 58	2.00	Void	-
Internal, [REDACTED] – on shelf.	IOM 59	2.00	0927 – 1517	< 0.01
Internal, [REDACTED] central location – on locker.	IOM 60	2.00	0927 – 1518	< 0.01
Comments/Recommendations				
Filter IOM 53 was voided due to flow rate deficiency by +/- 10%. Filters IOM 51, IOM 54 & IOM 58 were voided due to pump battery failure. The results for the background and exposure samples were below the adopted action limit.				



LEAD AIR MONITORING REPORT
JESC GUNGAHLIN - 31 ANTHONY ROLFE AVENUE, GUNGAHLIN
ACT 2902

NATA accredited results are provided within Appendix A (Envirolab Ref: 345542).	
Methodology	
<p>Sampling and analysis were conducted in accordance with Australian Standard (AS) 3640-2009 <i>Workplace Atmospheres – Method for sampling and gravimetric determination of inhalable dust</i> and Envirolab Services in-house method involving ICP-MS (Metals-006). Sampling was performed using SKC portable sampling pumps fitted with IOM samplers containing 25mm MCE membrane filters that were flow tested at the commencement (2.0 L/min) and completion of sampling.</p> <p>The Workplace Exposure Standard (WES) for lead is 0.05 mg/m³ (TWA) in accordance with the <i>Workplace Exposure Standards for Airborne Contaminants</i>, Safe Work Australia (Oct 2022).</p> <p>Background (static) monitoring samples are used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES. Instead, an action limit for lead has been established at ≥ 50% of the TWA-WES (0.025mg/m³).</p>	
Disclaimer	The results within this report relate only to the sampling locations specified and their analysis. This report shall not be reproduced, except in full.
Technical Review By	Approved By
 (Consultant) Date: 12 March 2024	 (Certified Occupational Hygienist) Date: 19 March 2024



Source: 12574609-SE01-Security Layout-UR

Figure 1: Lead Air Monitoring Locations



LEAD AIR MONITORING REPORT
JESC GUNGAHLIN - 31 ANTHONY ROLFE AVENUE, GUNGAHLIN
ACT 2902

APPENDIX A CERTIFICATE OF ANALYSIS

CERTIFICATE OF ANALYSIS 345542

Client Details

Client	Property Risk Australia Pty Ltd
Attention	
Address	PO BOX 95, Mascot, NSW, 1460

Sample Details

Your Reference	J02218
Number of Samples	18 Filter
Date samples received	05/03/2024
Date completed instructions received	05/03/2024

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.

Report Details

Date results requested by	05/03/2024
Date of Issue	05/03/2024
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

[Redacted], Metals Supervisor

Authorised By

[Redacted], Laboratory Manager

Client Reference: J02218

Lead on filter						
Our Reference		345542-1	345542-2	345542-3	345542-4	345542-5
Your Reference	UNITS	PRA 12/11/18-49	PRA 12/11/18-50	PRA 12/11/18-51	PRA 12/11/18-52	PRA 12/11/18-53
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter						
Our Reference		345542-6	345542-7	345542-8	345542-9	345542-10
Your Reference	UNITS	PRA 12/11/18-54	PRA 12/11/18-55	PRA 12/11/18-56	PRA 12/11/18-57	PRA 12/11/18-58
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter						
Our Reference		345542-11	345542-12	345542-13	345542-14	345542-15
Your Reference	UNITS	PRA 12/11/18-59	PRA 12/11/18-60	PRA 28/8/19-61	PRA 28/8/19-62	PRA 28/8/19-63
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	03/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter				
Our Reference		345542-16	345542-17	345542-18
Your Reference	UNITS	PRA 28/8/19-64	PRA 28/8/19-68	PRA 28/8/19-67
Date Sampled		03/03/2024	03/03/2024	03/03/2024
Type of sample		Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1

Method ID	Methodology Summary
Metals-020/021/022	Determination of various metals on filters by ICP-AES/MS and or CV/AAS. Note - air volume measurements are not covered by Envirolab's NATA accreditation.

Client Reference: J02218

QUALITY CONTROL: Lead on filter				Duplicate				Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead	µg/filter	1	Metals-020/021/022	<1	[NT]	[NT]	[NT]	[NT]	105	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

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.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

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: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-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.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

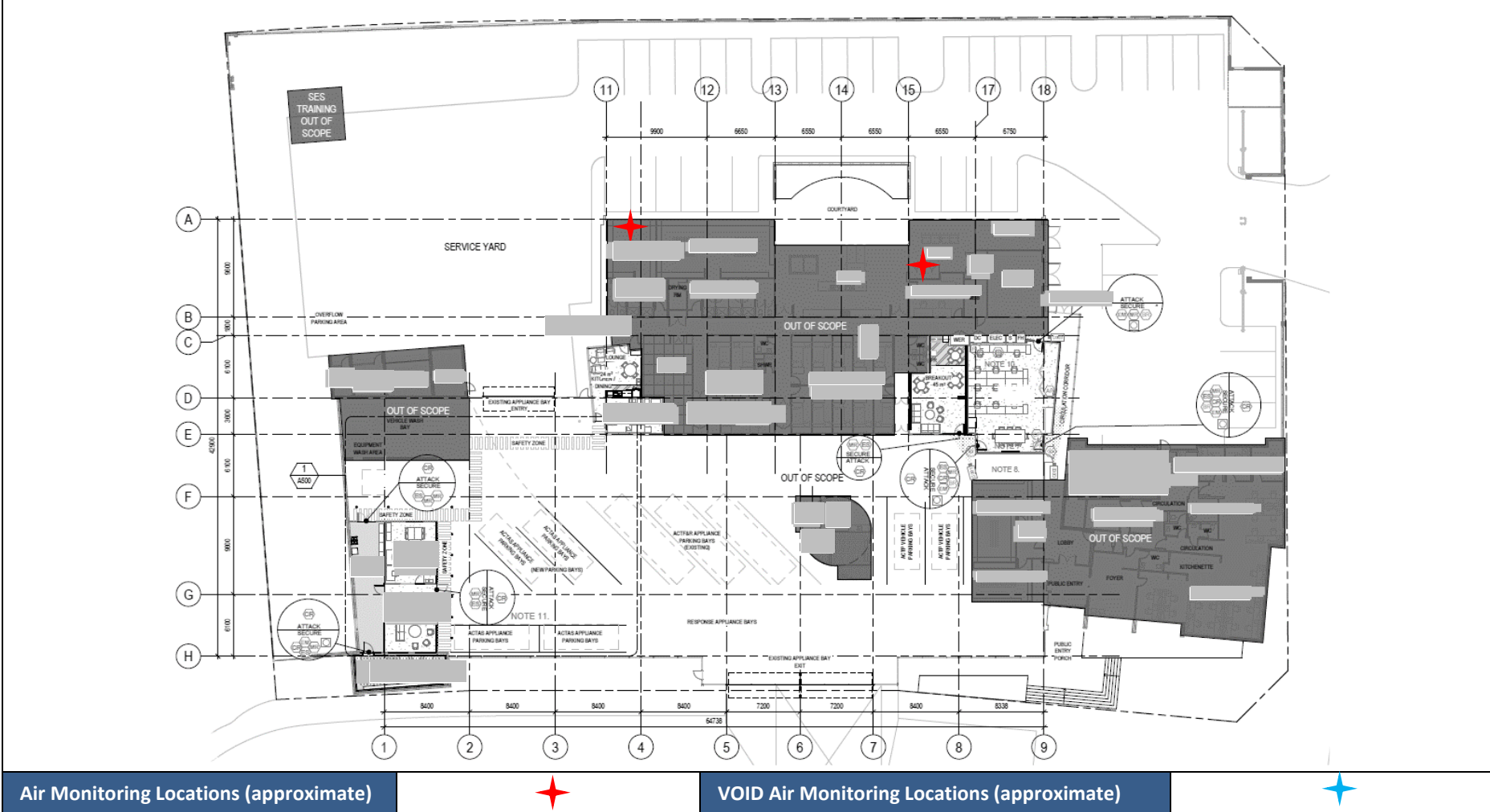
Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.



Property Risk Australia Pty Ltd
ABN: 65 611 579 223
PO Box 95, Mascot NSW 1460
www.propertyrisk.com.au

LEAD MONITORING REPORT				
PRA Ref.:	J02218-LM002- V1	Sampling Type:	Background Monitoring	
Site Address:	JESC Gungahlin - 31 Anthony Rolfe Avenue, Gungahlin ACT 2902			
Client Details:	Complete Constructions (Aust) Pty Ltd			
Sampled by:	Samples were collected by [REDACTED] and [REDACTED] on 3 March 2024			
Work Activities:	o Investigative background lead air monitoring at JESC.			
Results				
Sample Location Locations are shown in Figure 1	Filter ID	Average Flow Rate (L/Min)	Sampling Period Start-Finish	Inhalable Lead (mg/m ³)
Field Blank 1	IOM 68	-	-	-
Field Blank 2	IOM 67	-	-	-
Internal, [REDACTED] southeast – on table.	IOM 63	2.00	1043 – 1630	< 0.01
Internal, [REDACTED] [REDACTED] [REDACTED] central – on locker.	IOM 64	2.00	1045 – 1630	< 0.01
Comments/Recommendations				
The results for the background samples were below the adopted action limit. NATA accredited results are provided within Appendix A (Envirolab Ref: 345542).				
Methodology				
<p>Sampling and analysis were conducted in accordance with Australian Standard (AS) 3640-2009 <i>Workplace Atmospheres – Method for sampling and gravimetric determination of inhalable dust</i> and Envirolab Services in-house method involving ICP-MS (Metals-006). Sampling was performed using SKC portable sampling pumps fitted with IOM samplers containing 25mm MCE membrane filters that were flow tested at the commencement (2.0 L/min) and completion of sampling.</p> <p>The Workplace Exposure Standard (WES) for lead is 0.05 mg/m³ (TWA) in accordance with the <i>Workplace Exposure Standards for Airborne Contaminants</i>, Safe Work Australia (Oct 2022).</p> <p>Background (static) monitoring samples are used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES. Instead, an action limit for lead has been established at ≥ 50% of the TWA-WES (0.025mg/m³).</p>				
Disclaimer	The results within this report relate only to the sampling locations specified and their analysis. This report shall not be reproduced, except in full.			
Technical Review By		Approved By		
[REDACTED]		[REDACTED]		
(Position Title) Date: 12 March 2024		(Certified Occupational Hygienist) Date: 19 March 2024		



Source: 12574609-SE01-Security Layout-UR

Figure 1: Lead Air Monitoring Locations



LEAD AIR MONITORING REPORT
JESC GUNGAHLIN - 31 ANTHONY ROLFE AVENUE, GUNGAHLIN
ACT 2902

APPENDIX A CERTIFICATE OF ANALYSIS

CERTIFICATE OF ANALYSIS 345542

Client Details

Client	Property Risk Australia Pty Ltd
Attention	
Address	PO BOX 95, Mascot, NSW, 1460

Sample Details

Your Reference	J02218
Number of Samples	18 Filter
Date samples received	05/03/2024
Date completed instructions received	05/03/2024

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.

Report Details

Date results requested by	05/03/2024
Date of Issue	05/03/2024
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

[Redacted], Metals Supervisor

Authorised By

[Redacted], Laboratory Manager

Client Reference: J02218

Lead on filter						
Our Reference		345542-1	345542-2	345542-3	345542-4	345542-5
Your Reference	UNITS	PRA 12/11/18-49	PRA 12/11/18-50	PRA 12/11/18-51	PRA 12/11/18-52	PRA 12/11/18-53
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter						
Our Reference		345542-6	345542-7	345542-8	345542-9	345542-10
Your Reference	UNITS	PRA 12/11/18-54	PRA 12/11/18-55	PRA 12/11/18-56	PRA 12/11/18-57	PRA 12/11/18-58
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	02/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter						
Our Reference		345542-11	345542-12	345542-13	345542-14	345542-15
Your Reference	UNITS	PRA 12/11/18-59	PRA 12/11/18-60	PRA 28/8/19-61	PRA 28/8/19-62	PRA 28/8/19-63
Date Sampled		02/03/2024	02/03/2024	02/03/2024	02/03/2024	03/03/2024
Type of sample		Filter	Filter	Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1	<1	<1

Lead on filter				
Our Reference		345542-16	345542-17	345542-18
Your Reference	UNITS	PRA 28/8/19-64	PRA 28/8/19-68	PRA 28/8/19-67
Date Sampled		03/03/2024	03/03/2024	03/03/2024
Type of sample		Filter	Filter	Filter
Date prepared	-	05/03/2024	05/03/2024	05/03/2024
Date analysed	-	05/03/2024	05/03/2024	05/03/2024
Lead	µg/filter	<1	<1	<1

Method ID	Methodology Summary
Metals-020/021/022	Determination of various metals on filters by ICP-AES/MS and or CV/AAS. Note - air volume measurements are not covered by Envirolab's NATA accreditation.

Client Reference: J02218

QUALITY CONTROL: Lead on filter				Duplicate				Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Date analysed	-			05/03/2024	[NT]	[NT]	[NT]	[NT]	05/03/2024	[NT]
Lead	µg/filter	1	Metals-020/021/022	<1	[NT]	[NT]	[NT]	[NT]	105	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

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.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

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: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-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.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.



LEAD MONITORING REPORT

PRA Ref.:	J02218-LM003- V1	Sampling Type:	Background Monitoring
Site Address:	JESC Gungahlin - 31 Anthony Rolfe Avenue, Gungahlin ACT 2902		
Client Details:	Complete Constructions (Aust) Pty Ltd		
Sampled by:	Samples were collected by [redacted] and [redacted] on 4 March 2024		
Work Activities:	o Investigative background lead air monitoring at JESC.		

Results

Sample Location Locations are shown in Figure 1	Filter ID	Average Flow Rate (L/Min)	Sampling Period Start-Finish	Inhalable Lead (mg/m ³)
Field Blank 1	IOM 70	-	-	-
Field Blank 2	IOM 71	-	-	-
Internal, Police [redacted] [redacted], north side – on shelving.	IOM 65	2.00	0956 – 1605	< 0.01
Internal, Police area, [redacted] north-west – on shelf.	IOM 66	2.00	1000 – 1606	< 0.01

Comments/Recommendations

The results for the background samples were below the adopted action limit.
NATA accredited results are provided within **Appendix A** (Envirolab Ref: **345673**).

Methodology

Sampling and analysis were conducted in accordance with Australian Standard (AS) 3640-2009 *Workplace Atmospheres – Method for sampling and gravimetric determination of inhalable dust* and Envirolab Services in-house method involving ICP-MS (Metals-006). Sampling was performed using SKC portable sampling pumps fitted with IOM samplers containing 25mm MCE membrane filters that were flow tested at the commencement (2.0 L/min) and completion of sampling.

The Workplace Exposure Standard (WES) for lead is 0.05 mg/m³ (TWA) in accordance with the *Workplace Exposure Standards for Airborne Contaminants*, Safe Work Australia (Oct 2022).

Background (static) monitoring samples are used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES. Instead, an action limit for lead has been established at ≥ 50% of the TWA-WES (0.025mg/m³).

Disclaimer The results within this report relate only to the sampling locations specified and their analysis. This report shall not be reproduced, except in full.

Technical Review By

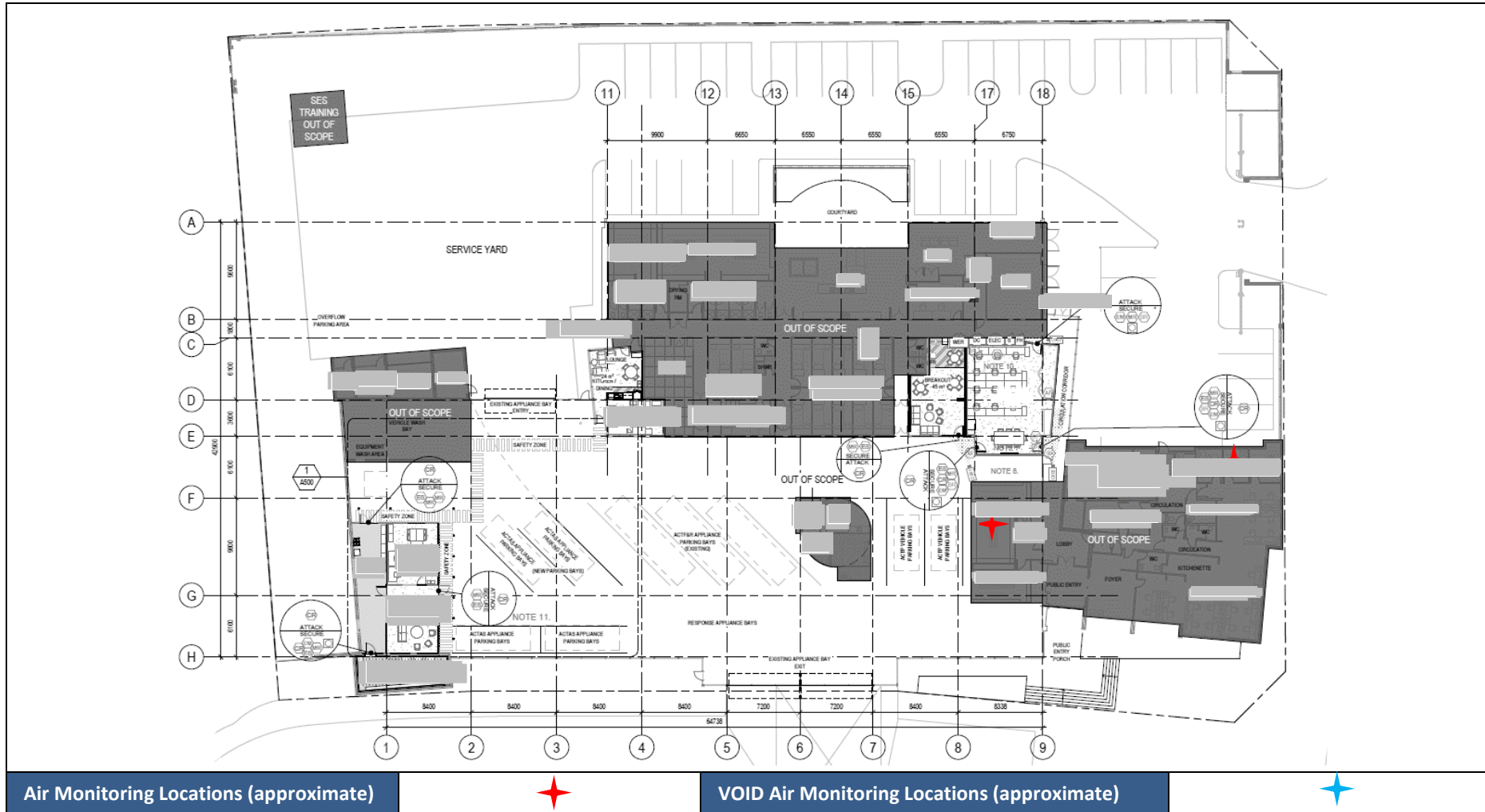
Approved By

[redacted]

[redacted]

(Position Title)
Date: 12 March 2024

(Certified Occupational Hygienist)
Date: 19 March 2024



Source: 12574609-SE01-Security Layout-UR

Figure 1: Lead Air Monitoring Locations



LEAD AIR MONITORING REPORT
JESC GUNGAHLIN - 31 ANTHONY ROLFE AVENUE, GUNGAHLIN
ACT 2902

APPENDIX A CERTIFICATE OF ANALYSIS

CERTIFICATE OF ANALYSIS 345673

Client Details

Client	Property Risk Australia (ACT) Pty Ltd
Attention	
Address	PO Box 7218, KALEEN, ACT, 2617

Sample Details

Your Reference	J02218
Number of Samples	4 Filter
Date samples received	06/03/2024
Date completed instructions received	06/03/2024

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.


Report Details

Date results requested by	06/03/2024
Date of Issue	06/03/2024


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Accredited for compliance with ISO/IEC 17025 - Testing. **Tests not covered by NATA are denoted with ***

Results Approved By

, Development Chemist

Authorised By

, Laboratory Manager

Client Reference: J02218

Lead on filter					
Our Reference		345673-1	345673-2	345673-3	345673-4
Your Reference	UNITS	PRA 28/8/19-65	PRA 28/8/19-66	PRA 28/8/19-70	PRA 28/8/19-71
Date Sampled		04/03/2024	04/03/2024	04/03/2024	04/03/2024
Type of sample		Filter	Filter	Filter	Filter
Date prepared	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Date analysed	-	06/03/2024	06/03/2024	06/03/2024	06/03/2024
Lead	µg/filter	<1	<1	<1	<1

Method ID	Methodology Summary
Metals-020/021/022	Determination of various metals on filters by ICP-AES/MS and or CV/AAS. Note - air volume measurements are not covered by Envirolab's NATA accreditation.

Client Reference: J02218

QUALITY CONTROL: Lead on filter				Duplicate				Spike Recovery %		
Test Description	Units	PQL	Method	Blank	#	Base	Dup.	RPD	LCS-1	[NT]
Date prepared	-			06/03/2024	[NT]	[NT]	[NT]	[NT]	06/03/2024	[NT]
Date analysed	-			06/03/2024	[NT]	[NT]	[NT]	[NT]	06/03/2024	[NT]
Lead	µg/filter	1	Metals-020/021/022	<1	[NT]	[NT]	[NT]	[NT]	110	[NT]

Result Definitions

NT	Not tested
NA	Test not required
INS	Insufficient sample for this test
PQL	Practical Quantitation Limit
<	Less than
>	Greater than
RPD	Relative Percent Difference
LCS	Laboratory Control Sample
NS	Not specified
NEPM	National Environmental Protection Measure
NR	Not Reported

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.
Australian Drinking Water Guidelines recommend that Thermotolerant Coliform, Faecal Enterococci, & E.Coli levels are less than 1cfu/100mL. The recommended maximums are taken from "Australian Drinking Water Guidelines", published by NHMRC & ARMC 2011.	
The recommended maximums for analytes in urine are taken from "2018 TLVs and BEIs", as published by ACGIH (where available). Limit provided for Nickel is a precautionary guideline as per Position Paper prepared by AIOH Exposure Standards Committee, 2016.	
Guideline limits for Rinse Water Quality reported as per analytical requirements and specifications of AS 4187, Amdt 2 2019, Table 7.2	

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: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% – see ELN-P05 QA/QC tables for details; <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase.

Matrix Spikes, LCS and Surrogate recoveries: Generally 70-130% for inorganics/metals (not SPOCAS); 60-140% for organics/SPOCAS (+/-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.

Where matrix spike recoveries fall below the lower limit of the acceptance criteria (e.g. for non-labile or standard Organics <60%), positive result(s) in the parent sample will subsequently have a higher than typical estimated uncertainty (MU estimates supplied on request) and in these circumstances the sample result is likely biased significantly low.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC and/or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, total recoverable metals and PFAS where solids are included by default.

Samples for Microbiological analysis (not Amoeba forms) received outside of the 2-8°C temperature range do not meet the ideal cooling conditions as stated in AS2031-2012.



Appendix D DPM AIR MONITORING REPORTS



Diesel Particulate Matter Monitoring Report		PRA Ref.:	J02218-DPM01
Client:	Complete Constructions (Aust) Pty Ltd	Date:	3 March 2024
Sampling Type:	Background Monitoring	Sampled By:	[REDACTED] and [REDACTED]
Project Location:	JESC Gungahlin - 31 Anthony Rolfe Avenue, Gungahlin ACT 2902		

Methodology

Sampling and analysis were conducted in accordance with United States National Institute for Occupational Safety and Health (NIOSH) Method 5040: *Diesel Particulate Matter* (as Elemental Carbon (EC)). The Australian Laboratory Services (ALS) Environmental laboratory in Smithfield NSW (NATA accreditation No. 825) in-house method for the analysis of diesel particulates, as elemental carbon, by thermal optical analyser was used.

The sampling was performed using constant flow portable sampling pumps fitted with 37mm 3-piece cassettes with quartz filters that were flow tested at the commencement (2.0 L/min) and completion of sampling. The sampling pumps were placed in fixed locations between one to two metres above ground for a duration considered representative of the task being assessed.

Based on the AIOH Position Paper – *Diesel Particulate Matter and Occupational Health Issues*, the AIOH recommended an 8-hour time weighted average (TWA) guidance exposure value of 0.1 mg/m³ (as EC).

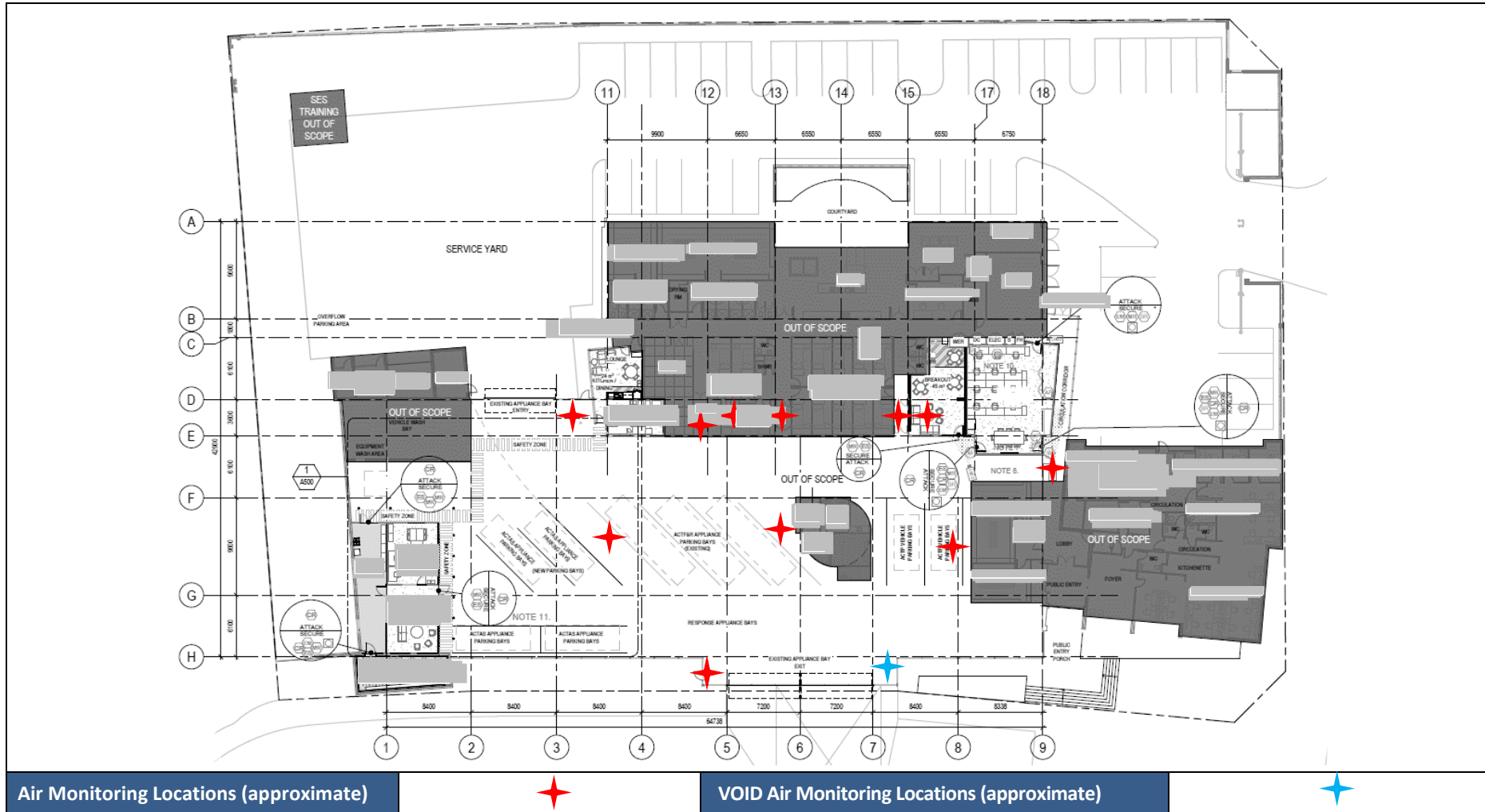
Background (Static) Monitoring

Background (static) monitoring samples were used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES/guidance exposure value. Instead, an action value for DPM has been established at ≥ 50% of the guidance exposure value. Where an action value is exceeded, the control measures should be reviewed, and potential sources identified as soon as is reasonably practicable.

Sample Location(s)	Filter ID	Average Flow Rate (L/min)	Sampling Period Start – Finish	DPM (as EC) Concentration (mg/m ³)
Field Blank 1	DPM13	-	-	-
Field Blank 2	DPM13	-	-	-
Internal, Ground Floor, Circulation Corridor, on wall outside door to engine bay	DPM01	2.00	1055 – 1618	<0.01
Internal, Ground Floor, corridor outside [REDACTED] a, on wall	DPM02	2.00	1058 – 1615	<0.01
Internal, Ground Floor, corridor outside [REDACTED] on wall	DPM03	2.00	1100 – 1609	<0.01
Internal, Ground Floor, outside [REDACTED] on wall	DPM04	2.00	1102 – 1612	<0.01
Internal, Ground Floor, [REDACTED] outside engine bay on shelf	DPM05	2.00	1104 – 1616	<0.01

Internal, Ground Floor, engine bay, adjacent louvres, southeast	DPM06	2.00	1111 – 1622	<0.01
Internal, Ground Floor, [REDACTED], on shelf	DPM07	2.00	1106 – 1611	<0.01
Internal, Ground Floor, engine bay, adjacent louvres, southwest	DPM08	VOID	-	-
Internal, Ground Floor, engine bay, central	DPM09	2.00	1115 – 1623	<0.01
Internal, Ground Floor, engine bay, adjacent louvre door, north	DPM10	2.00	1113 – 1624	<0.01
Internal, Ground Floor, engine bay on police [REDACTED], east	DPM11	2.00	1123 – 1620	<0.01
Internal, Ground Floor, adjacent middle [REDACTED], on wall	DPM12	2.00	1122 – 1621	<0.01

Site Activities and Comments	
<p>Sample DPM08 was voided due to pump failure.</p> <p>No machines operating on diesel fuels were present on the site at the time of sampling.</p> <p>All samples returned results below the adopted action value for DPM as EC.</p> <p>NATA accredited results are provided in Appendix A (Envirolab Ref.: PFC0151).</p>	
Prepared By	Approved By
<div style="background-color: #cccccc; width: 100px; height: 40px; margin: 0 auto;"></div> <p><i>Consultant</i> PROPERTY RISK AUSTRALIA PTY LTD</p>	<div style="background-color: #cccccc; width: 100px; height: 40px; margin: 0 auto;"></div> <p><i>Certified Occupational Hygienist</i> PROPERTY RISK AUSTRALIA PTY LTD</p>



Source: 12574609-SE01-Security Layout-UR

Figure 1: DPM Air Monitoring Locations



APPENDIX A – CERTIFICATE OF ANALYSIS

Certificate of Analysis PFC0151

Client Details

Client Property Risk Australia Pty Ltd (ACT)
Contact [REDACTED]
Address Unit 2, 5-7 Kemble Court, MITCHELL, ACT, 2911

Sample Details

Your Reference J02218
Number of Samples 14 Filter
Date Samples Received 05/03/2024
Date Instructions Received 05/03/2024

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.

Report Details

Date Results Requested by 07/03/2024
Date of Issue 06/03/2024

NATA Accreditation Number 2901. This document shall not be reproduced except in full.
Accredited for compliance with ISO/IEC 17025. Tests not covered by NATA are denoted with *.

Authorisation Details

Results Approved By [REDACTED], OHL Supervisor

Laboratory Manager [REDACTED]

Certificate of Analysis PFC0151

Samples in this Report

Envirolab ID	Sample ID	Matrix	Date Sampled	Date Received
PFC0151-01	DPM-01	Filter	03/03/2024	05/03/2024
PFC0151-02	DPM-02	Filter	03/03/2024	05/03/2024
PFC0151-03	DPM-03	Filter	03/03/2024	05/03/2024
PFC0151-04	DPM-04	Filter	03/03/2024	05/03/2024
PFC0151-05	DPM-05	Filter	03/03/2024	05/03/2024
PFC0151-06	DPM-06	Filter	03/03/2024	05/03/2024
PFC0151-07	DPM-07	Filter	03/03/2024	05/03/2024
PFC0151-08	DPM-08	Filter	03/03/2024	05/03/2024
PFC0151-09	DPM-09	Filter	03/03/2024	05/03/2024
PFC0151-10	DPM-10	Filter	03/03/2024	05/03/2024
PFC0151-11	DPM-11	Filter	03/03/2024	05/03/2024
PFC0151-12	DPM-12	Filter	03/03/2024	05/03/2024
PFC0151-13	DPM-13	Filter	03/03/2024	05/03/2024
PFC0151-14	DPM-14	Filter	03/03/2024	05/03/2024

Certificate of Analysis PFC0151

Diesel Particulate Matter (Filter)

Envirolab ID	Units	PQL	PFC0151-01	PFC0151-02	PFC0151-03	PFC0151-04	PFC0151-05
Your Reference			DPM-01	DPM-02	DPM-03	DPM-04	DPM-05
Date Sampled			03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0	<3.0	<3.0	<3.0
Diesel Particulate Matter as Organic Carbon*	µg/sample	10	23	24	22	68	19
Diesel Particulate Matter as Total Carbon*	µg/sample	10	23	24	22	68	19

Envirolab ID	Units	PQL	PFC0151-06	PFC0151-07	PFC0151-08	PFC0151-09	PFC0151-10
Your Reference			DPM-06	DPM-07	DPM-08	DPM-09	DPM-10
Date Sampled			03/03/2024	03/03/2024	03/03/2024	03/03/2024	03/03/2024
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0	<3.0	<3.0	<3.0
Diesel Particulate Matter as Organic Carbon*	µg/sample	10	18	24	17	32	21
Diesel Particulate Matter as Total Carbon*	µg/sample	10	18	24	17	32	21

Envirolab ID	Units	PQL	PFC0151-11	PFC0151-12	PFC0151-13	PFC0151-14
Your Reference			DPM-11	DPM-12	DPM-13	DPM-14
Date Sampled			03/03/2024	03/03/2024	03/03/2024	03/03/2024
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0	<3.0	<3.0
Diesel Particulate Matter as Organic Carbon*	µg/sample	10	22	26	25	14
Diesel Particulate Matter as Total Carbon*	µg/sample	10	22	26	25	14

Certificate of Analysis PFC0151

Method Summary

Method ID	Methodology Summary
DUST-003	Diesel Particulate analysed as Elemental and/or Organic Carbon in accordance with NIOSH method 5040.

Certificate of Analysis PFC0151

Result Definitions

Identifier	Description
NR	Not reported
NEPM	National Environment Protection Measure
NS	Not specified
LCS	Laboratory Control Sample
RPD	Relative Percent Difference
>	Greater than
<	Less than
PQL	Practical Quantitation Limit
INS	Insufficient sample for this test
NA	Test not required
NT	Not tested
DOL	Samples rejected due to particulate overload (air filters only)
RFD	Samples rejected due to filter damage (air filters only)
RUD	Samples rejected due to uneven deposition (air filters only)
##	Indicates a laboratory acceptance criteria outlier, for further details, see Result Comments and/or QC Comments

Quality Control Definitions

Blank

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

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.

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.

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.

Duplicate

This is the complete duplicate analysis of a sample from the process batch. The sample selected should be one where the analyte concentration is easily measurable.

Certificate of Analysis PFC0151

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.

General Acceptance Criteria (GAC) - Analyte specific criteria applies for some analytes and is reflected in QC recovery tables.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% - see ELN-P05 QAQC tables for details (available on request); <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase. 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 typically insufficient in order to satisfy laboratory QA/QC protocols.

Miscellaneous Information

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. We have taken the sampling date as being the date received at the laboratory.

Two significant figures are reported for the majority of tests and with a high degree of confidence, for results <10*PQL, the second significant figure may be in doubt i.e. has a relatively high degree of uncertainty and is provided for information only.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, Total Recoverable metals and PFAS where sediment/solids are included by default.

Urine Analysis - The BEI values listed are taken from the 2022 edition of *TLVs and BEIs Threshold Limits by ACGIH*.

Air volume measurements are not covered by Envirolab's NATA accreditation.

Data Quality Assessment Summary PFC0151

Client Details

Client	Property Risk Australia Pty Ltd (ACT)
Your Reference	J02218
Date Issued	06/03/2024

Recommended Holding Time Compliance

No recommended holding time exceedances

Quality Control and QC Frequency

QC Type	Compliant	Details
Blank	Yes	No Outliers
LCS	Yes	No Outliers
Duplicates	No	Duplicate Outliers Exist - See detailed list below
Matrix Spike	Yes	No Outliers
Surrogates / Extracted Internal Standards	Yes	No Outliers
QC Frequency	Yes	No Outliers

Surrogates/Extracted Internal Standards, Duplicates and/or Matrix Spikes are not always relevant/applicable to certain analyses and matrices. Therefore, said QC measures are deemed compliant in these situations by default. See Laboratory Acceptance Criteria for more information

Data Quality Assessment Summary PFC0151

Recommended Holding Time Compliance

Analysis	Sample Number(s)	Date Sampled	Date Extracted	Date Analysed	Compliant
DPM Filter	1-14	03/03/2024	06/03/2024	06/03/2024	Yes

Outliers: Duplicates

DUST-003 | Diesel Particulate Matter (Filter) | Batch BFC0411

Sample ID	Duplicate ID	Analyte	% Limits	RPD
BFC0411-DUP1#	DUP1	Diesel Particulate Matter as Organic Carbon	50.00	200[1]
BFC0411-DUP1#	DUP1	Diesel Particulate Matter as Total Carbon	50.00	200[1]

Quality Control PFC0151

DUST-003 | Diesel Particulate Matter (Filter) | Batch BFC0411

Analyte	Units	PQL	Blank	DUP1	DUP2	LCS %
				BFC0411-DUP1#	PFC0151-05	
				Samp QC RPD %	Samp QC RPD %	
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0 <3.0 [NA]	<3.0 <3.0 [NA]	[NA]
Diesel Particulate Matter as Organic Carbon	µg/sample	10	<10	10.4 <10 200 [1]	18.8 20.1 6.55	101
Diesel Particulate Matter as Total Carbon	µg/sample	10	<10	10.4 <10 200 [1]	18.8 20.1 6.55	[NA]

The QC reported was not specifically part of this workorder but formed part of the QC process batch.

QC Comments

Identifier	Description
[1]	Duplicate %RPD may be flagged as an outlier to routine laboratory acceptance, however, where one or both results are <10*PQL, the RPD acceptance criteria increases exponentially.



Diesel Particulate Matter Monitoring Report		PRA Ref.:	J02218-DPM02
Client:	Complete Constructions (Aust) Pty Ltd	Date:	4 March 2024
Sampling Type:	Background Monitoring	Sampled By:	[Redacted] and [Redacted]
Project Location:	JESC Gungahlin - 31 Anthony Rolfe Avenue, Gungahlin ACT 2902		

Methodology

Sampling and analysis were conducted in accordance with United States National Institute for Occupational Safety and Health (NIOSH) Method 5040: *Diesel Particulate Matter* (as Elemental Carbon (EC)). The Australian Laboratory Services (ALS) Environmental laboratory in Smithfield NSW (NATA accreditation No. 825) in-house method for the analysis of diesel particulates, as elemental carbon, by thermal optical analyser was used.

The sampling was performed using constant flow portable sampling pumps fitted with 37mm 3-piece cassettes with quartz filters that were flow tested at the commencement (2.0 L/min) and completion of sampling. The sampling pumps were placed in fixed locations between one to two metres above ground for a duration considered representative of the task being assessed.



Based on the AIOH Position Paper – *Diesel Particulate Matter and Occupational Health Issues*, the AIOH recommended an 8-hour time weighted average (TWA) guidance exposure value of 0.1 mg/m³ (as EC).

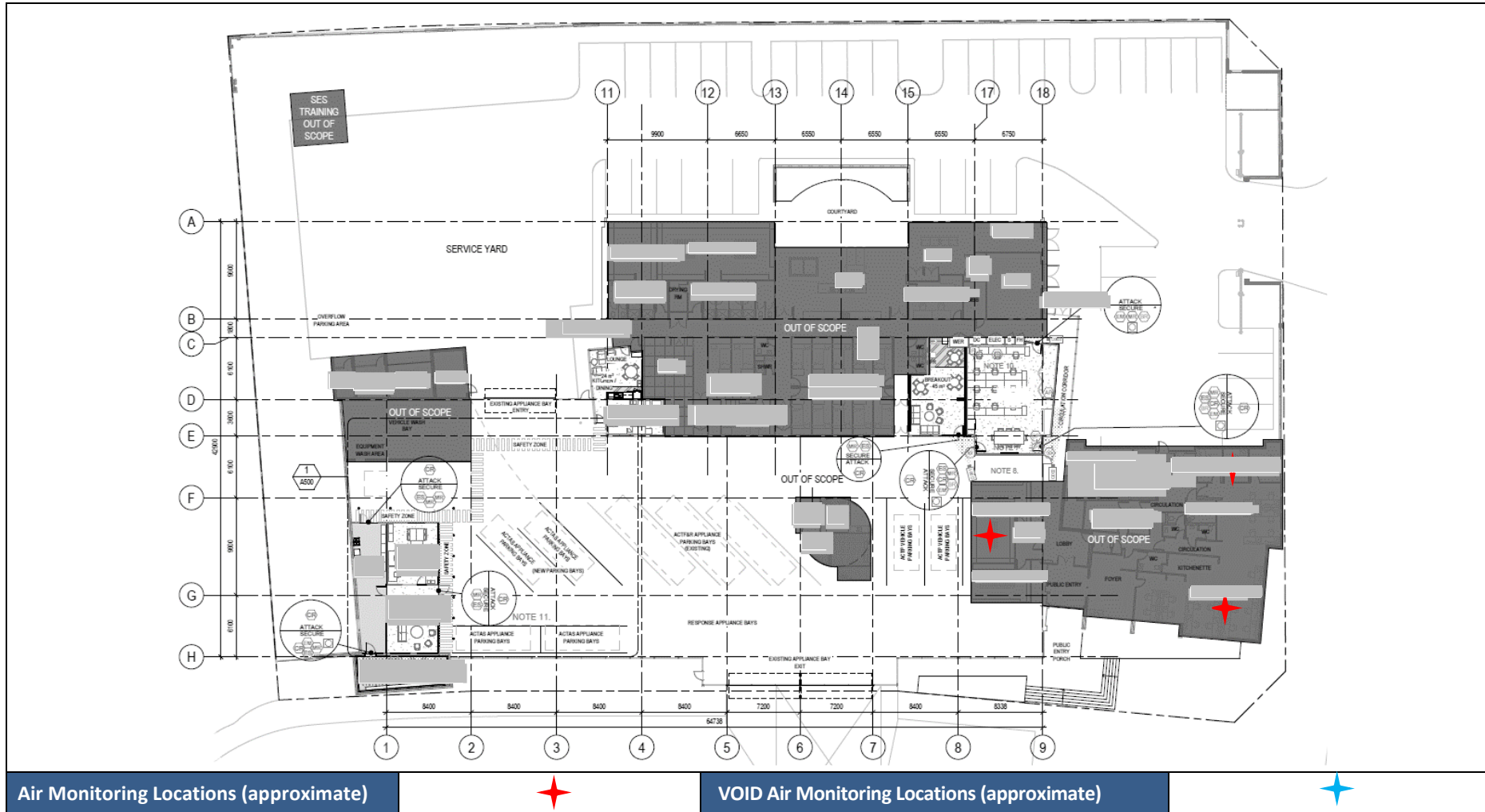
Background (Static) Monitoring

Background (static) monitoring samples were used to determine static air conditions within the site. Background monitoring is not indicative of personal exposure and should not be directly compared against a WES/guidance exposure value. Instead, an action value for DPM has been established at ≥ 50% of the guidance exposure value. Where an action value is exceeded, the control measures should be reviewed, and potential sources identified as soon as is reasonably practicable.

Sample Location(s)	Filter ID	Average Flow Rate (L/min)	Sampling Period Start – Finish	DPM (as EC) Concentration (mg/m ³)
Field Blank 1	DPM18	-	-	-
Internal, Ground Floor, police [Redacted] on shelving	DPM15	2.00	0956 – 1605	<0.01
Internal, Ground Floor, policing area, [Redacted] central on desk	DPM16	2.00	1000 – 1605	<0.01
Internal, Ground Floor, policing area, [Redacted] central on desk	DPM17	2.00	1002 – 1606	<0.01



Site Activities and Comments	
<p>Sample DPM08 was voided due to pump failure.</p> <p>No machines operating on diesel fuels were present on the site at the time of sampling.</p> <p>All samples returned results below the adopted action value for DPM as EC.</p> <p>NATA accredited results are provided in Appendix A (Envirolab Ref.: PFC0152).</p>	
Prepared By	Approved By
 <i>Consultant</i> PROPERTY RISK AUSTRALIA PTY LTD	 <i>Certified Occupational Hygienist</i> PROPERTY RISK AUSTRALIA PTY LTD



Source: 12574609-SE01-Security Layout-UR

Figure 1: DPM Air Monitoring Locations



APPENDIX A – CERTIFICATE OF ANALYSIS



Envirolab Services (WA) Pty Ltd trading as MPL Laboratories

ABN 53 140 099 207

16-18 Hayden Court Myaree WA 6154

ph +61 8 9317 2505

lab@mpl.com.au

www.mpl.com.au

Certificate of Analysis PFC0252

Client Details

Client Property Risk Australia Pty Ltd (ACT)
Contact [REDACTED]
Address Unit 2, 5-7 Kemble Court, MITCHELL, ACT, 2911

Sample Details

Your Reference J02218
Number of Samples 4 Filter
Date Samples Received 06/03/2024
Date Instructions Received 06/03/2024

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.

Report Details

Date Results Requested by 07/03/2024
Date of Issue 07/03/2024

NATA Accreditation Number 2901. This document shall not be reproduced except in full.
Accredited for compliance with ISO/IEC 17025. Tests not covered by NATA are denoted with *.

Authorisation Details

Results Approved By [REDACTED], OHL Supervisor
Laboratory Manager [REDACTED]

Certificate of Analysis PFC0252

Samples in this Report

Envirolab ID	Sample ID	Matrix	Date Sampled	Date Received
PFC0252-01	DPM-15	Filter	04/03/2024	06/03/2024
PFC0252-02	DPM-16	Filter	04/03/2024	06/03/2024
PFC0252-03	DPM-17	Filter	04/03/2024	06/03/2024
PFC0252-04	DPM-18	Filter	04/03/2024	06/03/2024

Certificate of Analysis PFC0252

Diesel Particulate Matter (Filter)

Envirolab ID	Units	PQL	PFC0252-01	PFC0252-02	PFC0252-03	PFC0252-04
Your Reference			DPM-15	DPM-16	DPM-17	DPM-18
Date Sampled			04/03/2024	04/03/2024	04/03/2024	04/03/2024
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0	<3.0	<3.0
Diesel Particulate Matter as Organic Carbon*	µg/sample	10	35	28	23	23
Diesel Particulate Matter as Total Carbon*	µg/sample	10	35	28	23	23

Certificate of Analysis PFC0252

Method Summary

Method ID	Methodology Summary
DUST-003	Diesel Particulate analysed as Elemental and/or Organic Carbon in accordance with NIOSH method 5040.

Certificate of Analysis PFC0252

Result Definitions

Identifier	Description
NR	Not reported
NEPM	National Environment Protection Measure
NS	Not specified
LCS	Laboratory Control Sample
RPD	Relative Percent Difference
>	Greater than
<	Less than
PQL	Practical Quantitation Limit
INS	Insufficient sample for this test
NA	Test not required
NT	Not tested
DOL	Samples rejected due to particulate overload (air filters only)
RFD	Samples rejected due to filter damage (air filters only)
RUD	Samples rejected due to uneven deposition (air filters only)
##	Indicates a laboratory acceptance criteria outlier, for further details, see Result Comments and/or QC Comments

Quality Control Definitions

Blank

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

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.

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.

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.

Duplicate

This is the complete duplicate analysis of a sample from the process batch. The sample selected should be one where the analyte concentration is easily measurable.

Certificate of Analysis PFC0252

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.

General Acceptance Criteria (GAC) - Analyte specific criteria applies for some analytes and is reflected in QC recovery tables.

Duplicates: >10xPQL - RPD acceptance criteria will vary depending on the analytes and the analytical techniques but is typically in the range 20%-50% - see ELN-P05 QAQC tables for details (available on request); <10xPQL - RPD are higher as the results approach PQL and the estimated measurement uncertainty will statistically increase. 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 typically insufficient in order to satisfy laboratory QA/QC protocols.

Miscellaneous Information

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. We have taken the sampling date as being the date received at the laboratory.

Two significant figures are reported for the majority of tests and with a high degree of confidence, for results <10*PQL, the second significant figure may be in doubt i.e. has a relatively high degree of uncertainty and is provided for information only.

Measurement Uncertainty estimates are available for most tests upon request.

Analysis of aqueous samples typically involves the extraction/digestion and/or analysis of the liquid phase only (i.e. NOT any settled sediment phase but inclusive of suspended particles if present), unless stipulated on the Envirolab COC or by correspondence. Notable exceptions include certain Physical Tests (pH/EC/BOD/COD/Apparent Colour etc.), Solids testing, Total Recoverable metals and PFAS where sediment/solids are included by default.

Urine Analysis - The BEI values listed are taken from the 2022 edition of *TLVs and BEIs Threshold Limits by ACGIH*.

Air volume measurements are not covered by Envirolab's NATA accreditation.

Data Quality Assessment Summary PFC0252

Client Details

Client	Property Risk Australia Pty Ltd (ACT)
Your Reference	J02218
Date Issued	07/03/2024

Recommended Holding Time Compliance

No recommended holding time exceedances

Quality Control and QC Frequency

QC Type	Compliant	Details
Blank	Yes	No Outliers
LCS	Yes	No Outliers
Duplicates	Yes	No Outliers
Matrix Spike	Yes	No Outliers
Surrogates / Extracted Internal Standards	Yes	No Outliers
QC Frequency	Yes	No Outliers

Surrogates/Extracted Internal Standards, Duplicates and/or Matrix Spikes are not always relevant/applicable to certain analyses and matrices. Therefore, said QC measures are deemed compliant in these situations by default. See Laboratory Acceptance Criteria for more information

Data Quality Assessment Summary PFC0252

Recommended Holding Time Compliance

Analysis	Sample Number(s)	Date Sampled	Date Extracted	Date Analysed	Compliant
DPM Filter	1-4	04/03/2024	06/03/2024	07/03/2024	Yes

Quality Control PFC0252

DUST-003 | Diesel Particulate Matter (Filter) | Batch BFC0551

Analyte	Units	PQL	Blank	DUP1	DUP2	LCS %
				BFC0551-DUP1# Samp QC RPD %	BFC0551-DUP2# Samp QC RPD %	
Diesel Particulate Matter as Elemental Carbon	µg/sample	3.0	<3.0	<3.0 <3.0 [NA]	<3.0 <3.0 [NA]	[NA]
Diesel Particulate Matter as Organic Carbon	µg/sample	10	<10	<10 <10 [NA]	<10 <10 [NA]	105
Diesel Particulate Matter as Total Carbon	µg/sample	10	<10	<10 <10 [NA]	<10 <10 [NA]	[NA]

The QC reported was not specifically part of this workorder but formed part of the QC process batch.



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