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475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

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SLR Project No.: 610.031473

Client Reference No.: AU.922246

18 June 2024

Revision: V1.2

Making Sustainability Happen

Revision Record

Revision	Date	Prepared By	Checked By	Authorised By	
V1.2	18 June 2024	S Bagheri K Lawrence, A Naghizadeh		A Naghizadeh	
V1.1	05 June 2024	S Bagheri	K Lawrence, A Naghizadeh	A Naghizadeh	
V1.0	17 November 2023	S Bagheri	K Lawrence, A Naghizadeh	A Naghizadeh	

Basis of Report

This report has been prepared by SLR Consulting Australia (SLR) with all reasonable skill, care and diligence, and taking account of the timescale and resources allocated to it by agreement with Ingham Property Group (the Client). Information reported herein is based on the interpretation of data collected, which has been accepted in good faith as being accurate and valid.

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1.0 Introduction

The Ingham Property Group (IPG) site that is the subject of this report is located at 475 Badgerys Creek Road, Bradfield (the Site). The Site forms part of the Aerotropolis Core Precinct within the Western Sydney Aerotropolis and is predominately zoned for ENT Enterprise use under the State Environmental Planning Policy (Precincts – Western Parkland City) 2021 (WPC SEPP).

The Site comprises a total area of 184 hectares (ha) along Badgerys Creek Road, strategically located within the heart of Western Parkland City. The majority of the Site is under the ownership of IPG, with a small portion of land earmarked for the North Bradfield Zone Substation to be owned by Endeavour Energy. The Site is largely defined by grassland and is mostly clear of vegetation as it is currently used for agricultural purposes. There is also an internal road network within the Site which had previously connected the now demolished sheds and ancillary structures dispersed across the Site. The Site is deemed suitable for development and free of contamination based on environmental testing and investigations.

As noted above, the Site is situated within the Western Sydney Aerotropolis, and has a direct interface with the Western Sydney International Airport (WSI). The Site is bound by two significant riparian corridors that define Western Sydney, with South Creek to the east and Badgerys Creek to the northwest. The immediate surroundings of the Site are characterised by large rural landholdings used predominately for agricultural and light manufacturing purposes, all of which will be redeveloped in accordance with the Aerotropolis Precinct Plan vision.

IPG is currently undertaking the Master Plan pathway with the Technical Assurance Panel (TAP), which is an optional design process established under the WPC SEPP to amend the Aerotropolis Precinct Plan as it applies to the Site. IPG is in the process of preparing a Master Plan for the Site, as part of a co-design process with the TAP, which will be formally lodged to the Department of Planning and Environment (DPE) in accordance with the Western Sydney Aerotropolis Master Plan Guidelines.

The IPG Master Plan has been informed by a detailed assessment of the site-specific considerations through preliminary site investigations. The Master Plan breaks down the general application of the Enterprise zone across the Site and provides a more granular approach to land use planning with considerations made to the opportunities and constraints of the Site. The indicative structure plan within the Master Plan is made up of four key land uses, which include enterprise and light industry, business and enterprise and employment zone centres.

IPG has engaged SLR Consulting Australia Pty Ltd (SLR) to prepare an Air Quality Assessment (AQA) to inform the Master Plan and co-design process.

This document addresses air quality related requirements included in the Master Plan Requirements issued for the Master Plan Application, dated August 2022. In relation to air quality, the Master Plan Requirements states:

16. Air quality and Odour

The draft master plan must be supported by a preliminary discussion on air quality and odour impact. This should include an assessment of existing air quality and odour conditions.

This report presents an assessment of:

- Potential air quality impacts on future occupants of the Site, associated with regional background air quality and identified existing and future air emission sources in the vicinity of the Site; and
- Potential air quality impacts on existing and future sensitive receptors surrounding the Site, associated with air emissions from activities that may be undertaken within the Site based on the current Master Plan.

The scope of this report is limited to the operational phase of the Site and does not address construction-related impacts during the Site's development. Those impacts would be addressed via a Dust Management Plan to identify and implement the required dust controls.

2.0 **Project Overview**

2.1 Site Location

The Site is located at 475 Badgerys Creek Road, Bradfield, legally known as Lot 1 DP 1123344 Lots 99 and 100 in DP1287207 and comprises a total area of 182 ha under single ownership along Badgerys Creek Road, centrally located within Western Parkland City. Lot 99 comprises of the zone substation and Lot 100 comprises of the remainder of the Site. The local setting and regional context of the Site is shown in **Figure 1**.



Figure 1 Regional Location of the Site

2.2 Master Plan Overview

As noted previously, the Site forms part of the Aerotropolis Core Precinct within the Western Sydney Aerotropolis and is predominately zoned for ENT Enterprise use under the WPC SEPP. The Aerotropolis Core is intended to become "a place of choice to do business, a new high order employment-focused metropolitan centre with a focus on advanced manufacturing, research and development, professional services, creative industries and STEM-focused educational facilities".



The Master Plan is informed by an indicative structure plan, which responds to the key objectives of the Aerotropolis Core and the land use principles outlined within the Precinct Plan. These objectives include:

- Develop a metropolitan centre, around the Aerotropolis Core Metro station that will be a focus for business, tourism and social experiences.
- Be the location of choice for advanced manufacturing and high technology industries in Australia with accessible infrastructure, public transport and high design quality with fit-for-purpose buildings and green spaces.
- Facilitate the establishment of an aerospace and defence industries sub-precinct through the provision of appropriate infrastructure, a variety of lot configurations and sizes and by enabling 24/7 operations of the Western Sydney Airport.
- Facilitate the development of educational uses accessible by public transport and active transport.
- Prioritise pedestrian and active transport within the Aerotropolis Core through infrastructure and amenity in the street network and the blue-green grid.
- Enable residential development as part of a diverse mixed use sub-precinct in areas that are not impacted by airport noise and that benefit from proximity to Wianamatta-South Creek and Thompsons Creek.

The indicative layout of the Site is shown in **Figure 2**.



Figure 2 Indicative Layout

Source: (SBA 2024)

2.3 Identified Local Air Emission Sources

Existing sources of emissions to air in the vicinity of the Site with the potential to give rise to cumulative air quality impacts were identified based on a review of the public register of Environment Protection Licences (EPLs), the National Pollutant Inventory (NPI) database, and the Air Quality and Odour Study completed by Northstar Air Quality for the Western Sydney Aerotropolis in October 2020 (Northstar 2020).

A number of potential sources of air emissions currently exist within 2 km from the Site. These include:

- Several poultry farms to the north, east and west;
- Greenhill Mushrooms, located 300 m to the east;
- Australian Native Landscapes (ANL), located 1.2 km to the north; and
- PGH Bricks & Pavers located immediately to the north of the Site.

Based on information provided by IPG, SLR understands that the PGH Bricks & Pavers site is currently undergoing rehabilitation and extractive and industrial activities at this site will have ceased. As such, potential impacts from this source have not been considered further in this report.

In addition to the above existing sources of emissions to air, Western Sydney Airport has been identified as a future source of air pollutants in the vicinity of the Site.

The location of the identified sources is shown in Figure 3.

Based on the types of existing and proposed sources of air pollutants identified within this assessment, the air pollutants of interest are likely to be:

- Odour emissions from poultry farms, mushroom farm and ANL; and
- Products of fuel combustion from local road and air traffic



Figure 3 Neighbouring Emission Sources

3.0 Receiving Environment

3.1 Topography

Local topography is important in air quality studies as local atmospheric dispersion can be influenced by night-time katabatic (downhill) drainage flows from elevated terrain or channelling effects in valleys or gullies.

The elevation of the Site ranges from approximately 60 m to 70 m Australian Height Datum (AHD). As shown in **Figure 4**, there is slightly elevated terrain to the west and northeast of the Site, however no significant topographical features that would be expected to significantly affect local wind patterns etc. The locations of the Badgerys Creek automatic weather station (AWS; refer **Section 3.2.4**) and the Liverpool and Bringelly air quality monitoring stations (AQMSs; refer **Section 6.0**) are also indicated.



Figure 4 Regional Topography

3.2 Local Meteorology

Local wind speed and direction influence the dispersion of air pollutants. Wind speed determines both the distance of downwind transport and the rate of dilution as a result of 'plume' stretching. Wind direction, and the variability in wind direction, determines the general path pollutants will follow and the extent of crosswind spreading. Surface roughness (characterised by features such as the topography of the land and the presence of buildings, structures and trees) affects the degree of mechanical turbulence, which also influences the rate of dispersion of air pollutants.

The Bureau of Meteorology (BoM) maintains and publishes data from weather stations across Australia. The closest station recording wind speed and wind direction data is the Badgerys Creek AWS (Station ID 67108), located approximately 1 km northwest of the Site. Considering the relatively flat terrain between the Site and Badgerys Creek AWS, it is considered reasonable to assume that the wind conditions recorded at the Badgerys Creek AWS are representative of the wind conditions experienced at the Site.

The Badgerys Creek AWS was commissioned in 1995, sits at an elevation of 82 m and has data available for the following parameters:

- wind speed (m/s) and wind direction (degrees)
- temperature (°C)
- rainfall (mm)
- relative humidity (%).

A review of the long-term climate data collected at this station is provided in the following sections.

3.2.1 Rainfall

Rainfall statistics for Badgerys Creek AWS are summarised in **Figure 5.** The average monthly rainfall is distributed evenly throughout the year. The lowest average monthly rainfall of 33.9 mm/month was recorded during July. The highest average monthly rainfall of 112.4 mm/month occurred in March, with an average of 12.8 rain days recorded in this month.

3.2.2 Relative Humidity

Available humidity statistics (9 am and 3 pm monthly averages) for Badgerys Creek AWS are summarised in **Figure 6**. Morning humidity levels range from an average of around 62% in mid spring to around 84% in early winter. Afternoon humidity levels are lower at around 44% in late summer, and around 56% in early winter.

3.2.3 Temperature

Available temperature statistics for Badgerys Creek AWS are summarised in **Figure 7**. Mean maximum temperatures range from 17.5°C in winter to 30.2°C in summer, while mean minimum temperatures range from 4.2°C in winter to around 17.3°C in summer. Maximum temperatures above 45°C and minimum temperatures less than -5°C have been recorded.











Figure 7 Temperature Data for Badgerys Creek AWS

3.2.4 Wind Speed and Direction

Wind roses show the frequency of occurrence of winds by direction and strength. The bars correspond to the 16 compass points (degrees from North). The bar at the top of each wind rose diagram represents winds <u>blowing from</u> the north (i.e., northerly winds), and so on. The length of the bar represents the frequency of occurrence of winds from that direction, and the widths of the bar sections correspond to wind speed categories, the narrowest representing the lightest winds. Thus, it is possible to visualise how often winds of a certain direction and strength occur over a long period, either for all hours of the day, or for particular periods during the day.

Annual and seasonal wind roses for the past five years, 2018 to 2022, compiled from data recorded by the Badgerys Creek AWS are presented in **Figure 8**. The average annual wind rose (**Figure 8**) for the years 2018-2022 indicates that winds from the south-western quadrant are dominant at Badgerys Creek, with a relatively high proportion of winds also blowing from the northwest and southwest quadrants. Winds from the northwestern quadrant occur relatively infrequently. Calm wind conditions were recorded 8.6% of the time over the 5-year period reviewed.

The seasonal wind roses (Figure 8) indicate that typically:

- In spring and summer, winds are relatively evently spread from the north-northeast to southwest, with very few winds from the northwestern quadrant. On average, calm winds are experienced 9.8% of the time during spring and 7.2% of the time during summer.
- In autumn, winds predominantly blow from the southwestern quadrant, with the lowest frequency of winds from the northwest quadrant. On average, calm winds are experienced 9.4% of the time during autumn.
- In winter, winds predominantly blow from the southwest and south-southwest directions, with the lowest frequency of winds from the southeastern quadrant. On average, calm winds are experienced 7.9% of the time during winter.





Figure 8 Annual Wind Roses – Badgerys Creek AWS (2018 – 2022)

3.3 Surrounding Land Zoning and Sensitive Receptors

As shown in **Figure 9**, the immediate surroundings of the Site are zoned for Enterprise use.

There are a number of existing residential receptors located 50 m to the south, southwest, and east of the Site boundary (refer to **Figure 10**). Furthermore, there is potential for future sensitive receptors be developed within the RU4 (Primary Production Small Lots), and MU (Mixed Use) zones located to the southwest, south, and east of the Site. **Figure 10** also shows the locations of the warehouses within the Site where the potential future industries might be located. Local business areas 24 and 25 shown in **Figure 2** will be only used for retail activities.

Figure 9 Surrounding Land Uses





Figure 10 Existing and Potential Sensitive Receptors

4.0 Identified Pollutant Sources and Types

4.1 Pollutants of Concern

As identified in **Section 0**, the key air pollutants of interest for the existing and potential future emission sources identified in the area surrounding the Site are considered to be:

- Odour emissions from the existing poultry farms, mushroom farm, and the composting facility;
- Products of fuel (petrol, diesel and avgas) combustion from Western Sydney Airport; and
- Emissions of products of fuel combustion and particulate matter (from brake and tyre wear as well as re-entrainment of road dust) associated with the transport activities within the Site.

In relation to potential emissions to air from the potential future activities within the Precinct, it is not possible to know what air pollutants may be emitted until the individual developments begin the consent process. In most cases they are likely to be covered by the pollutants of concern identified above for the existing sources. However, given the uncertainty, the potential air quality impacts associated with potential future activities within the Precinct have been addressed based on a separation distance analysis approach based on the types of enterprise activities that could be expected based on the land use zoning in the Master Plan.

The following sections outline the potential health and amenity issues associated with the pollutants of concern identified above for the existing sources.

4.1.1 Particulate Matter

Airborne contaminants that can be inhaled directly into the lungs can be classified on the basis of their physical properties as gases, vapours or particulate matter. In common usage, the terms "dust" and "particulates" are often used interchangeably. The health effects of particulate matter are strongly influenced by the size of the airborne particles. Smaller particles can penetrate further into the respiratory tract, with the smallest particles having a greater impact on human health as they penetrate to the gas exchange areas of the lungs. Larger particles primarily cause nuisance associated with coarse particles settling on surfaces.

The term "particulate matter" refers to a category of airborne particles, typically less than 30 microns (μ m) in diameter and ranging down to 0.1 μ m and is termed total suspended particulate (TSP). Particulate matter with an aerodynamic diameter of 10 microns or less is referred to as PM₁₀. The PM₁₀ size fraction is sufficiently small to penetrate the large airways of the lungs, while PM_{2.5} (2.5 microns or less) particulates are generally small enough to be drawn in and deposited into the deepest portions of the lungs. Potential adverse health impacts associated with exposure to PM₁₀ and PM_{2.5} include increased mortality from cardiovascular and respiratory diseases, chronic obstructive pulmonary disease and heart disease, and reduced lung capacity in asthmatic children.

4.1.2 Products of Combustion

Emissions associated with road traffic and the combustion of fossil fuels (diesel, petrol, avgas etc.) will include carbon monoxide (CO), oxides of nitrogen (NO_x), particulate matter (PM_{10} and $PM_{2.5}$), sulfur dioxide (SO₂) and volatile organic compounds (VOCs).

CO is an odourless, colourless gas formed from the incomplete burning of fuels in motor vehicles. It can be a common pollutant at the roadside and highest concentrations are found at the kerbside with concentrations decreasing rapidly with increasing distance from the

road. CO in urban areas results almost entirely from vehicle emissions and its spatial distribution follows that of traffic flow. The incomplete combustion of fuel in diesel powered vehicles can generate particulate in the form of black soot.

Oxides of nitrogen (NO_X) is a general term used to describe any mixture of nitrogen oxides formed during combustion. In atmospheric chemistry, NO_X generally refers to the total concentration of nitric oxide (NO) and nitrogen dioxide (NO₂). NO is a colourless and odourless gas that does not significantly affect human health. However, in the presence of oxygen, NO can be oxidised to NO₂ which can have significant health effects including damage to the respiratory tract and increased susceptibility to respiratory infections and asthma. NO will be converted to NO₂ soon after leaving the engine exhaust.

Engine exhausts can also contain emissions of Sulfur dioxide (SO_2) due to impurities in the fuel. The Sulfur content in diesel fuel has significantly reduced over the years and currently ambient SO_2 concentrations in Australian cities are typically well below regulatory criteria.

4.1.3 VOCs

VOCs are organic chemicals that have a high vapour pressure at ordinary room temperature. Their high vapour pressure results from a low boiling point, which causes large numbers of molecules to evaporate or sublimate from the liquid or solid form of the compound and enter the surrounding air, a trait known as volatility. They include both human-made and naturally occurring chemical compounds.

The potential impacts of emissions of VOCs into the ambient environment include:

- human health impacts due to the toxicity of some individual VOCs.
- odour nuisance impacts due to the odorous nature of some VOCs even at very low concentrations.
- visibility and health impacts due to their contribution to the creation of photochemical smog under certain conditions.

4.1.4 Odour

Impacts from odorous air contaminants are often nuisance-related rather than health-related. Odour performance goals guide decisions on odour management but are generally not intended to achieve "no odour".

The detectability of an odour is a sensory property that refers to the theoretical minimum concentration that produces an olfactory response or sensation. This point is called the *odour threshold* and defines one odour unit (ou). An odour goal of less than 1 ou would theoretically result in no odour impact being experienced.

In practice, the character of a particular odour can only be judged by the receiver's reaction to it, and preferably only compared to another odour under similar social and regional conditions. Based on the literature available, the level at which an odour is perceived to be a nuisance can range from 2 ou to 10 ou depending on a combination of the following factors:

- **Odour quality**: whether an odour results from a pure compound or from a mixture of compounds. Pure compounds tend to have a higher threshold (lower offensiveness) than a mixture of compounds.
- **Population sensitivity**: any given population contains individuals with a range of sensitivities to odour. The larger a population, the greater the number of sensitive individuals it may contain.

- **Background level**: whether a given odour source, because of its location, is likely to contribute to a cumulative odour impact. In areas with more closely located sources it may be necessary to apply a lower threshold to prevent offensive odour.
- **Public expectation**: whether a given community is tolerant of a particular type of odour and does not find it offensive, even at relatively high concentrations. For example, background agricultural odours may not be considered offensive until a higher threshold is reached than for odours from a wastewater treatment works.
- **Source characteristics**: whether the odour is emitted from a stack (point source) or from an area (diffuse source). Generally, the components of point source emissions can be identified and treated more easily than diffuse sources. Emissions from point sources can be more easily controlled using control equipment. Point sources tend to be located in urban areas, while diffuse sources are more often located in rural locations.
- **Health Effects**: whether a particular odour is likely to be associated with adverse health effects. In general, odours from agricultural activities are less likely to present a health risk than emissions from industrial facilities.

An example for this can be shown in a theoretical case of a bakery. A person walking past the bakery may smell the bakery odours and like these baking odours (it can be shown that people generally react positively to baking odours). However, a person living next to the bakery and who experiences the baking odours throughout their house and garden on a continuous basis may find the baking odours offensive to the point where they complain to local authorities.

Other factors may also come into play when assessing odour impacts, such as:

- **Population sensitivity**: any given population contains individuals with a range of sensitivities to odour. The larger a population, the greater the number of sensitive individuals it may contain.
- **Background level**: whether a given odour source, because of its location, is likely to contribute to a cumulative odour impact. In areas with more closely located sources it may be necessary to apply a lower threshold to prevent offensive odour.
- **Public expectation**: whether a given community is tolerant of a particular type of odour and does not find it offensive, even at relatively high concentrations. For example, background agricultural odours may not be considered offensive until a higher threshold is reached than for odours from a landfill facility.

5.0 Legislation, Regulation and Guidance

The following Air Quality Policy and Guidance documents have been referenced within this assessment and have been used to identify the relevant air quality criteria (see **Section 5.4.1**).

5.1 State Environmental Planning Policy (Precincts—Western Parkland City) 2021

The Site has been identified for future employment since the release of the WPC SEPP, under which the Western Sydney Aerotropolis was rezoned (formerly known as the State Environmental Planning Policy (Western Sydney Aerotropolis) 2020). The rezoning confirms the WPC SEPP as the primary environmental planning instrument governing land use and development on the Site.

Chapter 4 of the WPC SEPP relates to the Western Sydney Aerotropolis. The aims of this section of the WPC SEPP are as follows:

- (a) to facilitate development in the Western Sydney Aerotropolis in accordance with the objectives and principles of the Western Sydney Aerotropolis Plan,
- (b) to promote sustainable, orderly and transformational development in the Western Sydney Aerotropolis,
- (c) to ensure development is compatible with the long-term growth and development of the Western Sydney Airport (including in relation to the operation of the Airport 24 hours a day) and other critical transport infrastructure,
- (d) to promote employment and world-class innovation and provide for residential development in suitable locations,
- (e) to recognise the physical and cultural connection of the local Aboriginal community to the land and to incorporate local Aboriginal knowledge, culture and tradition into development,
- (f) to preserve land for future infrastructure development,
- (g) to protect, maintain and enhance, and to minimise the impact of development on, trees and vegetation, soil quality and the health of waterways and to contribute to the conservation of biodiversity,
- (h) to recognise and protect the ecological and cultural value of Wianamatta–South Creek.

There are no air quality specific development standards or provisions identified in Chapter 4 of the WPC SEPP, however the broader environmental protection context defined in (g) above is considered relevant to this AQA.

5.2 Western Sydney Aerotropolis Development Control Plans

The Western Sydney Aerotropolis Development Control Plan – Phase 1 (Phase 1 DCP) was published on 13 September 2020 and came into effect on 1 October 2020. The Phase 1 DCP identified the precinct planning principles, objectives, and performance outcomes to allow precinct planning to progress. The Phase 1 DCP is superseded by the Phase 2 DCP.

The Western Sydney Aerotropolis Development Control Plan – Phase 2, known as Phase 2 DCP was finalised on 10 November 2022. It supports the implementation of the Precinct Plan by providing controls to guide development across the initial precincts in the Aerotropolis.

The Phase 2 DCP contains specific development controls to support healthy communities, high-quality building design, construction standards, stormwater management, vegetation and canopy cover, and heritage and environmental conservation.

The Phase 2 DCP has two accompanying documents: the *Recognise Country Guideline* and the *Aviation Safeguarding Guidelines*.

The Phase 2 DCP will identify:

- additional performance outcomes, including specific precinct outcomes;
- benchmark solutions for all performance outcomes; and
- the objectives, performance outcomes and benchmark solutions for all development and subdivision types that are envisaged within the Aerotropolis (which have not been considered under the Phase 1 DCP).

In relation to air quality, the Phase 1 DCP aims to:

- manage and mitigate the impacts of development in relation to air quality;
- protect air quality for sensitive uses, including adjoining busy roads and rail corridors; and
- for development located in or adjacent to road corridors and intersections, to incorporate site layout and building design features that address higher level of air emissions generally found in transport corridors.

In order to achieve these objectives, the following Performance Outcomes are specified by the Phase 1 DCP:

- PO1 Air emissions resulting from development, including the siting of vents and stacks, do not cause environmental harm or nuisance, and surrounding land uses are not exposed to concentrated levels of air contaminants.
- PO2 Proposed sensitive land uses are adequately separated from existing lawful land uses that produce air emissions
- PO3 Development is to be in accordance with Protection of the Environment Operations Act 1997 and other Environmental Protection Authority guidelines for air quality.

The draft Phase 2 DCP's Air Quality Objectives and Performance outcomes are in line with the Phase 1 DCP. In relation to air quality, the draft Phase 2 DCP aims to:

- a. Manage and mitigate the impacts of development in relation to air quality.
- b. To protect air quality for sensitive uses, including adjoining busy roads and rail corridors.

In order to achieve these objectives, the draft Phase 2 DCP specifies the Performance Outcomes and Benchmark Solutions presented in **Table 1**.

Performance Outcome	Benchmark Solution
Development manages and mitigates air quality impacts from development.	 Development (including construction) does not unreasonably affect the amenity and environmental quality of the locality, nearby residential premises, sensitive uses, or public spaces due to air quality impacts.
	2. Air emissions resulting from development do not cause environmental harm or nuisance, and surrounding land uses are not exposed to unacceptable levels of air pollutants.
	 Proposed sensitive land uses are adequately separated from existing lawful land uses that produce air emissions.
	 Development is to be in accordance with the Protection of the Environment Operations Act 1997 and other Environmental Protection Authority guidelines for air quality.
	 For development located in or adjacent to road corridors and intersections, incorporate site layout and building design features that address higher level of air emissions generally found in transport corridors.

Table 1 Phase 2 DCP - Performance Outcomes and Benchmark Solutions

5.3 Odour Technical Framework and Notes

The NSW EPA's Assessment and Management of Odour from Stationary Sources in NSW (Technical Framework (NSW DEC 2006a) and the associated *Technical Notes* (NSW DEC 2006b)) publications provide a policy framework for assessing and managing activities that emit odour and offer guidance on dealing with odour issues. These documents are required to be referenced when assessing any odour issue in NSW.

5.4 Approved Methods

State air quality guidelines adopted by the NSW EPA are published in the NSW EPA's *Approved Methods for Modelling and Assessment of Air Pollutants in NSW* publication (NSW EPA 2022), hereafter referred as the Approved Methods.

The Approved Methods lists the statutory methods for modelling and assessing air pollutants from stationary sources and specifies criteria that reflect the environmental outcomes adopted by NSW EPA. The Approved Methods are referred to in the *POEO (Clean Air) Regulation 2002* for assessment of impacts of air pollutants.

5.4.1 Air Quality Criteria

5.4.1.1 Particulate Matter and Combustion Gases

State air quality impact assessment criteria specified by NSW EPA for the pollutants identified in **Section 4.1** are published Approved Methods. The ground level air quality impact assessment criteria listed in Section 7 of the Approved Methods have been established by NSW EPA to achieve appropriate environmental outcomes and to minimise risks to human health. They have been derived from a range of sources and are the defining ambient air quality criteria for NSW and are considered to be appropriate for use in this assessment.

The impact assessment criteria listed in the Approved Methods for particulate matter, nuisance dust, and products of combustion are provided in **Table 2**.

Pollutont	Averaging	Ambient Air Quality Criterion			
Pollutant	Period	µg/m³	pphm		
Total suspended particulate (TSP)	Annual	90	-		
Particulate matter less than	24-Hour	50	-		
10 microns (PM ₁₀)	Annual	25	-		
Particulate matter less than	24-Hour	25	-		
2.5 microns (PM _{2.5})	Annual	8	-		
Nitrogon diavida (NO.)	1-hour	164	8		
	Annual	31	1.5		
	15-minutes	100,000	8,700		
Carbon monoxide (CO)	1-hour	30,000	2,500		
	8-hour	10,000	900		
Cultur disvide (CO)	1-hour	286ª	10		
	24-hour	57	2		
Deposited dust	Annual	2 g/m ² /month (maximum increase in deposited dust level 4 g/m ² /month (maximum total deposited dust level)			

Table 2 NSW EPA Impact Assessment Criteria for Pollutants of Concern

5.4.1.2 Odour

The equation used by the NSW EPA to determine the appropriate impact assessment criteria for complex mixtures of odorous air pollutants, as specified in the document *'Technical framework: assessment and management of odour from stationary sources in NSW* (hereafter the Odour Framework [(NSW DEC 2006a)]), is expressed as follows:

Impact assessment criterion (ou) = $(log_{10}(population)-4.5)/-0.6$

A summary of the impact assessment criteria given for various population densities, as drawn from the Odour Framework, is given in **Table 3**. A criterion of 2 odour units (ou) would be appropriate for the Site.

Table 3 NSW EPA Impact Assessment Criteria for Complex Mixtures of Odorous Air Pollutants

Population of Affected Community	Impact Assessment Criteria for Complex Mixtures of Odours (ou) (nose-response-time average, 99 th percentile)
Urban area (<u>></u> 2000)	2.0
~300	3.0
~125	4.0
~30	5.0
~10	6.0
Single residence (< 2)	7.0
Source: (NSW DEC 2006a)	

5.5 Separation Distance Guidelines

The application of minimum recommended separation distances (or 'buffer' distances) provides a valuable screening tool to judge whether a detailed assessment is required to evaluate the potential risk of conflicting land uses. Separation distances provide guidance on the appropriate level of separation between a source of emissions and sensitive land uses in order to mitigate the impacts of intended and unintended emissions on people. This approach relies on the knowledge that impacts on the environment generally decrease with increasing distance from the source of emissions. Separation distances are based on an understanding of the types of emissions associated with various industries and their potential impacts on people. These distances can vary based on the scale and size of the industry, location topography, prevailing winds and other factors.

Whilst there are no separation guidelines issued in NSW, this assessment refers to guidelines set by other regulatory agencies in Australia including:

- Separation distance guidelines for air emissions ACT Government, 2018 (ACT Government 2018);
- Recommended land use separation distances NT EPA, 2017 (NT EPA 2017);
- Recommended separation distances for industrial residual air emissions EPA Victoria, 2013 (EPA Victoria 2023);
- Evaluation distances for effective air quality and noise management EPA SA, 2016 (EPA SA 2016); and
- Recommended separation distances for industrial residual air emissions EPA WA, 2015 (EPA WA 2015).

5.5.1 Poultry Farms

As discussed in **Section 5.3**, the *Technical framework: Assessment and management of odour from stationary sources in NSW* (NSW DEC 2006a) provides a procedure for the identification of required separation distances from poultry farming activities. The Technical Notes (NSW DEC 2006b) provides a detailed method for the calculation of site-specific separation distances associated with poultry farms. The calculated separation distance depends on the number of standard broiler chicken shed units, shed design, receptor type, terrain, vegetation, and wind direction frequency.

Figure 11 shows the surrounding operating poultry farms and the separation distances of the farms encroaching upon the Site. The separation distances from the surrounding poultry farms were calculated using the related parameters (including number of sheds, shed ventilation type, receptor, terrain, vegetation, and wind frequency) obtained from the *Air Quality and Odour Study* prepared by Northstar (Northstar 2020).

5.5.2 Mushroom Farms

Table 4 shows the recommended separation distance for agricultural activities set by Australian regulatory agencies. A separation distance of 300 m is considered appropriate for the mushroom farm located to the east of the Site. **Figure 11** shows that the buffer distance for the mushroom farm slightly encroaches upon the eastern corner of the Site.

Authority	Activity Definition	Sub Class	Separation Distance (m)
ACT Government	Agricultural chemical spray drift	Open ground conditions	300
EPA Victoria	Mushroom farm	Using blended solids or compost for the production of mushrooms	case by case
	Orchards Broad-scale operations		500
	Market gardens	Broad-scale operations	300-500
FPA Western	Turf farms	Broad-scale turf production	500
Australia	Nurseries No composting		100
	Greenhouse, hot houses and mushroom farms	Commercial using manure or compost (where compost is manufactured or blended, composting separation distances apply)	200-300

Table 4 Separation Distances for Agricultural Activities



Figure 11 Surrounding Chicken and Mushroom Farms Separation Distances

5.5.3 Composting Works

Table 5, shows the recommended separation distance for composting works. Considering that windrows are covered within ANL, a separation distance of 1,000 m has been adopted for this source to be conservative. **Figure 12** shows that the buffer distance for the facility does not encroach upon the Site boundaries.

Authority	Activi	ty Definition	Separation Distance (m)		
	> 200 tonnes/yea	r	1,000		
ACT Government	>20 & < 200 tonn	es/year	300		
	<20 tonnes/year		100		
	> 200 tonnes/yea	r	1,000		
EPA South Australia	>20 & < 200 tonn	es/year	300		
	<20 tonnes/year		100		
		up to 2,000 tpa	400		
		up to 5,000 tpa	800		
	Outdoor	up to 12,000 tpa	1,300		
	Uncovered	up to 20,000 tpa	1,800		
		up to 35,000 tpa	2,500		
		above 35,000 tpa	Case by case		
		up to 2,000 tpa	400		
		up to 5,000 tpa	650		
	Outdoor	up to 12,000 tpa	1,100		
	uncovered,	up to 20,000 tpa	1,500		
	turned windrows	up to 35,000 tpa	1,900		
		up to 50,000 tpa	2,500		
		above 50,000 tpa	Case by case		
EPA Western Australia		up to 2,000 tpa	400		
		up to 5,000 tpa	550		
	Outdoor	up to 12,000 tpa	700		
	windrows with	up to 20,000 tpa	800		
	aeration	up to 35,000 tpa	900		
		up to 50,000 tpa	1,000		
		above 50,000 tpa	Case by case		
		up to 2,000 tpa	300		
		up to 5,000 tpa	350		
	Enclosed	up to 12,000 tpa	430		
	windrows with	up to 20,000 tpa	500		
	odour control	up to 35,000 tpa	550		
		up to 50,000 tpa	600		
		above 50,000 tpa	Case by case		

Table 5 Separation Distances for Waste Management Facilities



Figure 12 Surrounding Composting Works Distance

6.0 Baseline Air Quality Conditions

6.1 Data captured by NSW DPE Network

Air quality monitoring is performed by the NSW Department of Planning and Environment (DPE) at a number of monitoring stations across NSW. The closest station to the Site with data for the last five years is the Bringelly AQMS, located approximately 3 km southeast of the Site. The following air pollutants are monitored at this station:

- NO, NO₂ and NO_x
- SO₂
- PM_{2.5}
- PM₁₀.

Since CO is not monitored at the Bringelly AQMS, data recorded by the Camden AQMS, located approximately 16 km south of the Site, is referenced for the purpose of this assessment.

A summary of the monitored pollutant concentrations for the last five years (2018-2022) is presented in **Table 6** and the data are presented graphically in **Figure 13** to **Figure 18**. Values in red font indicate an exceedance of the relevant impact assessment criterion.

Year	PM	10	PM;	2.5 NO ₂		2	СО	SO ₂	
	Maximum 24-hour ^(a)	Annual	Maximum 24-hour ^(a)	Annual	Maximum 1-hour	Annual	Maximum 1-hour	Maximum 1-hour	Annual
	µg/m³	µg/m³	µg/m³	µg/m³	pphm	pphm	ppm	pphm	pphm
2018	92.9	21.2	55.6	8.0	3.6	0.6	0.7	0.9	0.04
2019	134.0	23.6	178.0	11.3	3.4	0.5	2.0	1.1	0.04
2020	241.8	18.3	78.1	8.5	3.0	0.3	2.6	2.8	0.05
2021	69.0	15.3	57.4	7.2	2.4	0.3	1.5	2.2	0.04
2022	28.7	12.1	17.8	5.1	2.2	0.3	0.5	0.9	0.03
Criterion	50	25	25	8	12	3	25	10	2

 Table 6
 Summary of Air Quality Monitoring Data - Bringelly and Camden AQMSs

Exceedances of the 24-hour average PM_{10} and $PM_{2.5}$ criterion were recorded by the Bringelly AQMS in all years except 2022. A review of the available compliance monitoring reports indicates that these exceedances were primarily due to exceptional events such as bushfires, dust storms or hazard reduction burns. Elevated PM_{10} and $PM_{2.5}$ concentrations were recorded along the east coast of Australia in late 2019 and early 2020 during a major bushfire emergency event.

Exceedances of the annual average $PM_{2.5}$ criterion were also recorded for the years 2019 and 2020; these exceedances were primarily due to the above-mentioned bush fires which impacted much of the state in late 2019 and early 2020.



Figure 13 24-Hour Average PM₁₀ Concentrations - Bringelly AQMS (2018-2022)





Figure 15 Daily Maximum 1-Hour Average NO₂ Concentrations - Bringelly AQMS (2018-2022)



Figure 16 Daily Maximum 1-Hour Average CO Concentrations - Camden AQMS (2018-2022)



Figure 17 Measured Daily Maximum 1-Hour Average SO₂ Concentrations at Bringelly AQMS (2018-2022)



Figure 18 Measured Daily Maximum 24-Hour Average SO₂ Concentrations at Bringelly AQMS (2018-2022)



6.2 Field Odour Surveys

Odour surveys were conducted by SLR in December 2022 at varying times of the day over three days to provide an in-field odour assessment of the impact of surrounding odour sources on the Site. The field odour surveys included:

- An assessment of odour levels from the surrounding sources (field odour observations in the vicinity of the sources (i.e. nearfield observations) to assess the odour levels); and
- Nine rounds of field odour observations performed across the Site to assess the odour impacts of the surrounding sources on the Site.

It is noted that an odour survey provides only a snapshot of odour at these locations at the time of survey, however, these snapshots repeated over time can provide useful information in assessing odour impact risk.

6.2.1 Field Odour Survey Methodology

Field odour observations rely on odour intensity observations made by an observer using a prescribed format for recording observed odours using the sense of smell (without any apparatus). The field odour observations methodology described in this section is a modified version of the German Standard VDI 3490 (VDI 1993) method for odour surveys. The method standardises the odour logging approach by the adoption of a scale for describing odour intensity, as detailed in the German Standard VDI 3882 (described in **Table 7**), which relates to odour measurement. This method is preferred since it also captures odour observations over time (every 10 seconds over a 10-minute period), and not just discrete single point in time observations¹.

In addition to recording the intensity observations at each observation location, the observer also notes:

- the observation location (GPS Location UTM coordinates Easting and Northing)
- the character of the odour/odours observed or the source of the odour if that can be determined/is relevant.
- wind direction and wind speed.
- a photograph of the location.

Generally, the observations are focused on the targeted odour(s). However, if other similar odours or background odours are present in significant intensities this is also noted and recorded as appropriate.

Locations for the field odour observations are selected to cover downwind locations at various distances from the targeted odour sources (to assess decline with distance). It is noted that coverage of downwind odour can be limited in situations with restrictions on land access in relation to the odour sources and wind directions at the time of the observations.

¹ Observations over a period of time provide a better record of the presence (and fluctuation) of the odour/odours observed.


Perceived Odour Strength	Intensity Rating	Interpretation
Extremely Strong	6	In normal circumstances, this should be very rare in a field situation. For an offensive type of odour, the reaction would be to immediately mitigate against further exposure until the exposure level is reduced. The odour cannot be tolerated
Very Strong	5	The odour character is clearly recognisable. For an offensive type of odour, exposure to this level is considered unpleasant/undesirable to the point that action to mitigate against further exposure is considered or taken.
Strong	4	The odour character is clearly recognisable. For an offensive type of odour, exposure to this level would be considered unpleasant/undesirable.
Distinct	3	The odour character is clearly recognisable. This is still a fact even if in a different context or situation. The odour is tolerable – even for an offensive odour.
Weak	2	A detectable weak odour stronger than very weak and less strong than distinct. Most of the time the odour is recognisable.
Very Weak	1	Odour only just detectable. Depending on the type of odour and context the odour may not always be recognisable.
Not Perceptible	0	No odour present.
Sources: VDI 3	490 (VDI 1993) and modified interpretations from (Pitt 2014)

Table 7 Odour Intensities and Interpretation Descriptions

In terms of timing and selection of day for observations, light winds in stable conditions are typically targeted for field odour observations since these conditions contribute to poor dispersion conditions resulting in higher odour intensities/concentrations. These conditions are common in early morning and late afternoons/evenings or overnight. However, days (or time of day) with wind directions towards the assessment area (or area of access) can be limited, prompting assessment in more average conditions.

The field odour surveys for the site were completed on 2 December 2022, 13 December 2022, and 16 December 2022. The log sheets for the observation locations are provided as attachments in **Appendix A**.

For presentation of the field odour observation results, as presented in **Section 6.2.2**, pie charts of the intensity observations for each observation location were plotted on an aerial image, also including wind direction at the time of the observation (red arrow), unless variable or calm at the time. This provides an overview of the observation results summarising where odour was observed as well as the level of odour and the frequency of different odour intensities observed.

6.2.2 Field Odour Survey Results

The results from the field odour surveys are plotted for the surrounding sources odour assessment in **Figure 19** and the source types are listed in **Table 8**. The survey results are as follows:

- On day 1 of the odour surveys (2 December 2022), odours from poultry farms 1, 4, and 5 as well as odours downwind the ANL composting works were observed. The wind direction was predominantly from the north-western direction and the strongest odours were observed from poultry farm 1.
- On day 2 of the odour surveys (13 December 2022), odours from poultry farms 2 and 3 and the mushroom farm to the east of the Site were observed. Winds were predominantly blowing from west and northwest directions on day 2 and the strongest odours were observed from the mushroom farm.

• On day 3 of the odour surveys (16 December 2022) odours from poultry farms 1 and 2, the mushroom farm and downwind from the ANL composting works were observed. Wind direction was predominantly from the northwestern direction and the strongest odours were observed from poultry farm 1 and downwind of the ANL composting works.

Map ID	Source Type
1	Poultry Farm 1
2	Composting Facility
3	Poultry Farm 4
4	Poultry Farm 5
5	Poultry Farm 3
6	Mushroom Farm
7	Poultry Farm 2
8	Mushroom Farm
9	Poultry Farm
10	Poultry Farm
11	Mushroom Farm
12	Composting Facility

Table 8Surrounding Odour Sources

The results from the nine rounds of odour observations across the Site are presented in **Figure 20** and the results for each round of surveys are presented in **Appendix B.** The red arrow at the bottom of the legends shows the wind direction at the time of the survey. The results are as follows:

- Rounds 1 to 3 Day 1 surveys: at the time of the surveys, weak and very weak odours were rarely detected across the northern section of the Site, mainly due to the northeasterly winds carrying odours from ANL.
- Rounds 4 to 6 Day 2 surveys: at the time of the surveys, south-easterly winds carried the odour from poultry farm 3 and the mushroom farm towards the Site, which resulted in a small number of detections of weak and very weak odours at the southwestern and northwestern corners of the Site.
- Rounds 7 to 9 Day 3 surveys: at the time of the round 7 and round 8 surveys, very weak odours were detected at the southwestern corner and along the northern boundary of the Site. Strong and very strong odours were detected approximately 2 km northeast and 1 km northwest of the site, originating from the ANL facility and surrounding poultry farms, respectively. However, due to the distance of these sources from the Site, the impact risks are not deemed significant (refer Section 7.1).



Figure 19 Odour Assessment of Surrounding Sources

Figure 20 Odour Survey Results



7.0 Impacts of Existing and Future Approved Sources of Airborne Pollutants on the Site

7.1 Poultry Farms, Mushroom Farm, and ANL

7.1.1 Assessment Methodology

A risk-based qualitative assessment approach has been adopted to assess the risk of potential odour impacts on future occupants of the Site due to the existing poultry and mushroom farms (see **Appendix C** for full methodology). A quantitative assessment in general accordance with Approved Methods could be prepared, however, the inputs into the model would be subject to a high degree of uncertainty as detailed information on the farm activities is not publicly available.

The risk-based assessment methodology takes account of a range of impact descriptors, including the following:

- Nature of Impact: does the impact result in an adverse or beneficial environment?
- **Sensitivity**: how sensitive is the receiving environment to the anticipated impacts? This may be applied to the sensitivity of the environment in a regional context or specific receptor locations.
- Magnitude: what is the anticipated scale of the impact?

The integration of sensitivity with impact magnitude is used to derive the predicted significance of that change. The risk assessment for these sources has also been informed by the separation distance review (**Section 5.5**) and field odour surveys (**Section 6.2**).

7.1.2 Risk Assessment

The assessment of the risk of odour impacts from the surrounding poultry farms and the mushroom farm on the Site, was performed as follows:

- **Nature of Impact**: does the impact result in an adverse, neutral or beneficial environment?
 - The nature of the impact (odour) is subjective depending on the character, intensity, and duration of the odour. Impacts from odorous air contaminants are often nuisance-related rather than health-related. However, odours from poultry farms and mushroom farms are generally offensive in nature and nuisance odour can significantly impact a receptor's experience of the environment they are in. On this basis it is concluded that the nature of any odour impacts will be *adverse*.
- **Receptor Sensitivity**: how sensitive is the receiving environment to the anticipated impacts?
 - The Site is zoned Enterprise (ENT), and the intended future use of the Site is for industrial uses such as warehousing and logistics. With regard to the methodology outlined in **Appendix C**, the sensitivity of the future area to the existing odour emission sources is classified as *medium*.
- Magnitude: what is the anticipated scale of the impact?
 - The odour survey observations indicate that weak and very weak odours were infrequently detected at the northern and western sections of the Site, mainly due to winds carrying odours from the ANL composting works and the mushroom farm respectively. Considering the distance between the surrounding odour sources and the recommended separation distances identified in Section 5.5 and



given the odour survey results, it is considered unlikely that the odour impacts would cause any significant adverse impacts on health and amenity within the Site and thus, the impact magnitude is concluded to be *slight* (i.e. predicted impact may be tolerated).

Given the *medium* sensitivity of the Site and the *slight* magnitude of the potential impacts from the identified odour emission sources, the potential impact significance for the Site is concluded to be of *minor* significance.

Table 9	Anticipated Significance of Impacts at the Site due to Existing Odour
	Sources

Magnitude Sensitivity		[Defined by Table C-2]					
		Substantial Moderate Slight Magnitude Magnitude Magnitu		Slight Magnitude	Negligible Magnitude		
C-1]	Very High Sensitivity	Major Significance	Major/ Intermediate Significance	Intermediate Significance	Neutral Significance		
by Table	High Sensitivity	Major/ Intermediate Significance	Intermediate Significance	Intermediate/Min or Significance	Neutral Significance		
sfined	Medium Sensitivity	Intermediate Significance	Intermediate/Min or Significance	Minor Significance	Neutral Significance		
[De	Low Sensitivity	Intermediate/Min or Significance	Minor Significance	Minor/Neutral Significance	Neutral Significance		

7.2 Western Sydney Airport

An Air Quality Impact Assessment (AQIA) was completed by Pacific Environment Limited (now ERM) in August 2016 (PEL 2016), which assessed air quality impacts associated with Western Sydney Airport operations, including aircraft exhausts, auxiliary power units (APUs), ground support equipment (such as air climate units, aircraft tugs, conveyor belts, fork lifts, tractors and cargo loaders) and an onsite wastewater treatment plant.

The future contribution of Western Sydney Airport's operations to local air pollution was estimated using the AERMOD dispersion modelling program for three separate scenarios; namely, Stage 1 development (year 2030), Long term development (year 2063) and construction impacts. In addition, the modelling also incorporated estimated emissions associated with on-road vehicles relating to 'terminal traffic' and 'external roadways. 'Terminal traffic' was defined as traffic travelling to and from the airport, whereas 'external roadways' included all roads outside the airport boundary, extending as far as the M4, M7 and the proposed M12.

The pollutants investigated in the assessment included particulate matter (as TSP, PM_{10} and $PM_{2.5}$), NO_2 , CO, SO_2 and VOCs (benzene, toluene, ethyl benzene and xylenes), as well as odour from aircraft exhaust emissions and from the wastewater treatment plant. It was concluded that:

There were no predicted exceedances of the NSW EPA criteria or NEPM AAQ standards at the residential receptors investigated for Stage 1 operations.

As a conservative approach, to assess the cumulative impacts from Western Sydney Airport operations at the Site, the short-term pollutant impacts predicted for 'Long term development' (year 2063) have been reviewed. This is based on the presumption that short



term impacts are generally more conservative than long term impacts, because of the projected increases in activity data used in the emissions estimation to reflect population growth, increasing flight numbers, etc.

The ground level concentrations of CO, SO_2 and air toxics were predicted to be significantly lower than the relevant assessment criteria for these pollutants and are not considered further. Contour plots of the predicted cumulative 24-hour average PM_{10} , 24-hour average $PM_{2.5}$ and 1-hour average NO₂ concentrations are shown in **Figure 21**, **Figure 22** and **Figure 23** respectively.

The contour plots show that the cumulative 24-hour average concentrations of PM_{10} and $PM_{2.5}$ are below the respective criteria of 50 µg/m³ and 25 µg/m³ within the Site boundary, however exceedances of the cumulative 1-hour average NO₂ criterion of 164 µg/m³ (reduced from the previous 246 µg/m³ standard noted in the PEL plot) are predicted at a number of locations, including across the entire Site.

The PEL 2016 report identified that the cumulative 1-hour average NO2 concentrations were predicted to exceed the criterion of 246 μ g/m³ at six existing residential receptors considered in that study, however the frequency of exceedance was limited to only between one and two hours per year.

A number of mitigation measures were recommended by the PEL 2016 report to mitigate NO₂ impacts from the proposed WSA operations, along with the implementation of ambient air quality monitoring in the vicinity of WSA. The implementation of such monitoring would provide scientifically robust data to demonstrate any changes in local air quality due to operations of WSA.





Source: Figure F61 of PEL 2016.



Figure 22 Predicted Maximum Cumulative 24-Hour PM_{2.5} Concentrations - WSA 2063

Source: Figure F67 of PEL 2016.



Figure 23 Predicted Maximum Cumulative 1-Hour NO₂ Concentrations - WSA 2063

Source: Figure F55 of PEL 2016. Note: 1-hour average NO₂ criterion was reduced in 2022 to 164 μ g/m³.

The Airport Plan for WSA was published by the Australian Government in December 2016 (DIRD 2016). Part 3 (Specific Developments) of the Airport Plan includes conditions and mitigation measures relating to how the development is to be undertaken and operated. The



mitigation measures relating to air quality to reduce air emissions and the potential for ground level ozone formation during WSA operations are reproduced below:

- Using ground support equipment powered by electric, hydrogen, compressed natural gas or compressed air, including belt loaders, pushback tractors, bag tugs, and cargo loaders, where appropriate.
- Providing remote ground power facilities for remote aircraft parking positions, where practicable.
- Installing co-generation or tri-generation in-lieu of traditional gas fired boilers or solar hot water systems to replace gas fired boiler.;
- Where possible, avoiding certain activities, such as training fires and maintenance (spray painting) during ozone seasons.
- Using underground fuel hydrant systems and/or vapour recovery systems for refuelling and fuel storage.
- Promoting the use of public transport to the airport for workers, passengers and other airport users.

With the implementation of these mitigation measures, it is expected that lower air quality impacts will be experienced than the levels presented above from the PEL AQIA. In addition, given that no residential uses are proposed within the Site, the sensitivity of the receptors (industrial, technology enterprises etc) to short-term elevations in NO₂ concentrations would not be considered to be high.

8.0 Impacts of Future Air Emissions from the Site on Surrounding Receptors

8.1 Vehicle Movements

8.1.1 Assessment Methodology

A qualitative risk-based assessment approach has been also adopted (see **Appendix C** for full methodology) to assess the potential for traffic-related emissions from within the Site to cause adverse off-site impacts.

To inform the risk assessment, the Tool for Roadside Air Quality (TRAQ) assessment tool developed by Roads and Maritime Services (RMS) (now TfNSW) has been used to estimate downwind pollutant concentrations due to vehicles travelling along Badgerys Creek Road.

TRAQ is a US-EPA CALINE 4 based modelling tool designed for the first-pass screening of air quality impacts associated with new or existing roads. TRAQ uses worst-case scenarios to determine whether or not a more detailed assessment is required. TRAQ is considered to provide conservative predictions of potential incremental impacts. The model has been used extensively in NSW and is currently accepted by regulatory agencies as an appropriate conservative screening-level model for predicting near field ground level pollutant concentrations from traffic. Details of the TRAQ methodology are provided in **Appendix D**.

8.1.2 Risk Assessment

Air quality issues associated with the proposed operations are expected to include trafficrelated emissions of products of combustion and particulate matter associated with vehicles accessing and idling at the Site.

The risk of operational-phase traffic-related air emissions from the Site impacting on surrounding sensitive receptors was assessed as follows:

- **Nature of Impact**: does the impact result in an adverse, neutral or beneficial environment?
 - The nature of impact (health impacts of combustion-related air pollutants) is concluded to be *adverse* to the environment.
- **Receptor Sensitivity**: how sensitive is the receiving environment to the anticipated impacts?
 - There are a number of existing residential/ recreational and industrial/commercial receptors to the southwest of the Site. In terms of the methodology in Appendix C, the sensitivity of the residential/recreational receptors to emissions from the Site should be considered *high* and the sensitivity of the industrial/commercial receptors are considered *medium*.
- Magnitude: what is the anticipated scale of the impact?
 - In order to predict off-site air quality impacts associated with the Master Plan, a first-pass screening of the potential traffic-related air quality impacts associated with the Master Plan operations was done using TRAQ and the peak traffic numbers summarised in **Table 10**.

Table 10 Operational Traffic Assumptions for Risk Assessment

Travel Period	Vehicles per Hour (vph)
AM Peak	2,524
PM Peak	3,816
Source: Traffic Impact Assessment provided by the client.	

In the absence of any additional information regarding the detailed traffic numbers accessing the Site through the Badgerys Creek Road, it has been assumed that 50% (1,908 vph) of the traffic numbers listed in **Table 10** approach the Site from the north and the remaining 50% approach the Site from the south.

The incremental results of the TRAQ modelling (provided in **Appendix D**, **Table D-3**) indicate that the predicted impact from the Master Plan is below 13% of the relevant criteria at the receptor distance for all pollutants and all averaging periods. Given that TRAQ assumes that the wind blows the pollutants from the road towards the surrounding receptors continuously over the year, the predicted concentrations at the nearest sensitive receptors are highly conservative. As discussed in **Section 3.2.4**, winds blowing from northeastern quadrant that carry pollutants from the road towards the closest sensitive receptors located to the southwest of the Site occur approximately 7% of the time during the year.

Considering the above, it is concluded that the magnitude of traffic-related off-site impacts from the Master Plan will be *negligible* at the nearest sensitive receptors.

Given the sensitivity of the potentially affected receptors and the magnitude of the potential dust impact of the operations, the potential impact significance for the surrounding residential/recreational receptors and industrial/commercial receptors are concluded to be of *neutral* significance (see **Table 11**).

Magnitude		[Defined by Table C-2]						
Sen	sitivity	Substantial Magnitude	Moderate Magnitude	Slight Magnitude	Negligible Magnitude			
e C-	Very High	Major	Major/ Intermediate	Intermediate	Neutral			
	Sensitivity	Significance	Significance	Significance	Significance			
y Tabl	High	Major/ Intermediate	Intermediate	Intermediate/Minor	Neutral			
	Sensitivity	Significance	Significance	Significance	Significance			
ined b	Medium	Intermediate	Intermediate/Minor	Minor	Neutral			
	Sensitivity	Significance	Significance	Significance	Significance			
[Def	Low	Intermediate/Minor	Minor	Minor/Neutral	Neutral			
	Sensitivity	Significance	Significance	Significance	Significance			

Table 11 A	Anticipated	Significance	of Off-Site	Impacts of	due to O	perational	Traffic
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8.2 Potential Future Industrial Activities within the Site

As discussed in **Section 3.3**, the Site is zoned as Enterprise (ENT). According to SEPP 2021 (Minister for Planning and Public Spaces 2020), the objectives of the Enterprise zone are as follows:

- To encourage employment and businesses related to professional services, high technology, aviation, logistics, food production and processing, health, education and creative industries.
- To provide a range of employment uses (including aerospace and defence industries) that are compatible with future technology and work arrangements.
- To encourage development that promotes the efficient use of resources, through waste minimisation, recycling and re-use.
- To ensure an appropriate transition from non-urban land uses and environmental conservation areas in surrounding areas to employment uses in the zone.
- To prevent development that is not compatible with or that may detract from the future commercial uses of the land.
- To provide facilities and services to meet the needs of businesses and workers.

Prohibited uses within the enterprise zone include air transport facilities, airstrips, camping grounds, caravan parks, crematoria, exhibition homes, exhibition villages, forestry, heavy industrial storage establishments, heavy industries, helipads, intensive livestock agriculture, mortuaries, open cut mining, residential accommodation, rural industries, and turf farming.

Any development not classified as prohibited may be permitted with consent.

8.2.1 Identification of Potential Future Industrial Uses and Recommended Separation Distances

The Site is located within the Badgerys Creek Precinct, which is directly adjoining the Airport to the east, and will support airport operations, the new urban centre in the Aerotropolis Core to the south and the Northern Gateway to the west.

Badgerys Creek Precinct is not suitable for air quality sensitive land uses such as residential, schools and hospitals. Defence and aerospace and technology-based industry that complements and supports the Aerotropolis Core may also locate here.

The desirable land uses within the Site, based on the Western Sydney Aerotropolis Plan (NSW State Government 2020), include defence and aerospace industries, advanced manufacturing activity, high technology industry, airport supporting development, local retail, Aerotropolis enabling industries, modernised resource recovery industries, light industrial uses and social infrastructure.

The purpose of this section is to identify those types of uses and activities (other than warehousing and distribution, commercial uses and restaurants) with the potential to discharge air emissions that could cause offence or unacceptable risk to the surrounding existing and anticipated future sensitive receptors if not appropriately designed and located.

In this section, a range of potential uses/activities are identified as potentially being established within the Site based on the desirable land uses within the Site as well as a review of the industrial use definitions and thresholds contained in a number of planning schemes. Given that heavy industries are prohibited in the ENT zone, the identified uses/activities were selected from the low impact and medium impact industries listed in the separation distance guidelines mentioned in **Section 5.5**. Further information on the approach used to identify potentially relevant low and medium impact industries is provided in **Appendix E**.



Table 12 lists the identified possible potential future light industrial activities within the Site along with the separation distances recommended by Australian authorities. The separation distance identified is the shortest distance from any part of the land to the surrounding sensitive receptors. For the purpose of this assessment, the maximum recommended separation distance has been conservatively picked for each activity.

It is noted that **Table 12** does not include activities for which emissions to air are limited vehicle emissions (these activities include but are not limited to commercial activities such as warehousing and distribution centres). Impacts from such activities are covered under **Section 8.1.** Given the Neutral Significance of impact associated with these sources, air quality is not deemed to be a constraint for locating such activities in any of the proposed warehouses.

Furthermore, the impacts from food and beverage outlets have not been assessed in this report. The primary air emissions from food and beverage outlets are odour from cooking and deep frying of food products within the kitchen area. In SLR's experience, these impacts can be effectively managed through good practice and industry standard mitigation measures (refer **Section 9.2**).

Table 12 Recommended Separation Distances for Potentially Relevant Light and Medium Impact Industries

Activity Type	Activity Details	Australian Capital Territory	Northern Territory	Victoria	South Australia	Western Australia	Maximum
Bakeries	Small day time	100	100		200	100	200
	Large nighttime					500	500
	>2,000 L/day and <5,000 L/day				500		500
Brewery	<2,000 litres/day, eg micro/boutique breweries				250		250
Coffee Roasting	>200 tonnes per year of coffee beans	250		250			250
Oil or Fat Processing			500	500		500	500
Food processing		150	500		250	350	500
Seafood processing			500	500	200	500	500
Curing or drying works				500	500	300	500
Abrasive blasting		100			100		100
Ceramic works	<200 tpa	500	300	250		500	500
Glass or glass fibre manufacturing			500	500		500	500
Plaster and plaster article manufacture			200	100		200	200
Foundries – metal melting or casting			500		500	500	500
Scrap metal recovery		500	500		500	500	500
Surface coating		100			200	200	200
Spray painting	>100 L/day paint or 10 kg/day dry powder	300	200		300		300
	<100 L/day of paint or 10 kg/day dry powder	100			100		100

Ingham Property Group 475 Badgerys Creek Road Masterplan Air Quality Assessment

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Activity Type	Activity Details	Australian Capital Territory	Northern Territory	Victoria	South Australia	Western Australia	Maximum
	Spray booth					200	200
	Work conducted in the open (no spray booth)		500			500	500
Galvanising		300	500		400	500	500
Wood processing works		100		250	500	500	500
Foam products manufacturing					500	500	500
Retreading tyres					300		300
Motor body works						200	200
Transport vehicles depot						200	200
Fibre-reinforced plastic manufacturing		300	250	250	300	500	500
Printing		500	500	500			500

To identify the allowable activities in each of the 22 warehouses within the Site, different separation buffers have been plotted around the existing and potential future sensitive receptors. Any warehouse within the Site that is encroached upon by a specific buffer is deemed not suitable for the activities with that specific separation distance.

All the relevant buffers are presented in Figure 24.



Figure 24 Recommended Separation Distances for Various Activities

Based on **Figure 24**, the list of activities and their potential future locations are provided in **Table 13**.

Activity Type	Recommended Separation Distance	Potential Locations
Abrasive blasting	100	WH2 – WH23
Plaster and plaster article manufacture		WH2 – WH21
Motor body works	200	
Transport vehicles depot		
Coffee roasting	250	WH3 – WH21
Retreading tyres	300	WH3 – WH20
Bakeries		WH6 – WH16
Oil or fat processing		WH19
Food processing		
Seafood processing		
Ceramic works		
Glass or glass fibre manufacturing		
Foundries – metal melting or casting		
Scrap metal recovery	500	
Spray painting		
Galvanising		
Wood processing works		
Foam products manufacturing		
Fibre-reinforced plastic manufacturing		
Printing		
Brewery	1,000	WH11

Table 13 Potential Future Industries and their Recommended Locations

Any of the light industrial activities listed in **Table 13** would be suitable within the Site, as long as the correlating separation distance is maintained between them and the surrounding existing and future sensitive receptors.

As previously noted, potential uses such as warehouses and distribution centres where emissions to air are limited to vehicle emissions do not need to be assessed based on the separation distances. As mentioned in **Section 8.1**, impacts from such activities are concluded to be of Neutral Significance and therefore, air quality is not deemed to be a constraint for locating such activities in any of the proposed warehouses.

SLR also understands that it possible for certain warehouses to be amalgamated in the future. Given the conservative nature of the buffer distance methodology, potential cumulative impacts associated with this is taken into account by applying the same buffer distance to the amalgamated lot. If the amalgamated warehouse falls within the buffer of an activity, the entire warehouse would not be suitable for that activity and a detailed assessment would be required.

8.2.2 Risk Assessment

A similar risk-based qualitative assessment approach adopted for the traffic-related activities at the Site in **Section 8.1.2** has been used to assess the potential impacts of potential low and medium impact industry uses that may be located within the Site (see **Appendix C** for full methodology).

Potential air quality issues associated with the industries listed in **Table 13** are expected to include odour emissions, particulate matters, products of combustion and volatile organic compounds. The risk of impacts from these potential activities on the existing and future sensitive receptors surrounding the Site, has been assessed as follows:

- **Nature of Impact**: does the impact result in an adverse, neutral or beneficial environment?
 - The nature of impact is anticipated to be *adverse* to the environment.
- **Receptor Sensitivity**: how sensitive is the receiving environment to the anticipated impacts?
 - The sensitivity of the existing and future sensitive receptors to be developed within the RU4 and MU zones is classified as *high*, and the sensitivity of the existing and future industrial/commercial receptors is classified as *medium*.
- Magnitude: what is the anticipated scale of the impact?
 - The separation distance analysis performed for the types of low impact and medium impact industries that could be established within the Site indicates that a relatively wide range of activities may be located within the warehouse footprints identified within the current Master Plan, as outlined in **Table 13**, while still complying with the highest recommended minimum separation distance at the surrounding sensitive receptors. Given that the separation distances are conservatively determined, it is concluded to be unlikely that emissions to air from these industries will cause any adverse impacts on health and amenity of the surrounding area and thus, the impact magnitude is concluded to be **negligible**.

Given the sensitivity of the Site and the *negligible* magnitude of the potential impacts from the identified future industries, the potential impact significance for the surrounding residential and industrial/commercial receptors is concluded to be of *neutral* significance(refer **Table 14**).

It is noted that the list of industries for which recommended separation distance are available in the literature, and the low and medium impact industry definitions and thresholds contained in the planning schemes reviewed, are not exhaustive. Given the intent of the Master Plan for the Site is to provide a location for advanced manufacturing and high technology industries, there may be potential uses that have not been assessed in the above analysis. In this situation, the potential off-site air quality impacts would need to be assessed on a case-by-case basis once details on the type and scale of activities proposed, and the type and rates of pollutants to be emitted, are known, as well as the level of emissions control adopted as part of the facility design.

Table 14 Anticipated Significance of Off-Site Impacts due to Future Industries to be Located within the Site

Magnitude Sensitivity		[Defined by Table C-2]						
		Substantial Moderate Slight Magnitude Magnitude Magnitude		Slight Magnitude	Negligible Magnitude			
C-1]	Very High Sensitivity	Major Significance	Major/ Intermediate Significance	Intermediate Significance	Neutral Significance			
y Table	High Sensitivity	Major/ Intermediate Significance	Intermediate Significance	Intermediate/Min or Significance	Neutral Significance			
əfined	Medium Sensitivity	Intermediate Significance	Intermediate/Min or Significance	Minor Significance	Neutral Significance			
[De	Low Sensitivity	Intermediate/Min or Significance	Minor Significance	Minor/Neutral Significance	Neutral Significance			

9.0 Recommendations

9.1 General

A number of mitigation measures may be adopted to manage potential air quality impacts within the Site and for surrounding sensitive receptors. These include:

- Minimising vehicle idling times around the Site using best management practices, including:
 - Requiring vehicle engines to be turned off when loading/unloading; when drivers are on a break, or waiting to get administrative clearances, etc.; and
 - Installation of appropriate signage at relevant locations encouraging drivers to switch off engines when not in use.
- Optimising the movement of vehicles around the Site to minimise congestion through best practice traffic design principles for the road system within the Site.
- Capture of air pollutants from relevant areas within the warehouses and buildings by a Building Code of Australia (BCA) and Australian Standard (AS1668.2-2012) "*The use of ventilation and air conditioning in building, Part 2: Ventilation design for indoor air contaminant control*" compliant extraction systems and discharge via rooftop vents.
 - Section 5 of AS 1668.2-2012 states the following:
 - **5.2.2 Exhaust locations**: As far as practicable, exhaust-air intakes used for general exhaust-air collection shall be located on the opposite sides of the enclosure from the sources of make-up air, to ensure that the effluents are effectively removed from all parts of the enclosure.
 - **5.3.2.1 General requirements**: The effluent shall be collected as it is being produced, as close as practicable to the source of generation.
 - **5.10.1 Air discharges**: Where discharges are deemed to be objectionable (i.e. nuisance related), discharges shall:
 - Be emitted vertically with discharge velocities not less than 5 m/s.
 - Be situated at least 3 m above the roof at point of discharge.
 - o Treated to reduce the concentration of contaminants where required.
 - Be emitted to the outside at velocities and in a direction that will ensure, to the extent practicable, a danger to health or a nuisance will not occur.
 - Be situated a minimum separation distance of 6 m (where the airflow rate is ≥ 1,000 L/s) from any outdoor) air intake opening, natural ventilation device or opening, and boundary to an adjacent allotment, except that where the dimensions of the allotment make this impossible, then the greatest possible distance shall apply.

9.2 Food and Beverage Outlets

According to Module 3 of the New South Wales Local Government Air Quality Toolkit (EPA NSW 2021), emissions from food outlets may be discharged from point sources (e.g., an exhaust point or stack) or fugitive sources (e.g., escaping from doors, windows or other building openings). Sources of air emissions from food outlets and their potential control and management options include:

- Cooking food products for sale to the public (e.g., boiling, braising, roasting, frying, barbecuing etc.)
 - Install fume extraction and ventilation, filtration to remove fumes and particulates, carbon adsorption or more intensive techniques to remove odours, and stack (with correct configuration) to aid proper dispersion of odours.
 - o Consider wind direction and meteorological factors.
- Storing and handling raw food materials
 - Enclose the activity.
 - Cover materials during transport.
- Preparing food (e.g., de-boning, grinding, mincing, pureeing, or cutting foodstuffs)
 - Install fume extraction and ventilation.
 - o Clean filters
- Transporting putrescible waste products off site
 - o Store wastes in closed containers away from direct sun.
 - Remove wastes promptly from premises.
 - Cover wastes during transport.
- Packaging final products
 - Install fume extraction and ventilation.

10.0 Conclusions

SLR was commissioned by Ingham Property Group to undertake an air quality assessment as supporting information for the Master Plan application for 475 Badgerys Creek Road, Bradfield.

Impacts on the Site from Surrounding Sources of Airborne Pollutants

A desktop review has been undertaken to identify existing and proposed air emission sources in the locality. The following existing and proposed sources of air pollutants were identified in the area surrounding the Site:

- Existing poultry farms in the area
- Existing mushroom farm to the east of the Site
- Australian Native Landscapes approximately 1 km to the northeast of the Site
- Proposed Western Sydney Airport.

The potential impacts of the existing and proposed emission sources on air quality at the Site have been assessed based on recommended minimum separation distances for relevant activities, field odour surveys, and publicly available air quality impact assessments. It was concluded that:

- There is potential for odour impacts across the western, northern and eastern boundaries of the Site from existing poultry farms located to the north, east and west. Three days of odour surveys were performed to provide an in-field odour assessment of the impact of surrounding odour sources on the Site. The odour survey results indicated weak/very week odour detections across the Site with rare occasions of distinct odours depending on the wind conditions.
- Given the scale of the operations within the ANL composting facility and the distance of this source to the Site, it was concluded that significant adverse impacts from this source on the Site are unlikely.
- An AQIA performed in 2016 for the proposed Western Sydney Airport operations (PEL, 2016) showed that maximum cumulative 24-hour average concentrations of PM₁₀ and PM_{2.5} are predicted to be below their respective criteria within the Site boundary however exceedances of the cumulative 1-hour average NO₂ criterion are predicted across the Site boundary. A number of mitigation options were recommended to mitigate NO₂ impacts from the proposed Western Sydney Airport operations, including provision of ambient air quality monitoring in the vicinity of Western Sydney Airport, which would provide robust data to demonstrate any changes in the air pollution levels. In addition, given that no residential uses are proposed within the Site, the sensitivity of the receptors (industrial, technology enterprises etc.) to short-term elevations in NO₂ concentrations would not be considered to be high.

Impacts of Future Air Emissions from the Site on Surrounding Receptors

To assess the potential air quality impacts from vehicular emissions associated with the Site on surrounding sensitive receptors, the Tool for Roadside Air Quality (TRAQ) assessment developed by Roads and Maritime Services (RMS) (now Transport for NSW) was used to estimate downwind pollutant concentrations due to vehicles travelling along Badgerys Creek Road. The results of the modelling indicated that all the predicted cumulative PM_{10} , NO₂ and CO concentrations are below the relevant air quality criteria at the nearest existing sensitive receptors. Based on a $PM_{2.5}/PM_{10}$ ratio of 85% for the downwind concentrations (based on emission factors from COPERT Australia), compliance with the current 24-hour average criteria for $PM_{2.5}$ is also predicted to be achieved at the nearest sensitive receptors.

However, cumulative annual average $PM_{2.5}$ is predicted to exceed the relevant criteria of 8 µg/m³ which is mainly derived by the elevated background concentration of 8 µg/m³.

Based on the results of this assessment, which is based on a conservative screening level assessment tool, SLR concludes that the traffic flows within the Site would not result in an unacceptable increase in incremental or cumulative air quality impacts at the nearest existing sensitive receptors.

Potential future industries (other than warehousing activities) that may have associated air emissions were identified based on a review of the low impact and medium impact industrial use definitions and thresholds contained in a number of planning schemes, as well as the minimum separation distances recommended by Australian regulatory authorities for a range of industrial activities. The magnitude of the potential air impacts of the identified possible future industries on the existing off-site sensitive receptors was deemed to be **negligible** as long as the recommended separation distances are maintained between them and the surrounding receptors. Given the sensitivity of the surrounding receptors and the magnitude of the potential impacts from the identified future industries, the potential impact significance for the surrounding residential and industrial/commercial receptors was concluded to be of **neutral** significance.

It is noted that the list of industries for which recommended separation distance are available in the literature, and the low and medium impact industry definitions and threshold contained in the planning schemes reviewed, are not exhaustive. Given the intent of the Master Plan for the Site to provide a location for advanced manufacturing and high technology industries, which may not be covered by the more traditional list of industries identified in the above analysis, the consideration of potential off-site air quality impacts also needs to be made on a case-by-case basis once details on the type and scale of activities proposed, and the type and rates of pollutants to be emitted, are known, as well as the level of emissions control adopted as part of the facility design.

11.0 References

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Appendix A Odour Survey Log Sheets

475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

SLR Project No.: 610.031473

18 June 2024



	e: 02-12-2022 Intensity Scale and Descripto			1	Location:	413 paugerys CK Koad		
Date:		02-12-2022	Inten	nsity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	letectable			
Start ti	me:	9:43	1	Ve	ry weak			
Site No	:	ANL1	2		Weak	_		
Locatio	n E:	150°45'43.610"	3	D	listinct			
Locatio	n S:	33°53'3.429''	4	9	Strong			
Wind s	peed:	1.94 m/s	5	Ver	'y strong			
Wind d	irection:	SWS	6	Extrer	nely strong			
Tempe	rature:	18.3	Zone:		56H	_		
Comme	ents on Obs	ervations:				-		
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						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	3		5:10	3		0	0	0%
0:20	3		5:20	2		1	16	27%
0:30	3		5:30	2		2	30	50%
0:40	2		5:40	3		3	14	23%
0:50	3		5:50	2		4	0	0%
1:00	2		6:00	3		5	0	0%
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1:20	2		6:20	3		Tot:	60	100%
1:30	2		6:30	3		Odour Intenis	ty Percentage Plot	
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1:50	2		6:50	2				
2:00	2		7:00	2				
2:10	2		7:10	2				
2:20	1		7:20	2				
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3:50	2		8:50	2				
4:00	2		9:00	1				
4:10	2		9:10	2				
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Field O	dour Inte	nsity Observati	ion Log	Sheet	Location:	475 Badgerys Ck Road		
Date:	Date: 02-12-2022 Intensity Scale and Descriptor		nd Descriptor	Photo:				
Panellis	anellist name: DE 0 Not detectable		detectable					
Start ti	me:	9:10	1	Ve	ry weak			
Site No	:	CF1	2		Weak			
Locatio	n E:	150°45'24.589''	3	D	Distinct			
Locatio	n S:	33°53'24.217"	4	5	Strong			
Wind s	peed:	2.1 m/s	5	Ver	ry strong			
Wind d	irection:	S - NW	6	Extrer	mely strong			
Tempe	rature:	16.6	Zone:		56H	1		
Comme	ents on Obs	ervations:			•	1		
Smlled	like chicker	n feathers, chicke	en poo, a	and other fa	amr activities.]		
Chicker	n farm activ	ities. No plus or :	sings of	dust				
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	3		5:10	3		0	0	0%
0:20	4		5:20	3		1	0	0%
0:30	3		5:30	3		2	13	22%
0:40	3		5:40	3		3	37	62%
0:50	3		5:50	2		4	10	17%
1:00	3		6:00	2		5	0	0%
1:10	4		6:10	2		6	0	0%
1:20	3		6:20	2		Tot:	60	100%
1:30	3		6:30	2		Odour Intenis	ty Percentage Plot	
1:40	4		6:40	2				
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5:00	3		10:00	3				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	11:00	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	L50°45'44.947''	3	D	Distinct			
Location S: 33°54'23.753" 4 Strong		Strong						
Wind speed: 4.7 m/s 5 Very strong				ry strong				
Wind d	irection:	SSE -S	6	Extrer	nely strong			
Tempe	rature:	19	Zone:		56H			
Comme	ents on Obs	ervations:						
Other s	mells deteo	ted that are not	related	to the proje	ect were grass,			
cow po	o, and euca	lyptus. The euca	lyptus, s	some sweet	smell			
(intensi	ties of 2 ma	aybe from ANL).	No plus	or sings of	dust			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	55	92%
0:20	0		5:20	0		1	4	7%
0:30	0		5:30	0		2	1	2%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
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3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		1		
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	11:22	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	L50°45'38.407''	3	C	Distinct			
Locatio	Location S: 33°54'12.083" 4 Strong		Strong					
Wind s	peed:	1.6 m/s	5	Ve	ry strong			
Wind direction: S 6 E			Extrer	mely strong				
Tempe	rature:	20.6	Zone:		56H			
Comme	ents on Obs	ervations:]		
Other s	mells deteo	cted that are not	related	to the proje	ect were grass,			
pound	water, and	sweet smell of e	ucalyptu	is. No furth	er access as			
there is	tall fence.	No plus or sings	of dust					
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	1		5:10	0		0	47	78%
0:20	1		5:20	0		1	13	22%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	1		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	1		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	1		6:40	0		_		
1:50	0		6:50	0		_		
2:00	0		7:00	0		_		
2:10	0		7:10	0				
2:20	1		7:20	0		- 4		
2:30	0		7:30	0				
2:40	1		7:40	0				
2:50	0		7:50	0		4 \		
3:00	1		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		_		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	1		-		
4:00	0		9:00	1		-		
4:10	0		9:10	1		-		
4:20	1		9:20	0		-		
4:30	0		9:30	0		-		
4:40	1		9:40	0		4		
4:50	0		9:50	0		-		
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet	Location:	475 Badgerys Ck Road		
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	11:45	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	L50°45'21.325''	3	D	listinct			
Locatio	n S:	33°54'5.348''	4	9	Strong			
Wind s	peed:	1.6 m/s	5	Ver	y strong			
Wind d	irection:	ESE	6	Extrer	nely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	servations:						
Other s	mells deteo	ted that are not	related	to the proje	ect were grass,			
cow po	o. No furth	er access as ther	e is tall f	fence. No pl	us or sings of			
dust								
ļ						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	55	92%
0:20	0		5:20	0		1	5	8%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	sty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	1				
2:00	0		7:00	1		-		
2:10	0		7:10	1				
2:20	0		7:20	0		. /		
2:30	0		7:30	1		4 /		
2:40	0		7:40	0		4 \		
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		4		
3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		-
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	1		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		1		
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet	Location:	475 Badgerys Ck Road		
Date:	Date: 02-12-2022		Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	12:10	1	Ve	ery weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	D	Distinct			
Locatio	n S:	33°54'9.320"	4	9	Strong			
Wind s	peed:	1.66 m/s	5	Ver	ry strong			
Wind d	Wind direction: ESE		6	Extrer	mely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	servations:				_		
No odo	ur detecteo	d. Very strong od	ours of	cow poo. N	o sigs of dust or			
plums s	ieen.							
					1	Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		lot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		0:50	0		-		
2:00	0		7:00	0		-		
2.10	0		7:20	0			/	
2:20	0		7.20	0				
2.30	0		7.30	0				
2:50	0		7:50	0		1 \		
3.00	0		8.00	0				
3:10	0		8:10	0		1		
3:20	0		8:20	0		1		
3:30	0		8:30	0		1		
3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:30	1	Ve	ery weak			
Site No	:	L5	2		Weak			
Locatio	n E:	L50°44'39.304''	3	0	Distinct			
Location S: 33°53'59.598" 4 Strong		Strong						
Wind s	peed:	5.5 m/s	5	Vei	ry strong			
Wind d	irection:	E- ESE	6	Extrer	mely strong			
Temperature: 21.7 Zo			Zone:		56H			
Comme	ents on Obs	ervations:						
No furt	her access (due to high grass	and un	known soil	path. There is a			
slight, a	nd very we	ak smell that wa	s not ab	le to chara	cterised, it			
might b	e a sewage	or pound water	like sme	ell. No signs	of dust or			
plums.								
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	2		5:10	1		0	34	57%
0:20	2		5:20	0		1	21	35%
0:30	1		5:30	0		2	5	8%
0:40	1		5:40	0		3	0	0%
0:50	2		5:50	0		4	0	0%
1:00	1		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	1		6:40	0				
1:50	1		6:50	1				
2:00	0		7:00	1				
2:10	1		7:10	1				
2:20	2		7:20	0		. /		
2:30	1		7:30	0				
2:40	0		7:40	1			/	
2:50	0		7:50	0				
3:00	0		8:00	0				
3:10	0		8:10	1				
3:20	0		8:20	0				
3:30	1		8:30	1				
3:40	1		8:40	0				
3:50	1		8:50	1		4		
4:00	1		9:00	0				
4:10	0		9:10	0		-		
4:20	0		9:20	0				
4:30	0		9:30	0		-		
4:40	0		9:40	1		4		
4:50	1		9:50	0				
5:00	2		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date: 02-12-2022		Inten	sity Scale a	nd Descriptor	Photo:			
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	12:44	1	Ve	ery weak			
Site No	:	L6	2		Weak			
Locatio	n E:	L50°44'50.164''	3	0	Distinct			
Locatio	n S:	33°54'26.904''	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Ve	ry strong			
Wind d	irection:	SE	6	Extre	mely strong			
Tempe	rature:	21.5	Zone:		56H			
Comme	ents on Obs	servations:						
Strong	smells of co	ow poo. Very hig	h grasse	s that do no	ot allow further			
access.	No signs of	dust or plums.						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0		. /		
2:30	0		7:30	0				
2:40	0		7:40	0			· · ·	
2:50	0		7:50	0				
3:00	0		8:00	0			\mathbf{v}	
3:10	0		8:10	0			\backslash	
3:20	0		8:20	0				
3:30	0		8:30	0				
3:40	0		8:40	0				
3:50	0		8:50	0]		
4:00	0		9:00	0]		
4:10	0		9:10	0]		
4:20	0		9:20	0				
4:30	0		9:30	0]		
4:40	0		9:40	0]		
4:50	0		9:50	0				
5:00	0		10:00	0]		

Field C	dour Inte	nsity Observati	ion Log	Sheet	Location:	475 Badgerys Ck Road		
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellist name: DE 0		Not	detectable					
Start ti	me:	14:23	1	Ve	ery weak			
Site No	:	L7	2		Weak			
Locatio	n E:	L50°43'56.163''	3	0	Distinct			
Locatio	n S:	33°54'28.488''	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Vei	ry strong			
Wind direction: ESE			6	Extrer	mely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	servations:						
Other s	mells no re	lated to the site	project	are cow po	o and grass. No			
signs of	dust or plu	ıms.						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0]		
2:10	0		7:10	0] ,		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0] /		
2:40	0		7:40	0			1	
2:50	0		7:50	0				
3:00	0		8:00	0] \	\	
3:10	0		8:10	0				
3:20	0		8:20	0				
3:30	0		8:30	0]		
3:40	0		8:40	0				
3:50	0		8:50	0				
4:00	0		9:00	0]		
4:10	0		9:10	0				
4:20	0		9:20	0]		
4:30	0		9:30	0]		
4:40	0		9:40	0]		
4:50	0		9:50	0]		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	anellist name: DE 0 Not detectable		detectable					
Start ti	me:	1:57	1	Ve	ry weak			
Site No	:	L8	2		Weak			
Locatio	n E:	L50°44'19.196''	3	C	Distinct			
Locatio	n S:	33°54'1.352"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extre	mely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	servations:]		
Strong	smells of co	ow poo No signs	s of dust	plums.				
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0] /		
2:30	0		7:30	0				
2:40	0		7:40	0			· · · · ·	
2:50	0		7:50	0				
3:00	0		8:00	0		\	\	
3:10	0		8:10	0			\backslash	
3:20	0		8:20	0				
3:30	0		8:30	0				
3:40	0		8:40	0				
3:50	0		8:50	0				
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0				
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet	Location:	475 Badgerys Ck Road				
Date: 02-12-2022		02-12-2022	2 Intensity Scale and Descriptor		Photo:					
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	1:03	1	Ve	ry weak					
Site No	:	L9	2		Weak					
Locatio	n E:	L50°44'33.144''	3	C	Distinct					
Locatio	n S:	33°54'7.513"	4	5	Strong					
Wind s	peed:	2.5 m/s	5	Ve	ry strong					
Wind d	irection:	SE -E	6	Extrer	mely strong					
Tempe	rature:	21.5	Zone:		56H]				
Comme	ents on Obs	ervations:]				
Other s	mells deteo	cted were cow po	oo and g	rass. No sig	ns of dust					
plums.										
						Summary Odd	our Intensity Observati	ons		
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	1		0	54	90%		
0:20	0		5:20	0		1	6	10%		
0:30	0		5:30	1		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
1:00	0		6:00	0		5	0	0%		
1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0						
1:50	0		6:50	0						
2:00	0		7:00	0						
2:10	0		7:10	0						
2:20	0		7:20	0						
2:30	0		7:30	0] [
2:40	0		7:40	0] [•			
2:50	0		7:50	0] \				
3:00	0		8:00	0			\			
3:10	0		8:10	0		1	\backslash			
3:20	0		8:20	0						
3:30	1		8:30	0		1				
3:40	0		8:40	0						
3:50	1		8:50	0						
4:00	1		9:00	0		1				
4:10	0		9:10	0		4				
4:20	0		9:20	0		1				
4:30	0		9:30	0		1				
4:40	0		9:40	0		4				
4:50	0		9:50	0		1				
5:00	1		10:00	0						
Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
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Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	17:22	1	Ve	ry weak	1				
Site No	:	CF4 & CF5	2		Weak					
Locatio	n E:	150°42'58.474"	3	D	Distinct					
Locatio	n S:	33°54'29.463"	4	5	Strong					
Wind s	peed:	2.5 m/s	5	Ver	ry strong					
Wind d	irection:	ESE	6	Extrer	mely strong					
Tempe	rature:	21.3	Zone:		56H]				
Comme	ents on Obs	ervations:]				
Compo	st and farm	odours. Farm 5	is a turk	ey farm, no	signs of duts or					
plums										
						Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	1		5:10	3		0	19	32%		
0:20	0		5:20	2		1	10	17%		
0:30	0		5:30	3		2	22	37%		
0:40	0		5:40	2		3	9	15%		
0:50	0		5:50	2		4	0	0%		
1:00	1		6:00	2		5	0	0%		
1:10	1		6:10	1		6	0	0%		
1:20	1		6:20	0		Tot:	60	100%		
1:30	2		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	2		6:40	0						
1:50	2		6:50	0						
2:00	2		7:00	0						
2:10	3		7:10	0						
2:20	3		7:20	0		. /				
2:30	2		7:30	0						
2:40	3		7:40	1						
2:50	2		7:50	0						
3:00	3		8:00	1		۱ ۱				
3:10	2		8:10	0		4				
3:20	1		8:20	0		-				
3:30	0		8:30	1		4				
3:40	0		8:40	0		4				
3:50	0		8:50	2		4				
4:00	1		9:00	2		4				
4:10	2		9:10	3		4				
4:20	2		9:20	2		4				
4:30	2		9:30	2		4				
4:40	3		9:40	2		4				
4:50	3		9:50	2		4				
5:00	2		10:00	2						

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:45	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'44.947"	3	C	Distinct			
Locatio	n S:	33°54'23.753	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	ESE	6	Extre	mely strong			
Tempe	rature:	20.6	Zone:		56H			
Comme	ents on Obs	ervations:						
There is	s a light sm	ell of something	unknow	n, smells lik	ke farm land			
activitie	es. No plum	s or signs of dust	t.					
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	1		0	47	78%
0:20	0		5:20	1		1	11	18%
0:30	0		5:30	0		2	2	3%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		_		
1:50	0		6:50	1		_		
2:00	0		7:00	1		_		
2:10	0		7:10	0				
2:20	0		7:20	1				
2:30	0		7:30	0				
2:40	0		7:40	0		-		
2:50	0		/:50	0		4 \		
3:00	0		8:00	0		4	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	1		8:50	0		-		
4:00	1		9:00	0		-		
4:10	1		9:10	0		-		
4:20	1		9:20	0		-		
4:30	2		9:30	0		4		
4:40	1		9:40	0		-		
4:50	2		9:50	0		4		
5:00	1		10:00	0		1		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not o	detectable					
Start ti	me:	15:02	1	Ve	ry weak					
Site No	:	L2	2	Weak						
Locatio	n E:	150°45'38.407"	3	D	Distinct					
Locatio	n S:	33°54'12.083"	4	5	Strong					
Wind s	peed:	3.05 m/s	5	Ver	ry strong					
Wind d	irection:	ESE	6	Extrer	nely strong					
Tempe	rature:	20.6	Zone:		56H					
Comme	ents on Obs	ervations:								
Smells	like grass (n	o related to the	project)	. No no sigr	ns of dust or					
plums										
						Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	0		0	59	98%		
0:20	0		5:20	0		1	1	2%		
0:30	0		5:30	0		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
1:00	0		6:00	0		5	0	0%		
1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0						
1:50	0		6:50	0]				
2:00	0		7:00	0		1				
2:10	0		7:10	0]				
2:20	0		7:20	0		1 /				
2:30	0		7:30	0		1 /				
2:40	0		7:40	0		1 [
2:50	0		7:50	0		1 \				
3:00	0		8:00	0		7 V	\ \			
3:10	0		8:10	0]				
3:20	0		8:20	0		1				
3:30	0		8:30	0		1				
3:40	0		8:40	0		1				
3:50	0		8:50	0		1				
4:00	0		9:00	0		1				
4:10	0		9:10	0]				
4:20	0		9:20	0]				
4:30	0		9:30	0		1				
4:40	1		9:40	0		1				
4:50	0		9:50	0]				
5:00	0		10:00	0		1				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	15:19	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	C	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extre	mely strong			
Tempe	rature:	21.7	Zone:		56H			
Comme	ents on Obs	servations:						
Nil, no :	signs of dus	t or plums						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	59	98%
0:20	0		5:20	0		1	1	2%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	1				
2:10	0		7:10	0		-		
2:20	0		7:20	0		4 /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		4	•	
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		- '	\setminus	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		4		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		-		
4:20	0		9:20	0		4		
4:30	0		9:30	0		-		
4:40	0		9:40	0		-		
5:00	0		10.00	0		-		
5.00	0		TO'00	0	1	1		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	15:37	1	Ve	ery weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	0	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extrer	mely strong			
Tempe	rature:	20.1	Zone:		56H			
Comme	ents on Obs	servations:						
Very st	rong smell (of cow poo. No s	igns of c	lust or plun	ns.			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0]		
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0] [· · · · ·	
2:50	0		7:50	0] \		
3:00	0		8:00	0		_ \	\	
3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:28	1	Ve	ry weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'39.304"	3	C	Distinct			
Locatio	n S:	33°53'59.598"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	E	6	Extre	mely strong			
Tempe	rature:	21.7	Zone:		56H			
Comme	ents on Obs	servations:						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	51	85%
0:20	0		5:20	0		1	7	12%
0:30	0		5:30	0		2	2	3%
0:40	0		5:40	0		3	0	0%
0:50	1		5:50	0		4	0	0%
1:00	1		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	2		6:20	0		Tot:	60	100%
1:30	0		6:30	1		Odour Intenis	ty Percentage Plot	
1:40	1		6:40	0				
1:50	2		6:50	0		7		
2:00	0		7:00	0		1		
2:10	0		7:10	0] ,	\sim	
2:20	0		7:20	0] /		
2:30	0		7:30	0] /		
2:40	0		7:40	0			,	
2:50	0		7:50	0] /		
3:00	0		8:00	0		`	\backslash	
3:10	1		8:10	0				
3:20	0		8:20	0		_		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	1		8:50	1		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	15:55	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	D	Distinct			
Locatio	n S:	33°54'26.904"	4	Ş	Strong			
Wind s	peed:	3.05 m/s	5	Ver	ry strong			
Wind d	irection:	ESE	6	Extrer	mely strong			
Tempe	rature:	21.9	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	ur, just cow	/ poo (no relared	l to the j	pronect). No	o signs of dust			
or plum	15							
					-	Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0			1 - C	
2:50	0		7:50	0				
3:00	0		8:00	0		1 V	\	
3:10	0		8:10	0				
3:20	0		8:20	0				
3:30	0		8:30	0				
3:40	0		8:40	0		1		
3:50	0		8:50	0				
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0				
5:00	0		10:00	0		1		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not o	detectable					
Start ti	me:	17:01	1	Ve	ry weak					
Site No	:	L7	2		Weak					
Locatio	n E:	150°43'56.163"	3	D	Distinct					
Locatio	n S:	33°54'28.488"	4	9	Strong					
Wind s	peed:	3.61 m/s	5	Ver	ry strong					
Wind d	irection:	ESE	6	Extrer	nely strong					
Tempe	rature:	21.2	Zone:		56H					
Comme	ents on Obs	servations:								
Very w	eak smells o	of farm (hard ro g	give a ch	haracter). Co	ow poo. No					
signs of	f dust or plu	ıms.								
		1			I	Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	0		0	50	83%		
0:20	0		5:20	0		1	9	15%		
0:30	0		5:30	0		2	1	2%		
0:40	0		5:40	0		3	0	0%		
0:50	1		5:50	0		4	0	0%		
1:00	1		6:00	0		5	0	0%		
1:10	1		6:10	0		6	0	0%		
1:20	0		6:20	0		lot:	60	100%		
1:30	1		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0		-				
1:50	0		0:50	0		-				
2:00	0		7:00	1		-				
2.10	0		7:20	0			\sim			
2:20	0		7.20	1						
2.30	0		7.30	0						
2:40	0		7:50	0		- \				
3.00	0		8.00	1		- 1				
3:10	0		8:10	2		-				
3:20	0		8:20	1		-				
3:30	0		8:30	0		-				
3:40	0		8:40	0		1				
3:50	0		8:50	0		1				
4:00	0		9:00	0		1				
4:10	0		9:10	1		1				
4:20	0		9:20	0		1				
4:30	0		9:30	0		1				
4:40	0		9:40	0		1				
4:50	0		9:50	0		1				
5:00	0		10:00	0		1				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:42	1	Ve	ry weak			
Site No	:	L8	2		Weak			
Locatio	n E:	150°44'19.196"	3	C	Distinct			
Locatio	n S:	33°54'1.352"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extre	mely strong			
Tempe	rature:	21.2	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	urs. Very st	rong smells of co	ow poo.	No signs of	dust or plums.			
		-	_			Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		lot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0		- /	/	
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
2:50	0		8.40	0		-		
4:00	0		0.00	0		-		
4.00	0		9.00	0		-		
4.10	0		9.10	0		-		
4.20	0		9.20	0		-		
4.30	0		9.30	0		-		
4.40	0		9.40	0		-		
5.00	0		10.00	0		-		
5.00	0		10:00	0	1	1		

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	17:40	1	Ve	ry weak					
Site No	:	CF4&CF5	2		Weak					
Locatio	n E:	L50°42'58.474"	3	D	listinct					
Locatio	n S:	33°54'29.463"	4	5	Strong					
Wind s	peed:	3.05 m/s	5	Ver	ry strong					
Wind d	irection:	ESE	6	Extrer	mely strong					
Tempe	rature:	21.8	Zone:		56H					
Comme	ents on Obs	ervations:	-		-					
Compo	st smell and	d chicken poo. No	o signs o	of dust or pl	ums					
						Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	1		5:10	1		0	0	0%		
0:20	2		5:20	1		1	8	13%		
0:30	1		5:30	1		2	34	57%		
0:40	2		5:40	3		3	18	30%		
0:50	1		5:50	2		4	0	0%		
1:00	2		6:00	3		5	0	0%		
1:10	2		6:10	2		6	0	0%		
1:20	2		6:20	2		Tot:	60	100%		
1:30	2		6:30	2		Odour Intenis	ty Percentage Plot			
1:40	1		6:40	3						
1:50	2		6:50	2		1				
2:00	2		7:00	3		1				
2:10	2		7:10	3] ,				
2:20	2		7:20	3		1 /				
2:30	2		7:30	2] /				
2:40	3		7:40	2] [
2:50	3		7:50	2] /				
3:00	2		8:00	2] \		/		
3:10	2		8:10	2						
3:20	3		8:20	2						
3:30	2		8:30	2						
3:40	2		8:40	3						
3:50	3		8:50	3						
4:00	3		9:00	3						
4:10	2		9:10	2		4				
4:20	2		9:20	3						
4:30	2		9:30	3						
4:40	3		9:40	3						
4:50	2		9:50	2						
5:00	1		10:00	2						

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	18:04	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'44.947"	3	D	listinct			
Locatio	n S:	33°54'23.753"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	19.1	Zone:		56H			
Comme	ents on Obs	ervations:			-			
NIL								
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	1	connent	5:10	0	connent	0	46	77%
0:20	1		5:20	0		1	14	23%
0:30	1		5:30	1		2	0	0%
0:40	0		5:40	1		3	0	0%
0:50	1		5:50	1		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	1		6:20	0		Tot:	60	100%
1:30	0		6:30	1		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	1		1		
2:00	0		7:00	0		1		
2:10	1		7:10	0] ,		
2:20	0		7:20	0] /		
2:30	0		7:30	0] /		
2:40	0		7:40	0				
2:50	0		7:50	0				
3:00	0		8:00	0			`	
3:10	0		8:10	1		_		
3:20	0		8:20	0				
3:30	0		8:30	0		_		
3:40	0		8:40	0		_		
3:50	0		8:50	0		1		
4:00	0		9:00	1		4		
4:10	1		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	18:18	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	150°45'38.407"	3	D	listinct			
Locatio	n S:	33°54'12.083"	4	S	Strong			
Wind s	peed:	3.05 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	20.7	Zone:		56H			
Comme	ents on Obs	ervations:	- 					
Nil, no :	signs of dus	t or plums						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	54	90%
0:20	0		5:20	0		1	6	10%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0]		
2:10	0		7:10	1] ,		
2:20	0		7:20	1				
2:30	0		7:30	1] /		
2:40	0		7:40	1			•	
2:50	0		7:50	0				
3:00	0		8:00	1			\	
3:10	0		8:10	0		_		
3:20	0		8:20	0		_		
3:30	0		8:30	1		_		
3:40	0		8:40	0		_		
3:50	0		8:50	0		_		
4:00	0		9:00	0		_		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	18:35	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	L50°45'21.325"	3	D	listinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	19.9	Zone:		56H			
Comments on Observations:								
Nil,no s	igns of dust	t or plums						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0.10	0	comment	5.10	0	comment	0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
2:10	0		7:10	0		1,		
2:20	0		7:20	0] /		
2:30	0		7:30	0] /		
2:40	0		7:40	0			1	
2:50	0		7:50	0				
3:00	0		8:00	0			\	
3:10	0		8:10	0		4	\backslash	
3:20	0		8:20	0		1		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	18:50	1	Ve	ry weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	D	listinct			
Locatio	n S:	33°54'9.320"	4	S	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	19.9	Zone:		56H			
Comme	ents on Obs	ervations:			•			
No sign	s of dust or	plums, only cow	/ poo no	related to	the project			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0.10	0	comment	5.10	0	comment	0	60	100%
0.20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0.30	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	tv Percentage Plot	
1:40	0		6:40	0			,	
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
2:10	0		7:10	0		1,		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0		1 /		
2:40	0		7:40	0		1 [
2:50	0		7:50	0		1 \		
3:00	0		8:00	0		1 \		
3:10	0		8:10	0		1		
3:20	0		8:20	0		1		
3:30	0		8:30	0]		
3:40	0		8:40	0]		
3:50	0		8:50	0				
4:00	0		9:00	0]		
4:10	0		9:10	0				
4:20	0		9:20	0				
4:30	0		9:30	0				
4:40	0		9:40	0				
4:50	0		9:50	0				
5:00	0		10:00	0]		

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	19:28	1	Ve	ry weak					
Site No	:	L5	2		Weak					
Locatio	n E:	L50°44'39.304"	3	D	listinct					
Locatio	n S:	33°53'59.598"	4	5	Strong					
Wind s	peed:	4.16 m/s	5	Ver	ry strong					
Wind d	irection:	SE	6	Extrer	nely strong					
Tempe	rature:	19	Zone:		56H					
Comments on Observations:										
Nil, no	signs of dus	t or plums								
						Summary Odour Intensity Observations				
Time	Time Intensity Comment			Intensity	Comment	Intensity	Number of obc	0113 0/2		
0.10	0	comment	5.10	O	comment	0	48	80%		
0.20	0		5:20	0		1	12	20%		
0:30	0		5:30	0		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
1.00	0		6:00	0		5	0	0%		
1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0						
1:50	0		6:50	0		1				
2:00	0		7:00	0		1				
2:10	0		7:10	0] ,				
2:20	0		7:20	1] /				
2:30	0		7:30	1] /				
2:40	0		7:40	0						
2:50	0		7:50	1						
3:00	0		8:00	1		\	\			
3:10	0		8:10	0		4				
3:20	0		8:20	0						
3:30	0		8:30	0		4				
3:40	0		8:40	1		4				
3:50	0		8:50	1		4				
4:00	0		9:00	1		4				
4:10	0		9:10	1		4				
4:20	0		9:20	1		4				
4:30	0		9:30	1		4				
4:40	0		9:40	0		4				
4:50	0		9:50	1		4				
5:00	0		10:00	1		1				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	19:03	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	L50°44'50.164"	3	D	listinct			
Locatio	n S:	33°54'26.904"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	19	Zone:		56H			
Comme	ents on Obs	ervations:	- 					
Nil, no	signs of dus	t or plums. Only	cow po	o which is n	ot related to			
the pro	ject							
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0		_		
2:10	0		7:10	0				
2:20	0		7:20	0		4 /		
2:30	0		7:30	0				
2:40	0		7:40	0		4	· ·	
2:50	0		7:50	0		4 \		
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3:40	0		8:40	0		_		
3:50	0		8:50	0				
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0				
4:30	0		9:30	0		1		
4:40	0		9:40	0		4		
4:50	0		9:50	0				
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	19:56	1	Ve	ry weak			
Site No	:	L7	2		Weak			
Locatio	n E:	L50°43'56.163"	3	D	listinct			
Locatio	n S:	33°54'28.488"	4	S	Strong			
Wind s	peed:	3.05 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	mely strong			
Tempe	rature:	18	Zone:		56H			
Comme	ents on Obs	ervations:	- 					
Nil, no	dodours, sig	gns of dust or plu	ıms					
						Summary Odd	ur Intensity Observati	0.05
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0.10	O	comment	5.10	nicensity	comment	Intellisity 0	54	90%
0.10	0		5:20	0		1	6	10%
0:30	0		5:30	0		2	0	0%
0.30	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	1		6:30	0		Odour Intenis	tv Percentage Plot	
1:40	1		6:40	0			,	
1:50	1		6:50	0		1		
2:00	1		7:00	0		1	\land	
2:10	1		7:10	0		1		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0		1 /		
2:40	1		7:40	0] [N	
2:50	0		7:50	0] \		
3:00	0		8:00	0			`	
3:10	0		8:10	0				
3:20	0		8:20	0				
3:30	0		8:30	0				
3:40	0		8:40	0				
3:50	0		8:50	0				
4:00	0		9:00	0		1		
4:10	0		9:10	0		4		
4:20	0		9:20	0		1		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		02-12-2022	Inter	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	7:41	1	Ve	ry weak					
Site No	:	L8	2		Weak					
Locatio	n E:	L50°44'19.196"	3	D	listinct					
Locatio	n S:	33°54'1.352"	4	5	Strong					
Wind s	peed:	3.05 m/s	5	Ver	ry strong					
Wind d	irection:	SE	6	Extrer	nely strong					
Tempe	rature:	18	Zone:		56H					
Comme	ents on Obs	ervations:								
No odo	ur, dust or :	signs of plums								
						Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	0		0	60	100%		
0:20	0		5:20	0		1	0	0%		
0:30	0		5:30	0		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
1:00	0		6:00	0		5	0	0%		
1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0						
1:50	0		6:50	0						
2:00	0		7:00	0						
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3:50	0		8:50	0		4				
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4:30	0		9:30	0		4				
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4:50	0		9:50	0		1				
5:00	0		10:00	0						

Field O	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		02-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	19:16	1	Ve	ry weak			
Site No	:	L9	2		Weak			
Locatio	n E:	L50°44'33.144"	3	D	listinct			
Locatio	n S:	33°54'7.513"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	rature:	19	Zone:		56H			
Comme	ents on Obs	ervations:	- 					
Nil. No	signs of dus	st or plums						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0		4		
2:10	0		7:10	0				
2:20	0		7:20	0		- /		
2:30	0		7:30	0		- (
2:40	0		7:40	0		-	•	
2:50	0		7:50	0		- \		
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3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		-		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	nsity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	8:55	1	Ve	ry weak			
Site No	:	GM1	2		Weak			
Locatio	n E:	150°45'59.013"	3	D	Distinct			
Locatio	n S:	33°54'29.599"	4	5	Strong			
Wind sp	peed:	1.66 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	V 6 Extremely strong					
Temper	rature:	19	Zone:		56H			
Comments on Observations:								
Smells l	ike compos	sting material, m	ushroor	ms and soil.	No dust plums.			
Very ac	tive operat	ions, which inclu	de wasł	ning sheds.				
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	3		5:10	2		0	0	0%
0:20	3		5:20	2		1	6	10%
0:30	3		5:30	2		2	13	22%
0:40	3		5:40	2		3	26	43%
0:50	3		5:50	3		4	15	25%
1:00	3		6:00	3		5	0	0%
1:10	2		6:10	3		6	0	0%
1:20	2		6:20	3		Tot:	60	100%
1:30	2		6:30	3		Odour Intenis	ty Percentage Plot	
1:40	2		6:40	3		-		
1:50	2		6:50	3				
2:00	1		7:00	4		-		
2:10	1		7:10	4				
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2:50	3		7:50	4		4 \		
3:00	3		8:00	4		-	\mathbf{V}	7
3:10	3		8:10	3		-		
3:20	3		8:20	3		-		
3:30	3		8:30	3		-		
3:40	3		8:40	4		-		
3:50	3		8:50	4		-		
4:00	3		9:00	4		-		
4:10	2		9:10	3		-		
4:20	2		9:20	4		-		
4:30	1		9:30	4		-		
4:40	1		9:40	4		4		
4:50	1		9:50	4		4		
5:00	1		10:00	4				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	9:15	1	Ve	ry weak			
Site No	:	CF31	2		Weak			
Locatio	n E:	150°45'49.560"	3	C	Distinct			
Locatio	n S:	33°54'41.575"	4	5	Strong			
Wind s	peed:	1.6 m/s	5	Ve	ry strong			
Wind d	irection:	wnw	6	Extre	mely strong			
Tempe	rature:	193	Zone:		56H			
Comme	ents on Obs	servations:						
No espe	ecific odou	r detedted or dus	st plums			Summons Odd	uu lataasitu Oksensati	
Time Intensity Comment			T :	1	C	Summary Odd	bur intensity Observati	ons
0:10	Intensity	comment	Time 5:10	Intensity	Comment	Intensity	Number of obs	70
0.10	0		5.20	1		1	30	50%
0.20	0		5.20	1		-		0%
0.30	0		5:40	1		2	0	0%
0.40	1		5:50	0			0	0%
1:00	1		6:00	1		5	0	0%
1.00	1		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	1		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0			1	
1:50	1		6:50	1		1		
2:00	0		7:00	1		1		
2:10	0		7:10	1		1		
2:20	0		7:20	1		1 /		
2:30	0		7:30	1		1 /		
2:40	0		7:40	1] [
2:50	0		7:50	0				
3:00	0		8:00	0				
3:10	0		8:10	1				
3:20	0		8:20	0				
3:30	0		8:30	1		1		
3:40	0		8:40	1		4		
3:50	0		8:50	1		4		
4:00	0		9:00	1		4		
4:10	1		9:10	0		4		
4:20	1		9:20	1		4		
4:30	1		9:30	0		4		
4:40	1		9:40	1		4		
4:50	1		9:50	0		4		
5:00	1		10:00	1		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2002	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	11:38	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'24.589"	3	D	Distinct			
Locatio	n S:	33°53'24.217"	4	9	Strong			
Wind s	peed:	5.27 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	6	Extrer	nely strong			
Tempe	rature:	23.7	Zone:		56H			
Comme	ents on Obs	servations:						
No Odo	our or plum	s detected						
						Summary Od	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
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1:50	0		6:50	0		_		
2:00	0		7:00	0		_		
2:10	0		7:10	0				
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2:40	0		7:40	0		-		
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3:20	0		8:20	0		_		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		-		
4:00	0		9:00	0		4		
4:10	0		9:10	0		-		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4:50	0		9:50	0		-		
5:00	0		T0:00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	11:54	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	150°45'38.407"	3	C	Distinct			
Locatio	n S:	33°54'12.083"	4	5	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	23.7	Zone:		56H			
Comme	ents on Obs	ervations:]		
No odo	urs or dust	plums seen.						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
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3:30	0		8:30	0		4		
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3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	11:19	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	C	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Vei	ry strong			
Wind d	irection:	N	6	Extre	mely strong			
Tempe	rature:	23.1	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	urs or dust	plums detected.						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
2:10	0		7:10	0		1		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0		1 /		
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3:00	0		8:00	0		7 V	\	
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3:40	0		8:40	0]		
3:50	0		8:50	0]		
4:00	0		9:00	0		1		
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4:20	0		9:20	0				
4:30	0		9:30	0]		
4:40	0		9:40	0]		
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5:00	0		10:00	0]		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:59	1	Ve	ery weak			
Site No	:	L4	L4		Weak			
Locatio	n E:	150°45'0.177"	3	0	Distinct			
Locatio	n N:	33°54'9.320"	4	5	Strong			
Wind s	peed:	3.5 m/s	5	Ve	ry strong			
Wind d	irection:	NW - N	6	Extrer	mely strong			
Tempe	rature:	22.1	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected.	Very st	rong odours	s of cow poo			
though								
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		L4	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0		- /	/	
2:20	0		7:20	0				
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2:00	0		9.00	0		- \		
3.00	0		8.00	0		- '	\backslash	
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3.30	0		8.30	0		-		
3.40	0		8.40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:15	1	Ve	ery weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'38.304"	3	C	Distinct			
Locatio	n S:	33°53'59.398"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	W	6	Extrer	mely strong			
Tempe	rature:	21.5	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums detected						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Iot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0		- /	/	
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
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2.50	0		7.50	0		- \		
3.00	0		8.00	0		- '		
2:20	0		8.10	0		-		
2.20	0		0.20	0		-		
3.30	0		8.30	0		-		
3.40	0		8.40	0		-		
4.00	0		9.00	0		4		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	10:44	1	Ve	ry weak					
Site No	:	L6	2		Weak					
Locatio	n E:	150°44'50.164"	3	0	Distinct					
Locatio	n S:	33°64'26.904"	4	5	Strong					
Wind s	peed:	1.94 m/s	5	Vei	ry strong					
Wind d	irection:	W	6	Extre	nely strong					
Tempe	rature:	20.1	Zone:		56H					
Comme	ents on Obs	ervations:								
No odo	urs or plum	is detected								
						Summary Odour Intensity Observations Intensity Number of obs % 0 60 100% 1 0 0% 2 0 0% 3 0 0%				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	0		0	60	100%		
0:20	0		5:20	0		1	0	0%		
0:30	0		5:30	0		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
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1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0		4				
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3:50	0		8:50	0		4				
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4:10	0		9:10	0		4				
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4:30	0		9:30	0		4				
4:40	0		9:40	0		4				
4:50	0		9:50	0		4				
5:00	0		10:00	0						

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start tii	me:	9:41	1	Ve	ry weak			
Site No	:	L7	2		Weak			
Locatio	n E:	150°43'53.163"	3	0	Distinct			
Locatio	n N:	33°54'28.488"	4	5	Strong			
Wind sp	peed:	1.94m/s	5	Vei	ry strong			
Wind d	irection:	W	6	Extre	nely strong			
Temper	rature:	20.1	Zone:		56H			
Comme	ents on Obs	ervations:						
No Odo	ours or plun	ns detected.						
L			_			Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
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1:40	0		6:50	0		-		
2:00	0		7:00	0		-		
2.00	0		7.00	0		-		
2.10	0		7:20	0			/	
2.20	0		7.20	0				
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2:50	0		7:50	0		- 1		
3:00	0		8:00	0		- 1		
3:10	0		8:10	0		-		
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3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
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4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road				
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:					
Panellis	st name:	DE	0	Not	detectable						
Start ti	me:	10:00	1	Ve	ry weak						
Site No	:	L8	2		Weak						
Locatio	n E:	150°44'19.196"	3	C	Distinct						
Locatio	n S:	33°54'1.352"	4	5	Strong						
Wind s	peed:	1.94 m/s	5	Ve	ry strong						
Wind d	irection:	W	6	Extre	mely strong						
Tempe	rature:	20.1	Zone:		56H						
Comme	ents on Obs	servations:									
No odo	ur or plums	5 detected									
						Summary Odd	ary Odour Intensity Observations nsity Number of obs % 0 60 100% 0 60 100% 0 0 0% 2 0 0% 3 0 0% 3 0 0% 3 0 0% 3 0 0% 4 0 0% 5 0 0% 5 0 0% 5 0 0% 60 100% 1 00 0% 5 0 0% 60 100% 1 00 0% 5 0 0% 5 0 100% 5 0 0% 5				
Time Intensity Comment Time Intensity Comment				Comment	Intensity	Number of obs	%				
0:10	0		5:10	0		0	60	100%			
0:20	0		5:20	0		1	0	0%			
0:30	0		5:30	0		2	0	0%			
0:40	0		5:40	0		3	0	0%			
0:50	0		5:50	0		4	0	0%			
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1:10	0		6:10	0		6	0	0%			
1:20	0		6:20	0		Tot:	60	100%			
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4:10	0		9:10	0							
4:20	0		9:20	0		1					
4:30	0		9:30	0		1					
4:40	0		9:40	0		1					
4:50	0		9:50	0		1					
5:00	0		10:00	0							

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:28	1	Ve	ry weak			
Site No	:	L9	2		Weak			
Locatio	n E:	150°44'33.144"	3	C	Distinct			
Locatio	n S:	33°54'7513"	4	S	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	W - NW	6	Extre	mely strong			
Tempe	rature:	21.5	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	ur or plums	s detected						
L						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	0		4		
2:00	0		7:00	0		4		
2:10	0		7:10	0				
2:20	0		7:20	0		- /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		- \		
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		_ `	\backslash	
3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	12:23	1	Ve	ry weak			
Site No	:	CF 1,2	2		Weak			
Locatio	n E:	150°45'25.404"	3	D	Distinct			
Locatio	n S:	33°53'23.236"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	6	Extrer	mely strong			
Tempe	rature:	24.3	Zone:		56H	1		
Comme	ents on Obs	ervations:			•	1		
Farm la	nd odours,	chicken feathers	and co	mposting				
							un latan itu Ohan ati	
Time	Intensity	Comment	Time	Intensity	Comment	Juntonsitu	Number of obs	0/15
0:10	Intensity	comment	Time 5:10	Intensity	Comment	Intensity	Number of obs	70
0:10	1		5:10	3		1	0	7%
0.20	1		5.20	2				60%
0:30	2		5:40	2		2	37	22%
0.40	1		5.40	2		3	13	52% 0%
1:00	2		5.00	2		4	0	0%
1.00	2		6:10	2		5	0	0%
1.10	2		6:20	2		Tot	60	100%
1.20	2		6.20	2		Odour Intenis	ty Percentage Plot	10070
1.30	2		6:40	2		Oubur Interns	ly Percentage Plot	
1.40	2		6:50	2		-		
2:00	2		7:00	2		-		
2:00	3		7:10	2		-		
2.10	2		7:20	2		1 /		
2:20	2		7:20	2		1 /		
2:30	2		7:40	3		1 (
2:50	3		7:50	3		1 \		
3:00	2		8:00	2		1 🗸		/
3:10	2		8:10	2		1 '		
3:20	2		8:20	3		1		
3:30	2		8:30	2		1		
3:40	2		8:40	2		1		
3:50	2		8:50	2		1		
4:00	2		9:00	3		1		
4:10	2		9:10	3		1		
4:20	2		9:20	3		1		
4:30	2		9:30	3		1		
4:40	3		9:40	3		1		
4:50	3		9:50	3		1		
5:00	3		10:00	3		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	nsity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	12:48	1	Ve	ery weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'24.589"	3	C	Distinct			
Locatio	n S:	33°53'24.217"	4	S	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	WNW	6	Extrer	mely strong			
Tempe	rature:	25	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected.	There is	s a very wea	ak smell of			
eucalyp	otus around	which is very co	nfusing	and I cant t	ellif could come			
from Al	NL							
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		lot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		0:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0			/	
2.20	0		7.20	0				
2:30	0		7:30	0				
2:40	0		7:50	0		1 \		
2:00	0		8.00	0				
3.00	0		8.10	0		-		
3:20	0		8:20	0		1		
3:30	0		8:30	0		1		
3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:04	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	150°45'38.407"	3	C	Distinct			
Locatio	n S:	33°54'12.083"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	25.7	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or plum	is observed						
						Summary Ode	our Intensity Observati	ons
Time Intensity Comment Time Intensity Comment				Comment	Intensity	Number of obs	%	
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0		_		
2:10	0		7:10	0				
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		-		
4:10	0		9:10	0		-		
4.20	0		9.20	0		-		
4.30	0		9.40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:18	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	C	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extrer	mely strong			
Tempe	rature:	25.7	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	urs or plum	is of dust observ	ed					
						Summary Odd	our Intensity Observati	ons
Time Intensity Comment Time Intensity Comment				Comment	Intensity	Number of obs	%	
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0]		
2:00	0		7:00	0]		
2:10	0		7:10	0] ,		
2:20	0		7:20	0				
2:30	0		7:30	0] [
2:40	0		7:40	0			· · · ·	
2:50	0		7:50	0		1 \		
3:00	0		8:00	0		\	\backslash	
3:10	0		8:10	0		4		
3:20	0		8:20	0		1		
3:30	0		8:30	0		4		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:32	1	Ve	ry weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	C	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Vei	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	26.3	Zone:		56H			
Comme	ents on Obs	servations:]		
No odo	urs or dust	plums detected						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0]		
2:00	0		7:00	0		1		
2:10	0		7:10	0] .		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0] /		
2:40	0		7:40	0			I.	
2:50	0		7:50	0				
3:00	0		8:00	0			\langle	
3:10	0		8:10	0				
3:20	0		8:20	0				
3:30	0		8:30	0		1		
3:40	0		8:40	0				
3:50	0		8:50	0				
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:17	1	Ve	ry weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'38.304"	3	C	Distinct			
Locatio	n S:	33°53'59.398"	4	5	Strong			
Wind s	peed:	3.16 m/s	5	Vei	ry strong			
Wind d	irection:	WNW	6	Extrer	nely strong			
Tempe	rature:	26.4	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums observed,	, howev	er there is a	pound smell			
which r	which migh be com,ing from the site water for cows?), no related to							
the sco	pe of the jo	b						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		_		
1:50	0		6:50	0		_		
2:00	0		7:00	0		_		
2:10	0		7:10	0				
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		-		
4:10	0		9:10	0		-		
4:20	0		9:20	0		-		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4:50	0		9:50	0		4		
5:00	0		10:00	0	1	1		
Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
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Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	13:46	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	D	Distinct			
Locatio	n N:	33°54'26.904"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	6	Extrer	mely strong			
Tempe	rature:	26.3	Zone:		56H			
Comme	ents on Obs	servations:]		
Other t	han some c	ow and grass od	ours cor	ning from t	he site, there			
were no	ot odours o	r dust plums det	ected					
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0		4 /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		-		
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		\	\	
3:10	0		8:10	0		_		
3:20	0		8:20	0		_		
3:30	0		8:30	0		_		
3:40	0		8:40	0		_		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		1		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	14:51	1	Ve	ry weak			
Site No	:	L7	2		Weak			
Locatio	n E:	150°43'56.163"	3	D	Distinct			
Locatio	n S:	33°54'28.488"	4	5	Strong			
Wind s	peed:	4.72 m/s	5	Ver	ry strong			
Wind d	irection:	NW	6	Extrer	mely strong			
Temper	rature:	26.2	Zone:		56H			
Comme	ents on Obs	ervations:						
Some v	ery weak o	dours from farm	in front	of location	7. Odour			
intensit	y of 1 from	farm land from	the nort	thwest of lo	cation 7			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	1		0	49	82%
0:20	0		5:20	0		1	11	18%
0:30	0		5:30	1		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	1		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	1		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	0		4		
2:00	0		7:00	0		4		
2:10	0		7:10	0		-		
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		-		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		4		
3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		-
3:40	1		8:40	0		4		
3:50	1		8:50	0		4		
4:00	1		9:00	0		4		
4:10	0		9:10	0		-		
4:20	1		9:20	0		4		
4:30	0		9:30	0		4		
4:40	1		9:40	1		4		
4:50	0		9:50	1		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:31	1	Ve	ry weak			
Site No	:	L8	2		Weak			
Locatio	n E:	150°44'19.196"	3	C	Distinct			
Locatio	n S:	33°54'1.332"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Ve	ry strong			
Wind d	irection:	WSW - NW	6	Extre	mely strong			
Tempe	rature:	26.4	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	urs r dust p	lums observed						
	-				1	Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		4		
2:00	0		7:00	0		-		
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:00	1	Ve	ry weak			
Site No	:	L9	2		Weak			
Locatio	n E:	150°44'33.144"	3	C	Distinct			
Locatio	n S:	33°54'7.513"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	26.3	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected						
		- ·				Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		iot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2.50	0		7.50	0		- \		
3.00	0		0.00	0		- '		
2:20	0		8.10	0		-		
2.20	0		0.20	0		-		
3.30	0		8.30	0		-		
3.50	0		8.50	0		-		
4.00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	15:16	1	Ve	ry weak			
Site No	:	GM1	2		Weak			
Locatio	n E:	150°45'58.256"	3	D	Distinct			
Locatio	n S:	33°54'31.587"	4	5	Strong			
Wind s	peed:	5.55 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	6	Extrer	mely strong			
Tempe	rature:	26.7	Zone:		56H			
Comme	ents on Obs	ervations:]		
Smells l	ike mushro	oms and compo	st, less a	vtivities ob	served on site			
and the	refore less	er intensities						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	1		5:10	2		0	0	0%
0:20	1		5:20	2		1	23	38%
0:30	1		5:30	2		2	30	50%
0:40	2		5:40	2		3	7	12%
0:50	2		5:50	2		4	0	0%
1:00	1		6:00	2		5	0	0%
1:10	2		6:10	1		6	0	0%
1:20	2		6:20	1		Tot:	60	100%
1:30	2		6:30	1		Odour Intenis	ty Percentage Plot	
1:40	2		6:40	1		_		
1:50	2		6:50	1		1		
2:00	3		7:00	1		_		
2:10	3		7:10	1		- /		
2:20	3		7:20	1		- /		
2:30	3		7:30	1				
2:40	2		7:40	2		- \		
2:50	2		7:50	1		- \		
3:00	2		8:00	2		_ `		
3:10	2		8:10	2		-		
3:20	2		8:20	2		-		
3:30	2		8:30	2		-		
3:40	2		8:40	1		-		
3:50	2		8:50	1		-		
4:00	2		9:00	1		-		
4:10	2		9:10	1		-		
4:20	3		9:20	1		-		
4:30	2		9:30	1		-		
4:40	3		9:40	1		4		
4:50	3		9:50	1		-		
5:00	2		10:00	1		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		31-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	16:00	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'24.589"	3	D	Distinct			
Locatio	n S:	33°53'24.217"	4	9	Strong			
Wind s	peed:	8.33 m/s	5	Ver	ry strong			
Wind d	irection:	WNW	6	Extrer	nely strong			
Tempe	rature:	22.5	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums observed						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0		4		
2:10	0		7:10	0		-		
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		-		
4:00	0		9:00	0		-		
4:10	0		9:10	0		-		
4:20	0		9:20	0		-		
4:30	0		9:30	0		-		
4:40	0		9:40	0		-		
5:00	0		10.00	0		-		
5.00	0		10.00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:15	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	150°45'38.407"	3	C	Distinct			
Locatio	n S:	33°54'12.083"	4	5	Strong			
Wind s	peed:	8.33 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	22.5	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or plum	is observed						
					1	Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		0:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:20	0			/	
2.20	0		7:20	0				
2.30	0		7:40	0				
2:50	0		7:50	0		- 1		
3.00	0		8:00	0		- 1		
3:10	0		8:10	0		-		
3:20	0		8:20	0		1		
3:30	0		8:30	0		1		
3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0]		
4:50	0		9:50	0]		
5:00	0		10:00	0]		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	6:29	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	C	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	3.16 m/s	5	Ve	ry strong			
Wind d	irection:	W	6	Extre	mely strong			
Tempe	rature:	26.7	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or plum	is observed						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0		4 /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		- (· ·	
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		4		
4:00	0		9:00	0		-		
4:10	0		9:10	0		-		
4:20	0		9:20	0		-		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4.50	0		3.30	0		-		
5.00	0		10.00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:44	1	Ve	ry weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'01.77"	3	0	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	W	6	Extre	nely strong			
Tempe	rature:	26.7	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or plum	is observed						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0		4		
2:10	0		7:10	0		4		
2:20	0		7:20	0		4 /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		- \	'	
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		- '	\setminus	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		-		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	17:24	1	Ve	ry weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'38.304"	3	C	Distinct			
Locatio	n S:	33°53'59.398"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extre	mely strong			
Tempe	rature:	26.7	Zone:		56H			
Comme	ents on Obs	ervations:						
Slightly	smell sort	of pound like, no	t sure a	bout the ch	aracter, and it			
might b	e coming f	rom location 7						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	1		5:10	1		0	35	58%
0:20	1		5:20	0		1	25	42%
0:30	0		5:30	1		2	0	0%
0:40	1		5:40	0		3	0	0%
0:50	1		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	1		6:10	1		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	1		-		
1:50	1		6:50	0		4		
2:00	0		7:00	1		_		
2:10	0		7:10	1				
2:20	0		7:20	1		- /		
2:30	0		7:30	1				
2:40	0		7:40	1		-		
2:50	0		7:50	0		- \		
3:00	1		8:00	0		4		
3:10	1		8:10	0		4		
3:20	1		8:20	0		4		
3:30	1		8:30	0		4		
3:40	1		8:40	0		4		
3:50	1		8:50	0		4		
4:00	1		9:00	1		4		
4:10	1		9:10	0		-		
4:20	1		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:57	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	0	Distinct			
Locatio	n S:	33°54'26.904"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Ve	ry strong			
Wind d	irection:	WNW	6	Extre	nely strong			
Tempe	rature:	26.7	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or plum	ns observed						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		1		
2:00	0		7:00	0		4		
2:10	0		7:10	0		4		
2:20	0		7:20	0		4 /		
2:30	0		7:30	0		4 /		
2:40	0		7:40	0		- \	'	
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		-		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4:50	0		9:50	0		-		
5:00	0		10:00	0	1	1		

dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
	13-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
st name:	DE	0	Not	detectable			
ne:	15:40	1	Ve	ry weak			
:	L7	2		Weak			
n E:	150°43'56.163"	3	C	Distinct			
n S:	33°54'28.488"	4	5	Strong			
peed:	2.5 m/s	5	Vei	ry strong			
irection:	WNW	6	Extre	mely strong			
rature:	26.1	Zone:		56H			
ents on Obs	ervations:				1		
/eak and ve	ry weak smells o	f farm l	and and gas	ilike odours	1		
from farm	6		-				
	-						
					Summary Odd	our Intensity Observati	ons
Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
1	Farm 6	5:10	0		0	9	15%
1	Farm 6	5:20	1	Farm 6	1	39	65%
1	Farm 6	5:30	0		2	12	20%
2	Farm 6	5:40	1	Farm 6	3	0	0%
1	Farm 6	5:50	0		4	0	0%
1	Farm 6	6:00	1	Farm 6	5	0	0%
1	Farm 6	6:10	1	Farm 6	6	0	0%
1	Farm 6	6:20	1	Farm 6	Tot:	60	100%
1	Farm 6	6:30	1	Farm 6	Odour Intenis	ty Percentage Plot	
2	Farm 6	6:40	1	Farm 6		, ,	
1	Farm 6	6:50	1	Farm 6	1		
1	Farm 6	7:00	1	Farm 6	1		
1	Farm 6	7:10	0		1		
2	Farm 6	7:20	1	Farm 6	1 🖌		
1	Farm 6	7:30	1	Farm 6	1 /		
1	Farm 6	7:40	1	Farm 6	1 🚺		
1	Farm 6	7:50	0		1 🔰		
1	Farm 6	8:00	1	Farm 6	1 🐧		
1	Farm 6	8:10	1	Farm 6	1		
1	Farm 6	8:20	2		1		
1	Farm 6	8:30	2		1		
0		8:40	2		1		
1	Farm 6	8:50	2		1		
0		9:00	2		1		
1	Farm 6	9:10	2		1		
0		9:20	1	Farm 6	1		
1	Farm 6	9:30	2		1		
0		9:40	2		1		
1	Farm 6	9:50	1	Farm 6	1		
	dour Inter dour Inter t name: ne: n S: peed: rection: ature: nts on Obs reak and ve from farm Intensity 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1 1	dour Intersity Observati 13-12-2022 t name: DE ne: 15:40 ne: 15:40 n E: 150°43'56.163" n S: 33°54'28.488" peed: 2.5 m/s rection: WNW ature: 26.1 nts on Observations: reak and very weak smells of from farm 6 1 Farm 6<	dour Intensity Observation Log 13-12-2022 Inter t name: DE 0 ne: 15:40 1 I L7 2 n E: 150°43'56.163" 3 n S: 33°54'28.488" 4 peed: 2.5 m/s 5 irection: WNW 6 ature: 26.1 Zone: nts on Observations: reak and very weak smells of farm I from farm 6 5:10 1 from farm 6 5:20 1 fram 6 5:20 1 Farm 6 lntensity Comment Time fram 6 5:20 1 Farm 6 l Farm 6 5:30 2 2 Farm 6 6:00 1 Farm 6 6:20 1 f Farm 6 6:20 1 Farm 6 6:20 1 Farm 6 7:20 1 Farm 6 7:20 <td>dour Intensity Observation Log Sheet 13-12-2022 Intensity Scale at name: DE 0 Not of the second secon</td> <td>dour Intensity Observation Log Sheet 13-12-2022 Intensity Scale and Descriptor t name: DE 0 Not detectable ne: 15:40 1 Very weak Intensity Scale and Descriptor Intensity Comment Intensity Comment</td> <td>dour Intensity Observation Log Sheet Location: 13-12-2022 Intensity Scale and Descriptor Photo: name: DE 0 Not detectable ne: 15:40 1 Very weak nE: 50°43'56.163" 3 Distinct nS: 33°54'28.488" 4 Strong veci 2.5 m/s 5 Very strong rection: W/WW 6 Extremely strong rection: W/WW 6 Extremely strong rettion: W/WW 6 Extremely strong rettion: W/WW 6 Extremely strong rettion: Time Intensity Comment reak and very weak smells of farm land and gas like odours for 0 from farm 6 5:10 0 0 0 1 Farm 6 5:20 1 Farm 6 3 1 Farm 6 5:40 1 Farm 6 5 1 Farm 6 5:40 1</td> <td>January Construction Location: 475 Badgerys Ck Road Intensity Scale and Descriptor Photo: Photo: Intensity Scale and Descriptor Intensity Scale and Descriptor Photo: Intensity Scale and Descriptor Sumary Scale and Descriptor Photo: Intensity Scale and Descriptor Sumary Scale and Descriptor Photo: Intensity Scale and Descriptor Strenelly strong Strenelly strong ature: 2.5.1/Zone: SGH Strenelly strong Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Farm 6 5:30 O 2</td>	dour Intensity Observation Log Sheet 13-12-2022 Intensity Scale at name: DE 0 Not of the second secon	dour Intensity Observation Log Sheet 13-12-2022 Intensity Scale and Descriptor t name: DE 0 Not detectable ne: 15:40 1 Very weak Intensity Scale and Descriptor Intensity Comment Intensity Comment	dour Intensity Observation Log Sheet Location: 13-12-2022 Intensity Scale and Descriptor Photo: name: DE 0 Not detectable ne: 15:40 1 Very weak nE: 50°43'56.163" 3 Distinct nS: 33°54'28.488" 4 Strong veci 2.5 m/s 5 Very strong rection: W/WW 6 Extremely strong rection: W/WW 6 Extremely strong rettion: W/WW 6 Extremely strong rettion: W/WW 6 Extremely strong rettion: Time Intensity Comment reak and very weak smells of farm land and gas like odours for 0 from farm 6 5:10 0 0 0 1 Farm 6 5:20 1 Farm 6 3 1 Farm 6 5:40 1 Farm 6 5 1 Farm 6 5:40 1	January Construction Location: 475 Badgerys Ck Road Intensity Scale and Descriptor Photo: Photo: Intensity Scale and Descriptor Intensity Scale and Descriptor Photo: Intensity Scale and Descriptor Sumary Scale and Descriptor Photo: Intensity Scale and Descriptor Sumary Scale and Descriptor Photo: Intensity Scale and Descriptor Strenelly strong Strenelly strong ature: 2.5.1/Zone: SGH Strenelly strong Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Comment Time Intensity Comment Intensity Number of obs Intensity Farm 6 5:30 O 2

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	15:38	1	Ve	ry weak			
Site No	:	L8	2		Weak			
Locatio	n E:	150°44'19.196"	3	C	Distinct			
Locatio	n S:	33°54'1.352"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	NNW	6	Extre	mely strong			
Tempe	rature:	26.1	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	0		4		
2:00	0		7:00	0		-		
2:10	0		7:10	0			/	
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
3:00	0		8.00	0		- 1		
3.00	0		8.00	0		- '		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0]		
4:50	0		9:50	0]		
5:00	0		10:00	0]		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road				
Date:		13-12-2022	Inten	sity Scale a	nd Descriptor	Photo:					
Panellis	st name:	DE	0	Not	detectable						
Start ti	me:	17:11	1	Ve	ry weak						
Site No	:	L9	2		Weak						
Locatio	n E:	150°44'33.144"	3	C	Distinct						
Locatio	n S:	33°54'7.513"	4	5	Strong						
Wind s	peed:	3.61 m/s	5	Vei	ry strong						
Wind d	irection:	WNW	6	Extre	mely strong						
Tempe	rature:	26.7	Zone:		56H						
Comme	ents on Obs	servations:									
No odo	urs or dust	plums detected									
						Summary Odour Intensity Observations Intensity Number of obs % 0 60 100% 1 0 0%					
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%			
0:10	0		5:10	0		0	60	100%			
0:20	0		5:20	0		1	0	0%			
0:30	0		5:30	0		2	0	0%			
0:40	0		5:40	0		3	0	0%			
0:50	0		5:50	0		4	0	0%			
1:00	0		6:00	0		5	0	0%			
1:10	0		6:10	0		6	0	0%			
1:20	0		6:20	0		Tot:	60	100%			
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot				
1:40	0		6:40	0							
1:50	0		6:50	0							
2:00	0		7:00	0		4					
2:10	0		7:10	0		-					
2:20	0		7:20	0		- /					
2:30	0		7:30	0							
2:40	0		7:40	0		- \					
2:50	0		7:50	0		- \					
3:00	0		8:00	0		- '	\backslash				
3:10	0		8:10	0		-					
3:20	0		8:20	0		-					
3:30	0		8:30	0		-					
3:40	0		8:40	0		-					
3:50	0		8:50	0		-					
4:00	0		9:00	0		-					
4.10	0		9.10	0		-					
4.20	0		9.20	0		-					
4.30	0		9.40	0		1					
4:50	0		9:50	0		1					
5:00	0		10:00	0		1					

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road				
Date:		16-12-2022	Inter	nsity Scale a	nd Descriptor	Photo:					
Panellis	st name:	DE	0	Not o	detectable						
Start ti	me:	9:28	1	Ve	ry weak						
Site No	:	CF1	2		Weak						
Locatio	n E:	150°45'27"	3	D	Distinct						
Locatio	n S:	33°53'9"	4	9	Strong						
Wind s	peed:	3.6 m/s	5	Ver	ry strong						
Wind d	irection:	SW	N 6 Extremely strong								
Tempe	rature:	15.2	Zone:		56H						
Comme	ents on Obs	ervations:									
Chicker	n farm 1, na	med Joe Ducks a	nd Chic	kens. It sme							
feather	s, chicken p	ooo and chicken f	food								
	-				1	Summary Odd	mary Odour Intensity Observations tensity Number of obs %				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%			
0:10	3		5:10	2		0	0	0%			
0:20	3		5:20	2		1	0	0%			
0:30	3		5:30	2		2	19	32%			
0:40	3		5:40	2		3	38	63%			
0:50	3		5:50	3		4	3	5%			
1:00	4		6:00	2		5	0	0%			
1:10	3		6:10	3		6	0	0%			
1:20	3		6:20	3		Iot:	00	100%			
1:30	4		6:30	3		Odour Intenis	ty Percentage Plot				
1:40	3		6:50	3		-					
2:00	4		7:00	2		-					
2.00	2		7.00	2		-					
2.10	3		7:20	2		- /					
2.20	2		7.20	2		+ /					
2:30	3		7:40	3							
2:50	3		7:50	2		1 \					
3:00	3		8:00	2		1 \					
3:10	3		8:10	3		1 '					
3:20	3		8:20	2							
3:30	3		8:30	2							
3:40	3		8:40	2		1					
3:50	3		8:50	2		1					
4:00	3		9:00	2		1					
4:10	3		9:10	3		1					
4:20	3		9:20	3		1					
4:30	3		9:30	3		1					
4:40	3		9:40	3		1					
4:50	2		9:50	3]					
5:00	2		10:00	3]					

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	9:42	1	Ve	ry weak			
Site No	:	CF2	2		Weak			
Locatio	n E:	150°45'26.793"	3	D	Distinct			
Locatio	n S:	33°53'16.387"	4	5	Strong			
Wind s	peed:	3.61 m/s	5	Ver	ry strong			
Wind d	irection:	SW	6	Extrer	mely strong			
Tempe	rature:	16	Zone:		56H]		
Comme	ents on Obs	ervations:]		
Smells I	ike farm la	nd, chicken food,	, and fea	athers				
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	2		5:10	2		0	0	0%
0:20	2		5:20	2		1	7	12%
0:30	2		5:30	2		2	38	63%
0:40	2		5:40	2		3	15	25%
0:50	2		5:50	2		4	0	0%
1:00	2		6:00	2		5	0	0%
1:10	3		6:10	3		6	0	0%
1:20	2		6:20	2		Tot:	60	100%
1:30	2		6:30	3		Odour Intenis	ty Percentage Plot	
1:40	2		6:40	2				
1:50	3		6:50	2				
2:00	3		7:00	2]		
2:10	3		7:10	2]		
2:20	3		7:20	2				
2:30	3		7:30	2] /		
2:40	3		7:40	2				
2:50	3		7:50	1				
3:00	3		8:00	1] \	`	/
3:10	3		8:10	1				
3:20	3		8:20	1				
3:30	2		8:30	1				
3:40	2		8:40	1				
3:50	2		8:50	2				
4:00	3		9:00	2		1		
4:10	2		9:10	2		1		
4:20	2		9:20	2				
4:30	2		9:30	1		1		
4:40	2		9:40	2		1		
4:50	3		9:50	2				
5:00	2		10:00	2				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:09	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'44.947"	3	C	Distinct			
Locatio	n S:	33°54'23.753"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Vei	ry strong			
Wind d	irection:	SW	6	Extrer	nely strong			
Tempe	rature:	15.8	Zone:		56H			
Comme	ents on Obs	servations:						
No Odo	ours or dust	plums detected.	Althou	gh, there is	a sort of pine			
and euo	alytus sme	lls around (hard	to chara	acterise) or	identify source			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	0		4		
2:00	0		7:00	0		-		
2:10	0		7:10	0				
2:20	0		7:20	0		4 /		
2:30	0		7:30	0				
2:40	0		7:40	0		4 1		
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		- '		
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:22	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	L50°45'38.407"	3	D	Distinct			
Locatio	n S:	33°54'12.083"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Ver	ry strong			
Wind d	irection:	SW	6	Extrer	mely strong			
Tempe	rature:	15.8	Zone:		56H			
Comme	ents on Obs	ervations:				1		
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		4		
1:50	0		6:50	0		4		
2:00	0		7:00	0		-		
2:10	0		7:10	0				
2:20	0		7:20	0		- /		
2:30	0		7:30	0		- (
2:40	0		7:40	0		- \		
2:50	0		7:50	0		- \		
3:00	0		8:00	0		- '	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
2:40	0		8:30	0		-		
2:50	0		8.40	0		-		
4.00	0		9.00	0		-		
4.00	0		9.00	0		-		
4.10	0		9.20	0		1		
4.20	0		9.20	0		-		
4.50	0		9.40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:35	1	Ve	ery weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	0	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	SSW	6	Extrer	mely strong			
Tempe	rature:	17.1	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected				Summary Od	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	sty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0				
2:10	0		7:10	0				
2:20	0		7:20	0		1 /		
2:30	0		7:30	0		1 (
2:40	0		7:40	0		4 .		
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		4 '		
3:10	0		8:10	0		4		
3:20	0		8:20	0		4		
3:30	0		8:30	0		4		
3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	10:53	1	Ve	ry weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	0	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	SSW	6	Extre	nely strong			
Tempe	rature:	17.1	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums detected						
						Summon: Od	ur Intoncitu Obconvoti	
Time	Intonsity	Comment	Time	Intonsity	Comment	John Summary Odd	Number of obs	0/15
0.10	Intensity	comment	5:10	Intensity	comment	Intensity	Number of obs	100%
0.10	0		5:20	0		1	0	0%
0.20	0		5:20	0		2	0	0%
0.30	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0			, ,	
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
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2:30	0		7:30	0] /		
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3:40	0		8:40	0		4		
3:50	0		8:50	0		4		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road				
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:					
Panellis	st name:	DE	0	Not	detectable						
Start ti	me:	11:33	1	Ve	ry weak						
Site No	:	L5	2		Weak						
Locatio	n E:	150°44'38.304"	3	C	Distinct						
Locatio	n S:	33°53'59.598"	4	5	Strong						
Wind s	peed:	4.16 m/s	5	Vei	ry strong						
Wind d	irection:	SW	6	Extre	mely strong						
Tempe	rature:	18.7	Zone:		56H]					
Comme	ents on Obs	servations:]					
No odo	urs or dust	plums detected									
						Summary Odour Intensity Observations Intensity Number of obs % 0 60 100%					
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%			
0:10	0		5:10	0		0	60	100%			
0:20	0		5:20	0		1	0	0%			
0:30	0		5:30	0		2	0	0%			
0:40	0		5:40	0		3	0	0%			
0:50	0		5:50	0		4	0	0%			
1:00	0		6:00	0		5	0	0%			
1:10	0		6:10	0		6	0	0%			
1:20	0		6:20	0		Tot:	60	100%			
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot				
1:40	0		6:40	0							
1:50	0		6:50	0		1					
2:00	0		7:00	0		1					
2:10	0		7:10	0		1					
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2:40	0		7:40	0		1 [
2:50	0		7:50	0		1 \					
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3:40	0		8:40	0		1					
3:50	0		8:50	0]					
4:00	0		9:00	0		1					
4:10	0		9:10	0]					
4:20	0		9:20	0]					
4:30	0		9:30	0]					
4:40	0		9:40	0]					
4:50	0		9:50	0]					
5:00	0		10:00	0]					

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	11:05	1	Ve	ery weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	C	Distinct			
Locatio	n S:	33°54'26.904"	4	5	Strong			
Wind s	peed:	3.05 m/s	5	Ve	ry strong			
Wind d	irection:	SSE	6	Extre	mely strong			
Tempe	rature:	17.9	Zone:		56H	1		
Comme	ents on Obs	servations:			•	1		
No odo	urs or dust	plums detected				Summary Odd	our Intensity Observati	ons
Time	Intonsity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0	comment	5:10	0	comment	0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0			, 0	
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
2:10	0		7:10	0		1		
2:20	0		7:20	0		1 /		
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2:50	0		7:50	0		1 \		
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3:10	0		8:10	0		1		
3:20	0		8:20	0		1		
3:30	0		8:30	0		1		
3:40	0		8:40	0		1		
3:50	0		8:50	0		7		
4:00	0		9:00	0		1		
4:10	0		9:10	0				
4:20	0		9:20	0				
4:30	0		9:30	0				
4:40	0		9:40	0				
4:50	0		9:50	0				
5:00	0		10:00	0		7		

Field C	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panelli	st name:	DE	0	Not	detectable			
Start ti	me:	12:05	1	Ve	ery weak			
Site No	:	L7	2		Weak			
Locatio	n E:	150°43'56.163"	3	C	Distinct			
Locatio	n S:	33°54'28.488"	4	S	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind d	irection:	SW	6	Extre	mely strong			
Tempe	rature:	19.8	Zone:		56H			
Comme	ents on Obs	servations:						
						Summary Ode	our Intensity Observati	ons
Time Intensity Comment Time Intensity Comme					Comment	Intensity	Number of obs	%
0:10	0	connent	5:10	0	connent	0	39	65%
0:20	0		5:20	1		1	21	35%
0:30	0		5:30	1		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	1		6:00	0		5	0	0%
1:10	1		6:10	0		6	0	0%
1:20	1		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0			, ,	
1:50	1		6:50	0		1		
2:00	1		7:00	0		1		
2:10	0		7:10	0]		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0] /		
2:40	1		7:40	0				
2:50	0		7:50	0				
3:00	1		8:00	0				
3:10	1		8:10	0			X	
3:20	1		8:20	1				
3:30	0		8:30	1		4		
3:40	0		8:40	1		4		
3:50	0		8:50	1				
4:00	0		9:00	1		4		
4:10	0		9:10	1		4		
4:20	1		9:20	0		4		
4:30	1		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	1		4		
5:00	0		10:00	1				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road				
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:					
Panellis	st name:	DE	0	Not	detectable						
Start ti	me:	11:48	1	Ve	ry weak						
Site No	:	L8	2		Weak						
Locatio	n E:	150°44'19.196"	3	C	Distinct						
Locatio	n S:	33°54'1.35"	4	5	Strong						
Wind s	peed:	3.05 m/s	5	Vei	ry strong						
Wind d	irection:	SW	6	Extre	mely strong						
Tempe	rature:	18.7	Zone:		56H						
Comme	ents on Obs	servations:									
No odo	urs or dust	plums detected									
L						Summary Odour Intensity Observations Intensity Number of obs % 0 60 100% 1 0 0%					
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%			
0:10	0		5:10	0		0	60	100%			
0:20	0		5:20	0		1	0	0%			
0:30	0		5:30	0		2	0	0%			
0:40	0		5:40	0		3	0	0%			
0:50	0		5:50	0		4	0	0%			
1:00	0		6:00	0		5	0	0%			
1:10	0		6:10	0		6	0	0%			
1:20	0		6:20	0		Tot:	60	100%			
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot				
1:40	0		6:40	0		4					
1:50	0		6:50	0		4					
2:00	0		7:00	0		4					
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4:30	0		9:30	0		4					
4:40	0		9:40	0		4					
4:50	0		9:50	0		4					
5:00	0		10:00	0							

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start tii	me:	11:21	1	Ve	ry weak			
Site No	:	L9	2		Weak			
Locatio	n E:	150°44'33.144"	3	C	Distinct			
Locatio	n S:	33°54'7.513"	4	5	Strong			
Wind sp	peed:	3.05 m/s	5	Vei	ry strong			
Wind d	irection:	SSE	6	Extre	mely strong			
Temper	rature:	17.9	Zone:		56H			
Comme	ents on Obs	servations:]		
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
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2:10	0		7:10	0]		
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4:40	0		9:40	0				
4:50	0		9:50	0				
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not o	detectable					
Start ti	me:	12:30	1	Ve	ry weak					
Site No	:	GM2	2		Weak					
Locatio	n E:	150°46'000"	3	D	listinct					
Locatio	n S:	33°54'28.194"	4	9	Strong					
Wind s	peed:	1.94 m/s	5	Ver	ry strong					
Wind d	irection:	SSE	6	Extrer	nely strong					
Tempe	rature:	20.1	Zone:		56H					
Comme	ents on Obs	ervations:								
Mushro	om smell,	very strong asph	alt and g	grass odour	that are not					
related	to the proj	ect as grass was	being cu	it and the ro	oad was					
recently	y re-done									
						Summary Odour Intensity Observations				
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	2		5:10	2		0	5	8%		
0:20	2		5:20	2		1	4	7%		
0:30	2		5:30	2		2	44	73%		
0:40	2		5:40	2		3	7	12%		
0:50	2		5:50	2		4	0	0%		
1:00	2		6:00	2		5	0	0%		
1:10	2		6:10	2		6	0	0%		
1:20	2		6:20	2		Tot:	60	100%		
1:30	2		6:30	2		Odour Intenis	ty Percentage Plot			
1:40	2		6:40	2						
1:50	3		6:50	2						
2:00	3		7:00	3						
2:10	2		7:10	3						
2:20	2		7:20	2] /				
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2:50	2		7:50	2						
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3:20	2		8:20	3						
3:30	0		8:30	2						
3:40	0		8:40	2						
3:50	0		8:50	2						
4:00	0		9:00	2						
4:10	0		9:10	2		_				
4:20	1		9:20	3						
4:30	1		9:30	3						
4:40	1		9:40	2						
4:50	1		9:50	2						
5:00	2		10:00	2						

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:06	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'44.947"	3	C	Distinct			
Locatio	n S:	33°54'23.753"	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Vei	ry strong			
Wind d	irection:	SE	6	Extre	mely strong			
Tempe	rature:	21.6	Zone:		56H			
Comme	ents on Obs	servations:]		
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
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1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
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1:50	0		6:50	0]		
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2:10	0		7:10	0]		
2:20	0		7:20	0		1 /		
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4:20	0		9:20	0				
4:30	0		9:30	0				
4:40	0		9:40	0		1		
4:50	0		9:50	0				
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start tii	me:	13:21	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	L50°45'38.407"	3	C	Distinct			
Locatio	n S:	33°54'12.083"	4	9	Strong			
Wind sp	peed:	2.5 m/s	5	Ve	ry strong			
Wind d	irection:	SE	6	Extrer	mely strong			
Temper	rature:	21.6	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
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1:20	0		6:20	0		Tot:	60	100%
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1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
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2:40	0		7:40	0		- \		
2.50	0		8.00	0		- 1		
3.00	0		8.00	0		-		
3.10	0		8.20	0		-		
3.20	0		8.30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		-		
4:00	0		9:00	0		-		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	13:34	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	D	Distinct			
Locatio	n S:	33°54'5.348"	4	2	Strong			
Wind s	peed:	2.5 m/s	5	Ver	ry strong			
Wind d	irection:	ESE	6	Extrer	mely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	ervations:						
Very we	eak pond lik	ke smell. There is	also a k	ournt smell	coming from a			
unknov	/n souce, Tl	he smells are ver	y weak,	it smells lik	e coffee			
burning								
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	56	93%
0:20	0		5:20	0		1	4	7%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
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1:20	0		6:20	0		Tot:	60	100%
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1:40	0		6:40	0				
1:50	0		6:50	1				
2:00	0		7:00	1				
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3:10	0		8:10	0				
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3:30	0		8:30	0				
3:40	0		8:40	0		-		
3:50	0		8:50	0				
4:00	0		9:00	0		-		
4:10	0		9:10	0		-		
4:20	1		9:20	0				
4:30	0		9:30	0		-		
4:40	0		9:40	0		4		
4:50	0		9:50	0				
5:00	0		10:00	1				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	13:47	1	Ve	ery weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	C	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Ve	ry strong			
Wind d	irection:	ESE	6	Extrer	mely strong			
Tempe	rature:	21.1	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected				Current Odd		
		C			C	Summary Odd	bur Intensity Observati	ons
Time 0:10	Intensity	Comment	Time E:10	Intensity	Comment	Intensity	Number of obs	% 100%
0:10	0		5:10	0		0	0	0%
0.20	0		5.20	0		-	0	0%
0:30	0		5:40	0		2	0	0%
0.40	0		5.40	0			0	0%
1:00	0		6:00	0			0	0%
1.00	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0			-1	
1:50	0		6:50	0		1		
2:00	0		7:00	0		1		
2:10	0		7:10	0		1		
2:20	0		7:20	0		1 /		
2:30	0		7:30	0		1 /		
2:40	0		7:40	0		1		
2:50	0		7:50	0				
3:00	0		8:00	0			\	
3:10	0		8:10	0			\backslash	
3:20	0		8:20	0				
3:30	0		8:30	0				
3:40	0		8:40	0				
3:50	0		8:50	0				
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:30	1	Ve	ry weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'38.304"	3	0	Distinct			
Locatio	n S:	33°53'59.598"	4	5	Strong			
Wind s	peed:	4.16 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extrer	nely strong			
Tempe	rature:	21.6	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected						
L						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		6:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0				
2:40	0		7:40	0		- \		
2:00	0		8.00	0		- 1		
3.00	0		8.00	0		-		
3.20	0		8.20	0		-		
3.20	0		8:30	0		-		
3.30	0		8.40	0		-		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:04	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	0	Distinct			
Locatio	n S:	33°54'26.904"	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Vei	ry strong			
Wind d	irection:	E	6	Extre	nely strong			
Tempe	rature:	22.6	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums detected						
						Summary Od	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0		4		
2:00	0		7:00	0		4		
2:10	0		7:10	0		-		
2:20	0		7:20	0		- /		
2:30	0		7:30	0				
2:40	0		7:40	0		- \	· ·	
2:50	0		7:50	0		4 \		
3:00	0		8:00	0		4 `	\backslash	
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		-		
3:50	0		8:50	0		-		
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		-		
4:50	0		9:50	0		4		
5:00	0		10:00	0	1	1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	15:00	1	Ve	ry weak			
Site No	:	L7	2		Weak			
Locatio	n E:	150°43'56.163"	3	0	Distinct			
Locatio	n S:	33°54'28.488"	4	5	Strong			
Wind s	peed:	4.72 m/s	5	Vei	ry strong			
Wind d	irection:	E	6	Extrer	nely strong			
Tempe	rature:	20.8	Zone:		56H			
Comme	ents on Obs	servations:						
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		lot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0		-		
1:50	0		0:50	0		-		
2:00	0		7:00	0		-		
2:10	0		7:20	0				
2.20	0		7:20	0				
2.30	0		7:40	0				
2:40	0		7:50	0		- \		
3.00	0		8:00	0		- 1		
3:10	0		8:10	0		-		
3:20	0		8:20	0		-		
3:30	0		8:30	0		-		
3:40	0		8:40	0		1		
3:50	0		8:50	0		1		
4:00	0		9:00	0		1		
4:10	0		9:10	0		1		
4:20	0		9:20	0		1		
4:30	0		9:30	0		1		
4:40	0		9:40	0		1		
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road			
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:				
Panellis	st name:	DE	0	Not	detectable					
Start ti	me:	14:43	1	Ve	ry weak					
Site No	:	L8	2		Weak					
Locatio	n E:	150°44'19.196"	3	C	Distinct					
Locatio	n S:	33°54'1.352"	4	5	Strong					
Wind s	peed:	4.16 m/s	5	Vei	ry strong					
Wind d	irection:	ESE	6	Extre	mely strong					
Tempe	rature:	21.6	Zone:		56H					
Comme	ents on Obs	servations:]				
No odo	urs or dust	plums detected								
						Summary Od	our Intensity Observati	bservations obs % 100% 0% 0% 0% 0% 0% 0% 0% 0% 100% Plot		
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%		
0:10	0		5:10	0		0	60	100%		
0:20	0		5:20	0		1	0	0%		
0:30	0		5:30	0		2	0	0%		
0:40	0		5:40	0		3	0	0%		
0:50	0		5:50	0		4	0	0%		
1:00	0		6:00	0		5	0	0%		
1:10	0		6:10	0		6	0	0%		
1:20	0		6:20	0		Tot:	60	100%		
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot			
1:40	0		6:40	0						
1:50	0		6:50	0]				
2:00	0		7:00	0		1				
2:10	0		7:10	0]				
2:20	0		7:20	0		1 /				
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3:20	0		8:20	0						
3:30	0		8:30	0						
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3:50	0		8:50	0						
4:00	0		9:00	0						
4:10	0		9:10	0						
4:20	0		9:20	0						
4:30	0		9:30	0						
4:40	0		9:40	0]				
4:50	0		9:50	0						
5:00	0		10:00	0						

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	14:17	1	Ve	ry weak			
Site No	:	L9	2		Weak			
Locatio	n E:	150°44'33.144"	3	C	Distinct			
Locatio	n S:	33°54'7.513"	4	5	Strong			
Wind s	peed:	2.5 m/s	5	Ve	ry strong			
Wind d	irection:	E	6	Extrer	mely strong			
Tempe	rature:	22.6	Zone:		56H]		
Comme	ents on Obs	servations:]		
No odo	urs or dust	plums detected						
						Summary Ode	our Intensity Observati	ons
Time Intensity Comment Time Intensity Comment				Comment	Intensity	Number of obs	%	
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
1:00	0		6:00	0		5	0	0%
1:10	0		6:10	0		6	0	0%
1:20	0		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	0				
1:50	0		6:50	0				
2:00	0		7:00	0]		
2:10	0		7:10	0				
2:20	0		7:20	0				
2:30	0		7:30	0] (
2:40	0		7:40	0				
2:50	0		7:50	0				
3:00	0		8:00	0		`	\backslash	
3:10	0		8:10	0		1		
3:20	0		8:20	0				
3:30	0		8:30	0		1		
3:40	0		8:40	0		4		
3:50	0		8:50	0				
4:00	0		9:00	0		4		
4:10	0		9:10	0		4		
4:20	0		9:20	0		4		
4:30	0		9:30	0		4		
4:40	0		9:40	0		4		
4:50	0		9:50	0		1		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	nsity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	15:20	1	Ve	ry weak			
Site No	:	CF4&CF5	2		Weak			
Locatio	n E:	150°45'43.727"	3	D	Distinct			
Locatio	n S:	33°53'24.342"	4	5	Strong			
Wind sp	peed:	4.72 m/s	5	Ver	ry strong			
Wind d	irection:	E	6	Extrer	mely strong			
Temper	rature:	17.9	Zone:		56H			
Comme	ents on Obs	servations:						
Smells I	ike mulch,	eucalyptus, fertil	lizer, pir	ne and wood	d			
					1	Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	4		5:10	4		0	0	0%
0:20	4		5:20	4		1	0	0%
0:30	4		5:30	4		2	0	0%
0:40	4		5:40	4		3	17	28%
0:50	4		5:50	4		4	33	55%
1:00	4		6:00	4		5	10	17%
1:10	4		6:10	4		6	0	0%
1:20	4		6:20	4		Tot:	60	100%
1:30	4		6:30	4		Odour Intenis	ty Percentage Plot	
1:40	3		6:40	4		-		
1:50	3		6:50	3		-		
2:00	4		7:00	3		-		
2.10	4		7:20	2				
2.20	4		7.20	2		1 🖌		
2:30	4		7:40	3				
2:50	4		7:50	4		1 📕		
3:00	4		8:00	4				
3:10	4		8:10	4		1		
3:20	4		8:20	4		-		
3:30	3		8:30	5		-		
3:40	3		8:40	5		1		
3:50	3		8:50	5		1		
4:00	3		9:00	5		1		
4:10	3		9:10	5		1		
4:20	3		9:20	5		1		
4:30	3		9:30	5]		
4:40	3		9:40	5]		
4:50	3		9:50	5				
5:00	4		10:00	5				
Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
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Date:		16-12-2022	Inter	nsity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start ti	me:	15:47	1	Ve	ry weak			
Site No	:	L1	2		Weak			
Locatio	n E:	150°45'44.947"	3	D	Distinct			
Location S: 33°54'23.753" 4		4	9	Strong				
Wind speed: 4.16 m/s		5	Ver	ry strong				
Wind direction: SE		6	Extrer	mely strong				
Tempe	rature:	19.6	Zone:		56H			
Comme	ents on Obs	servations:				_		
Smells I	ike fertilize	er, mushroom like	e, higluli	ikely from G	iM or veggie			
farm ne	ext to. A sm	ell of pound wat	er too tl	hat is not id	entified source			
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	3		5:10	2		0	0	0%
0:20	3		5:20	2		1	16	27%
0:30	3		5:30	2		2	21	35%
0:40	3		5:40	3		3	23	38%
0:50	3		5:50	3		4	0	0%
1:00	2		6:00	3		5	0	0%
1:10	2		6:10	3		6	0	0%
1:20	2		6:20	3		Tot:	60	100%
1:30	2		6:30	2		Odour Intenis	ty Percentage Plot	
1:40	2		6:40	2				
1:50	1		6:50	2				
2:00	1		7:00	2		1		
2:10	1		7:10	2] ,		
2:20	1		7:20	2		1 /		
2:30	1		7:30	3		1 /		
2:40	1		7:40	3		1 (
2:50	1		7:50	3		1 \		
3:00	1		8:00	3		1 \		/
3:10	1		8:10	3				/
3:20	1		8:20	2		1	X	
3:30	1		8:30	2				
3:40	1		8:40	3]		
3:50	1		8:50	3		1		
4:00	1		9:00	3]		
4:10	2		9:10	2]		
4:20	2		9:20	1]		
4:30	3		9:30	1]		
4:40	3		9:40	2]		
4:50	3		9:50	3]		
5:00	3		10:00	2		1		

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not o	detectable			
Start tii	me:	15:58	1	Ve	ry weak			
Site No	:	L1.1	2		Weak			
Locatio	n E:	150°45'39.181"	3	D	Distinct			
Location S: 33°54'19.294" 4 Strong		Strong						
Wind s	peed:	4.72 m/s	5	Ver	ry strong			
Wind d	irection:	ESE	6	Extrer	mely strong			
Temperature: 20.1 Zone: 56H								
Comme	ents on Obs	servations:]		
This poi	int was take	en to determinat	e the pl	um extent o	of the odour in			
locatior	n 1 detecte	d at survey 3 and	l coming	g from the n	nushroom plant			
(intensi	ties of 3) A	t this point inten	sities ei	ther dispers	e or diminished			
. Winds	also chage	d from SE to ESE	, wich m	night have b	een the cause			
of oosir	ng the plum	at this point.				Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	1		5:10	1		0	31	52%
0:20	1		5:20	1		1	29	48%
0:30	1		5:30	0		2	0	0%
0:40	1		5:40	1		3	0	0%
0:50	1		5:50	0		4	0	0%
1:00	1		6:00	0		5	0	0%
1:10	1		6:10	0		6	0	0%
1:20	1		6:20	0		Tot:	60	100%
1:30	0		6:30	0		Odour Intenis	ty Percentage Plot	
1:40	0		6:40	1				
1:50	1		6:50	1				
2:00	0		7:00	0				
2:10	1		7:10	1				
2:20	1		7:20	1		. /		
2:30	1		7:30	1				
2:40	1		7:40	1				
2:50	0		7:50	0		\		
3:00	1		8:00	0				
3:10	0		8:10	1				
3:20	1		8:20	1				
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4:00	0		9:00	0				
4:10	0		9:10	0				
4:20	0		9:20	0				
4:30	0		9:30	0		ļ		
4:40	0		9:40	1		ļ		
4:50	0		9:50	0				
5:00	1		10:00	1				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:10	1	Ve	ry weak			
Site No	:	L2	2		Weak			
Locatio	n E:	150°45'38.407"	3	0	Distinct			
Locatio	n S:	33°54'12.083"	4	5	Strong			
Wind s	peed:	4.72 m/s	5	Vei	ry strong			
Wind d	irection:	ESE	6	Extre	nely strong			
Tempe	Temperature: 20.1 Zone: 56H							
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums observed						
						Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
0:10	0		5:10	0		0	60	100%
0:20	0		5:20	0		1	0	0%
0:30	0		5:30	0		2	0	0%
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0:50	0		5:50	0		4	0	0%
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Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:23	1	Ve	ry weak			
Site No	:	L3	2		Weak			
Locatio	n E:	150°45'21.325"	3	C	Distinct			
Locatio	n S:	33°54'5.348"	4	5	Strong			
Wind speed: 4.72 m/s 5		5	Vei	ry strong				
Wind d	irection:	ESE	6	Extrer	nely strong			
Tempe	rature:	20.1	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums observed						
					1	Summary Ode	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
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0:50	0		5:50	0		4	0	0%
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Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:39	1	Ve	ry weak			
Site No	:	L4	2		Weak			
Locatio	n E:	150°45'0.177"	3	0	Distinct			
Locatio	n S:	33°54'9.320"	4	5	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind d	irection:	SE	6	Extre	nely strong			
Tempe	Temperature: 21.2 Zone: 56H							
Comme	ents on Obs	ervations:						
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Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	17:18	1	Ve	ry weak			
Site No	:	L5	2		Weak			
Locatio	n E:	150°44'38.304"	3	0	Distinct			
Locatio	n S:	33°53'59.598"	4	5	Strong			
Wind s	peed:	5.55 m/s	5	Vei	ry strong			
Wind d	irection:	SE	6	Extre	nely strong			
Tempe	Temperature: 20.5 Zone: 56H							
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums observed						
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Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	16:52	1	Ve	ry weak			
Site No	:	L6	2		Weak			
Locatio	n E:	150°44'50.164"	3	0	Distinct			
Locatio	n S:	33°54'26.904"	4	5	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind d	irection:	SE	6	Extrer	nely strong			
Tempe	Temperature: 21.2 Zone: 56H							
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums observed						
						Summary Odd	our Intensity Observati	ons
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
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0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
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4:30	0		9:30	0		4		
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4:50	0		9:50	0		4		
5:00	0		10:00	0				

Field O	dour Inte	nsity Observati	ion Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inten	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	17:46	1	Ve	ry weak			
Site No	:	L7	2		Weak			
Locatio	n E:	150°43'56.163"	3	0	Distinct			
Locatio	n S:	33°54'28.488"	4	5	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind d	irection:	SE	6	Extre	nely strong			
Tempe	rature:	20.2	Zone:		56H			
Comme	ents on Obs	ervations:						
No odo	urs or dust	plums observed						
<u> </u>		-	_1			Summary Ode	our Intensity Observati	ons
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0:50	0		5:50	0		4	0	0%
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Field C	dour Inte	nsity Observati	on Log	Sheet		Location:	475 Badgerys Ck Road	
Date:		16-12-2022	Inter	sity Scale a	nd Descriptor	Photo:		
Panellis	st name:	DE	0	Not	detectable			
Start ti	me:	17:30	1	Ve	ery weak			
Site No	:	L8	2		Weak			
Locatio	n E:	150°44'19.196"	3	C	Distinct			
Locatio	n S:	33°54'1.352"	4	5	Strong			
Wind s	peed:	5.27 m/s	5	Vei	ry strong			
Wind direction: SE 6 Extremely strong				mely strong				
Temperature: 20.2 Zone:					56H			
Comme	ents on Obs	ervations:						
No odours or dust plums observed						Summary Odd	our Intensity Observat	ions
Time	Intensity	Comment	Time	Intensity	Comment	Intensity	Number of obs	%
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0:30	0		5:30	0		2	0	0%
0:40	0		5:40	0		3	0	0%
0:50	0		5:50	0		4	0	0%
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4:10	0		9:10	0				
4:20	0		9:20	0		1		
4:30	0		9:30	0		7		
4:40	0		9:40	0				
4:50	0		9:50	0		1		
5:00	0		10:00	0		1		



Appendix B Odour Survey Results

475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

SLR Project No.: 610.031473

18 June 2024





Figure B-1 Round 1 Odour Survey Results – Day 1 Survey 1



Figure B-2 Round 2 Odour Survey Results – Day 1 Survey 2



Figure B-3 Round 3 Odour Survey Results – Day 1 Survey 3



Figure B-4 Round 4 Odour Survey Results – Day 2 Survey 1



Figure B-5 Round 5 Odour Survey Results – Day 2 Survey 2



Figure B-6 Round 6 Odour Survey Results – Day 2 Survey 3



Figure B-7 Round 7 Odour Survey Results – Day 3 Survey 1



Figure B-8 Round 8 Odour Survey Results – Day 3 Survey 2



Figure B-9 Round 9 Odour Survey Results – Day 3 Survey 3



Appendix C Risk Assessment Methodology

475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

SLR Project No.: 610.031473

18 June 2024



QUALITATIVE RISK ASSESSMENT METHODOLOGY

Nature of Impact

Predicted impacts may be described in terms of the overall effect upon the environment:

- **Beneficial:** the predicted impact will cause a beneficial effect on the receiving environment.
- **Neutral:** the predicted impact will cause neither a beneficial nor adverse effect.
- Adverse: the predicted impact will cause an adverse effect on the receiving environment.

Receptor Sensitivity

Sensitivity may vary with the anticipated impact or effect. A receptor may be determined to have varying sensitivity to different environmental changes, for example, a high sensitivity to changes in air quality, but low sensitivity to noise impacts. Sensitivity may also be derived from statutory designation which is designed to protect the receptor from such impacts.

Sensitivity terminology may vary depending upon the environmental effect, but generally this may be described in accordance with the following broad categories - Very high, High, Medium and Low.

Table C-1 outlines the methodology used in this study to define the sensitivity of receptors to air quality impacts.

Sensitivity	Criteria
Very High	Receptors of very high sensitivity to air pollution (e.g., dust or odour) such as: hospitals and clinics, and retirement homes.
High	Receptors of high sensitivity to air pollution, such as: schools, residential areas, food retailers, glasshouses and nurseries.
Medium	Receptors of medium sensitivity to air pollution, such as: farms / horticultural land, offices/recreational areas, painting and furnishing, hi-tech industries and food processing, and outdoor storage (i.e., new cars).
Low	All other air quality sensitive receptors not identified above, such as light and heavy industry.

Table C-1 Methodology for Assessing Sensitivity of a Receptor

Magnitude

Magnitude describes the anticipated scale of the anticipated environmental change in terms of how that impact may cause a change to baseline conditions (refer to **Table B-2**). Magnitude may be described quantitatively or qualitatively. Where an impact is defined by qualitative assessment, suitable justification is provided in the text.

Table C-2 Magnitude of Impacts

Magnitude	Description
Substantial	Impact is predicted to cause significant consequences on the receiving environment (may be adverse or beneficial)
Moderate	Impact is predicted to possibly cause statutory objectives/standards to be exceeded (may be adverse)
Slight	Predicted impact may be tolerated.
Negligible	Impact is predicted to cause no significant consequences.

Significance

The risk-based matrix provided in **Table C-3** illustrates how the definition of sensitivity and magnitude interact to produce impact significance.

Table C-3 Impact Significance Matrix

	Magnitude	[Defined by Table C-2 (IAQM 2023)]								
Sensi	tivity	Substantial Magnitude	Moderate Magnitude	Slight Magnitude	Negligible Magnitude					
by Table C-1 (IAQM 2023)]	Very High Sensitivity	Major Significance	Major/ Intermediate Significance	Intermediate Significance	Neutral Significance					
	High Sensitivity	Major/ Intermediate Significance	Intermediate Significance	Intermediate/Minor Significance	Neutral Significance					
	Medium Sensitivity	Intermediate Significance	Intermediate/Minor Significance	Minor Significance	Neutral Significance					
[Defined	Low Sensitivity	Intermediate/Minor Significance	Minor Significance	Minor/Neutral Significance	Neutral Significance					



Appendix D TRAQ Assessment

475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

SLR Project No.: 610.031473

18 June 2024



TRAQ ASSESSMENT

Pollutants Assessed

TRAQ provides predictions of CO, NO₂ and PM₁₀ concentrations at various distances from the road kerb. It does not provide predictions of the other traffic-related pollutants identified in **Section 4.1**, namely PM_{2.5}, SO₂ and VOCs. Given the low level of SO₂ emissions from vehicles and the low ambient concentrations recorded in the region (see **Section 6.1**), it is reasonable to assume that SO₂ emissions from road traffic are unlikely to result in any exceedances of the relevant criteria at locations beyond the road kerb. SLR's experience in modelling VOC emissions from roads has also shown that kerbside concentration of VOCs are typically well below the relevant air quality guidelines.

Given the above, SO₂ and VOC traffic emissions have not been considered further in this assessment. $PM_{2.5}$ emissions, however, have been assessed based on the PM_{10} concentrations given by TRAQ using a conservative $PM_{2.5}/PM_{10}$ ratio estimated from COPERT Australia derived emission factors.

Dispersion Model Configuration

TRAQ requires a number of inputs to describe the Master Plan environment and emissions to air, including:

- Background pollutant concentrations
- Peak hour traffic volumes and vehicle speeds
- Traffic mix (heavy vehicle percentage)
- Road type, number of lanes and gradient
- Year of assessment (vehicle fleet)
- Location land use
- Season

The sources of the required data and assumptions made for the purpose of this assessment are summarised in **Table D-1**.

Table D-1 TRAQ Input Data

Parameter	Value	Description
Background pollutant concentrations	PM ₁₀ 24-Hour: 31.2 μg/m ³ PM ₁₀ Annual: 18.1 μg/m ³ PM _{2.5} 24-Hour: 14.0 μg/m ³ PM _{2.5} Annual: 8.0 μg/m ³ NO ₂ 1-Hour: 20.5 μg/m ³ NO ₂ Annual: 8.4 μg/m ³ CO 1-Hour: 0.30 mg/m ³ CO 8-Hour: 0.20 mg/m ³	The 1-, 8- and 24-hour average values are the 90 th percentile background air quality concentrations recorded by the Bringelly and Camden AQMSs as per TRAQ guidance. The values are based on records from 2018- 2022 inclusive (refer Section 6.1)
Road Grade	0.8	Average gradient estimated from terrain elevations for the section of the Badgerys Creek Road in proximity of the Site
Peak hour speeds	10 km/hr	TRAQ default for peak periods on commercial arterial and arterial roads
Peak hour traffic volumes	1,908 vph	Highest projected peak hourly traffic volumes.
Peak hour percentage of daily traffic	10%	TRAQ default
Traffic mix (Percent Heavy Vehicles)	13.6%	Traffic numbers provided by the client.
Road type	Commercial Arterial	-
Year of assessment (vehicle fleet)	2021	-
Location land use	Rural	-
Season	Worst-case	TRAQ default worst-case season
Cold start emissions	Included	-

The TRAQ default traffic mix for commercial arterial roads has a combined total of 10.8 heavy vehicles. As shown in **Table D-1**, the heavy vehicle proportion assumed in the modelling was 13.6%. To do this, the default traffic mix was adjusted as shown in **Table D-**2. The proportions of individual heavy and light vehicle classes within each group remained the same but the overall split between the two groups was modified to have the relevant values.

Vehicle Category		TRAQ Default Traffic Mix (%) [*]	Traffic Mix Used in this Assessment (%)
СР	Petrol passenger vehicles	72.8	70.5
CD	Diesel passenger vehicles	2.1	2.0
LDCP	Light-duty commercial petrol vehicles <3.5 t	10.2	9.9
LDCD	Light-duty commercial diesel vehicles <3.5 t	3.5	3.4
MC	Motorcycles	0.6	0.6
Percentage Light Vehicles		89.2	86.4
HDCP	Heavy-duty commercial petrol vehicles >3.5 t	0.2	0.3
RT	Rigid trucks, 3.5-25 tonnes, diesel only	6.5	8.2
AT	Articulated trucks >25 tonnes, diesel only	3.6	4.5
BusD	Heavy public transport buses, diesel only	0.5	0.6
Percentage Heavy Vehicle	25	10.8	13.6
Default TRAQ traffic mix for 'Commercial Arterial' road			

Table D-2 Adopted Traffic Mix Used in TRAQ

type

The TRAQ screening tool does not include emission factors for PM_{2.5}. For the purposes of this assessment therefore, an estimated PM2.5/PM10 ratio was derived from the COPERT Australia emission factor database tool (COPERT). Vehicle speeds of 10 km/hr and 65 km/hr were modelled using COPERT to derive PM₁₀ and PM_{2.5} emission factors for the 2021 NSW vehicle fleet. The $PM_{2.5}/PM_{10}$ ratio for each vehicle speed scenario was estimated and a ratio of 85% (calculated based on the lower 10 km/hr vehicle speeds, which was worst-case) was adopted as a conservative measure (accounts for both exhaust and non-exhaust emissions). This ratio was applied to the PM₁₀ concentrations predicted by TRAQ to derive estimated $PM_{2.5}$ concentrations. It is noted that the ambient $PM_{2.5}$ and PM_{10} concentration ratio recorded by the Bringelly AQMS is approximately 44%.

Modelling Results

For the purpose of this assessment, it is assumed that all the vehicles related to the Master Plan enter or exit the Site through Badgerys Creek Road. Given that the closest residential and industrial receptors are located 47 m from the kerbside of Badgerys Creek Road (refer Figure D-1), emissions at 40 m from the kerbside were adopted as being representative of the impact from the Master Plan at the nearest sensitive receptors.

As shown in Table D-3, the incremental predicted concentrations due to the Master Plan at the surrounding receptors are slight and none of the predicted concentrations would be expected to contribute significantly to the potential for exceedances of the relevant criteria. Furthermore, all cumulative concentrations comply with the relevant criteria except for the annual PM_{2.5} concentrations where the annual background concentration is significantly elevated compared to the annual 8 μ g/m³ criteria.

Pollutant and Averaging Period	Units	Incremental Impact	Background Concentration	Cumulative Impact [*]	Criteria
Maximum 1-hour CO	mg/m ³	0.4	0.3	0.7	25
Maximum 8-hour CO	mg/m ³	0.3	0.2	0.5	9
Maximum 1-hour NO2	µg/m³	22.1	20.5	42.6	164
Annual NO ₂	µg/m³	4.4	8.4	12.8	31
Maximum 24-hour PM10	µg/m³	3.7	31.2	34.9	50
Annual PM ₁₀	µg/m³	1.5	18.1	19.6	25
Maximum 24-hour PM _{2.5}	µg/m³	3.1	14.0	17.1	25
Annual PM _{2.5}	µg/m³	1.3	8.0	9.8	8

Table D-3 TRAQ Model Results at 40 m from the Kerb

* Predicted incremental impact plus assumed background

concentration.

Figure D-1 Closest Residential Receptors to the Kerbside of Badgerys Creek Road





Appendix E Industry Impact Identification

475 Badgerys Creek Road

Masterplan Air Quality Assessment

Ingham Property Group

SLR Project No.: 610.031473

18 June 2024



Low Impact Industry Example	Medium Impact Industry Example	High Impact Industry Example
1. Repairing and servicing motor vehicles, lawn mowers, outboard engines and the like, including mechanical components, radiators, electrical components, wheel alignments, exhaust, tyres, suspension or air conditioning	 Metal foundry producing: a. less than 10 tonnes of ferrous metal castings per annum b. less than 50 t of non-ferrous metal castings per annum 	 Metal foundry producing: a. 10 t or greater of ferrous metal castings per annum b. 50 t or greater of non-ferrous metal castings per annum
2. Fitting and turning workshop	2. Boiler making or engineering works producing less than 10,000 t of metal product per annum	2. Boiler making or engineering works producing 10,000 t or greater of metal product per annum
3. Assembling or fabricating products from sheet metal or welding steel	3. Abrasive blasting facility using less than 10 t of abrasive material per annum	 3. Manufacturing, storage or distribution of hazardous chemicals in quantities: a. that exceed a manifest quantity under the Work Health and Safety Regulation 2011, including: i. facilities with refrigeration systems or cold stores operate using Anhydrous Ammonia ii. involving hazardous chemical manufacturing process or b. that exceed the threshold for a Hazardous Chemical Facility under Schedule 24 of the Planning Regulation 2017 and does not involve Hazardous Chemical Manufacturing process
 4. Manufacturing, assembling, fabricating or repairing wood products, including furniture, kitchens, shop fitting, cabinet making, joinery if not involving: a. outdoor plant or machinery including dust extraction plant or 	4. Enamelling workshop using less than 15,000 L of enamel per annum	4. Scrap metal yard including a fragmentiser
b. spray painting, spraying glue or spraying coatings		
5. Indoor dismantling automotive or mechanical equipment	5. Galvanising works using less than 100 t of zinc per annum	5. Manufacturing clay or ceramic products including bricks, tiles, pipes and pottery goods, greater than 200 tpa

Low Impact Industry Example	Medium Impact Industry Example	High Impact Industry Example
 6. Storage or distribution of hazardous chemicals that does not involve: a. manufacturing processes b. exceeding a manifest quantity under the <i>Work Health and Safety Regulation 2011</i> c. exceeding a threshold for a Hazardous Chemical Facility as defined under Schedule 24 of the <i>Planning Regulation 2017</i> d. refrigeration systems or cold stores that operate using Anhydrous Ammonia 	6. Anodising or electroplating workshop where tank area is less than 400 m2	6. Vegetable oil or oilseed processing in works with a design production capacity of greater than 1,000 tpa
7. Assembling or manufacturing plastic products, including moulding and extruding and not involving casting, liquid resins or fibre glassing	7. Powder coating workshop using less than 500 t of coating per annum	 7. Manufacturing, assembling, fabricating and repair of wooden products including furniture, kitchens, shop fitting, cabinet making, joinery, if involving: a. outdoor plant or machinery including dust extraction plant or b. spray painting, spraying glue or spraying coatings c. producing 500 t or greater per annum
8. Clothing or footwear manufacturing or repair	8. Spray painting workshop (including spray painting vehicles, plant, equipment or boats)	8. Manufacturing medium density fibreboard, chipboard, particle board, plywood, laminated board or wood veneer products, 250 t or greater per annum
9. Upholstering	9. Scrap metal yard (not including a fragmentiser), dismantling automotive or mechanical equipment	9. Sawmilling, wood chipping and kiln drying timber and logs, producing 500 t or greater per annum
10. Printing, including advertising material, magazines, newspapers, packaging and stationery, with a gross floor area less than 1,000 m ²	10. Manufacturing clay or ceramic products including bricks, tiles, pipes and pottery goods, less than 200 tpa	10. Manufacturing or processing plaster, producing 5,000 t or greater of gypsum per annum
11. Food and drink manufacturing, limited to mixing, blending, packaging or bottling	11. Food and drink manufacturing, including processing, cooking, baking, smoking, drying, curing, milling or canning food, beverages or pet food, excluding mixing, blending, packaging or bottling	11. Enamelling workshop using 15,000 L or greater of enamel per annum
12. Small-scale food and drink preparation limited to processing, cooking and baking with a maximum gross floor area of 200 m^2 per tenancy	12. Food and drink preparation limited to processing, cooking and baking with a gross floor area of greater than 200 m2 per tenancy	12. Galvanising works using 100 t or greater of zinc per annum
13. Small-scale industrial bakery, limited to mixing, cooking or baking, less than 20 tpa	13. Brewery, limited to beer or cider, producing 300,000 litres per annum or greater	13. Anodising or electroplating workshop where tank area is 400 m2 or greater

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Low Impact Industry Example	Medium Impact Industry Example	High Impact Industry Example
14. Brewery, limited to beer or cider, producing less than 300,000 L per annum	14. Coffee roasting, producing 100 tpa or greater	14. Powder coating workshop using 500 t or greater of coating per annum
15. Coffee roasting, producing less than 100 tpa	15. Garlic press, producing 20 tpa or greater	15. Concrete batching and producing concrete products
16. Garlic press, producing less than 20 tpa	16. Vegetable oil or oilseed processing in works with a design production capacity of 500 t or more and less than 1,000 tpa	16. Treating timber for preservation using chemicals including copper, chromium, arsenic, borax and creosote
17. Vegetable oil or oilseed processing works with a design production capacity of less than 500 tpa	 17. Manufacturing, assembling, fabricating and repair of wooden products including furniture, kitchens, shop fitting, cabinet making, joinery, if involving: a. outdoor plant or machinery including dust extraction plant or b. spray painting, spraying glue or spraying coatings c. producing less than 500 tpa 	17. Manufacturing soil conditioners by receiving, blending, storing, processing, drying or composting organic material or organic waste, including animal manures, sewage, septic sludges and domestic waste
18. Manufacturing PET, PETE, polypropylene and polystyrene plastic or plastic products, if not involving polyvinylchloride, less than 10,000 tpa	18. Manufacturing medium density fibreboard, chipboard, particle board, plywood, laminated board or wood veneer products, less than 250 tpa	18. Manufacturing fibreglass pools, tanks and boats
	19. Sawmilling, wood chipping and kiln drying timber and logs, producing less than 500 tpa	19. Manufacturing fibreglass, foam plastic, composite plastic or rigid fibre-reinforced plastic or plastic products, 5 t or greater per annum (except fibreglass boats, tanks and swimming pools)
	20. Recycling and reprocessing batteries	20. Manufacturing PET, PETE, polypropylene and polystyrene plastic or plastic products, if or if not involving polyvinyl chloride, 10,000 t or greater per annum
	21. Repairing or maintaining boats	21. Manufacturing, tyres, asbestos products, asphalt, cement, glass or glass fibre, mineral wool or ceramic fibre
	22. Manufacturing substrate for mushroom growing that does not involve animal products or animal by-products	22. Abattoir
	23. Manufacturing or processing plaster, producing less than 5,000 tonnes of gypsum per annum	23. Recycling chemicals, oils or solvents
	24. Recycling or reprocessing tyres including retreading	24. Waste disposal facility (other than waste incinerator)

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Low Impact Industry Example	Medium Impact Industry Example	High Impact Industry Example
	25. Printing, including advertising material, magazines, newspapers, packaging and stationery with a gross floor area of 1,000 m2 or greater	25. Recycling, storing or reprocessing regulated waste
	26. Manufacturing fibreglass, foam plastic, composite plastic or rigid fibre-reinforced plastic or plastic products, less than 5 tpa (except fibreglass boats, tanks and swimming pools)	26. Manufacturing batteries
	27. Manufacturing PET, PETE, polypropylene and polystyrene plastic or plastic products, if involving polyvinyl chloride, less than 10,000 tpa	27. Abrasive blasting facility using 10 t or greater of abrasive material per annum
	28. Reconditioning metal or plastic drums	28. Glass fibre manufacture producing 200 t or greater per annum
	29. Glass fibre manufacture less than 200 tpa	29. Manufacturing glass or glass products, where not glass fibre, less than 250 t per month
	30. Manufacturing glass or glass products, where not glass fibre, less than 250 tpa	30. Manufacturing substrate for mushroom growing, that does involve animal products or animal by-products.
	31. Storage or distribution of hazardous chemicals that does not involve:	23. Recycling chemicals, oils or solvents



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