Australian Turf Club Limited

ATC Randwick

Night Racing Noise Management Plan

February 2021

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1. Introduction

1.1 Overview

The Noise Management Plan (NMP) has been prepared by GHD on behalf of the Australian Turf Club (ATC) for the proposed night racing events to be held at Royal Randwick Racecourse. This document has been prepared to address the Secretary's Environmental Assessment Requirements (SEARs) key issues in relation to noise and includes appropriate event specific operational and design mitigation measures.

This Noise Management Plan applies to all night racing events held at Royal Randwick Course, which will be held predominantly between October and April.

The information provided in this NMP is based on the noise emission assessment, findings and mitigation recommendations provided in the Acoustic Report (ref 12542230-REP_ATC Randwick Acoustic Assessment_Rev1 dated 5 February 2021), prepared by GHD.

1.2 Project description

Royal Randwick Racecourse is located in the eastern suburbs of Sydney NSW, approximately 6 km from Sydney's CBD. It consists of the course proper (2224 m circumference) and the inner Kensington track (2100 m circumference). The site is on Crown Land, zoned RE1 – Public Recreation, leased to The Australian Turf Club and is bounded by Alison Road, Wansey Road, High Street & Doncaster Ave. Along these boundaries are a diverse range of neighbouring properties of varying heights, including the UNSW Sydney campus along with several commercial and residential properties.

The Australian Turf Club proposes to facilitate a maximum of sixteen (16) night race meetings per year, typically running from 6.00 pm to 10.00 pm predominantly between October to April. The race classes, crowd numbers and number of events are presented below in Table 1-1.

Table 1-1 Night racing schedule and crowd attendance

Event	Est Crowd Attendance	Number of events
Class 3	0 – 10,000	12
Class 2	10,001 – 35,000	4

The site location is provided below in Figure 1 which also details the location of the nearest sensitive receivers.

Paper Size A4

0 25 50 100 150 200

Metres

Map Projection: Transverse Mercator
Horizontal Datum: GDA 1994
Grid: GDA 1994 MGA Zone 56

N

LEGEND

- Proposal
- Sensitive receiver
- B1, Neighbourhood Centre
- B2, Local Centre
- R1, General Residential
- R2, Low Density Residential
- R3, Medium Density Residential
- RE1, Public Recreation
- RE2, Private Recreation
- SP2, Infrastructure

Australian Turf Club
Proposed night racing

Job Number	21-26735
Revision	A
Date	25 Oct 2017

Proposal location and sensitive receivers

Figure 1

G:\21\26173\GIS\Maps\Deliverables\SMA.mxd

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Data source: Aerial Imagery: Sixmaps, LPI 2017. General Topo Data: NSW LPI DTCB & DTDB 2012 Created by:afoddy

1.3 SEAR's requirement

The Secretary's Environmental Assessment Requirements (SEARs) key issues in relation to noise are as follows:

- *include a noise management plan, which outlines appropriate event specific operational and design mitigation measures*

Table 1-2 SEAR's requirements

Item	Section
dBA noise limits as well as dBC (base noise) limits	2.1.1
details of site supervision, hours of operation, night management	3
details on restrictions to amplified music, operating time and general use	2.1.2
details about patron attendance times	4
details about any signage to inform patrons of approved closure hours and egress after the event	5
details on training guidelines for staff	6
details on the process for community consultation and dealing with noise complaints from residents including the management of noise related complaints during night events	7
details on monitoring noise and vibration and actions to be taken to address complaints or non-compliances	9
details on compliance monitoring (provide on-site noise monitoring during the night events)	9
details on how any impacts during the event will be mitigated through the coordinated use of a flexible noise monitoring system	9
include an acoustic monitoring plan to outline results of noise compliance testing which can be used to inform any necessary additional acoustic mitigation measures	9

2. Noise limits

The following section provides details of the noise levels allowable during night racing events.

2.1 Amplified commentary and music

The maximum noise levels presented below relate to any amplified sound emanating from the site, including the permanent sound amplification equipment installed on site and any additional temporary sound amplification equipment installed for individual events.

2.1.1 dBA and dBC (base noise) noise limits

The **A-weighted** maximum sound pressure level (L_{Amax}) of amplified commentary and music should be managed so that the noise level does not exceed **65 dB** when assessed at the nearest sensitive receiver.

The **C-weighted** maximum sound pressure level (L_{Cmax}) of amplified commentary and music should be managed so that the noise level does not exceed **80 dB** when assessed at the nearest sensitive receiver.

2.1.2 Restrictions to amplified music, operating time and general use

The above limits apply for amplified sound prior to 10:00 pm during each race event. Amplified sound should not be audible at any sensitive receiver after 10:00 pm.

Temporary amplified sound at the rear of the grandstand should be limited to the above noise limits. Operators should be encouraged to locate and orientate the speakers to reduce the impact of the receivers to the west. This should also take into account reflections of the grandstand and other structures.

Base noise levels should be limited to reduce the impact on the nearest sensitive receivers. The dBC maximum noise level should be controlled to exceed the dBA maximum noise level by a maximum of 15 dB.

2.2 Lighting tower generators

Lighting tower generators should be selected, located, and designed to comply with the requirements of the Noise Policy for Industry (EPA, 2017) as detailed in the acoustic assessment.

3. Site supervision

Prior to event

Security staff should be deployed to locations (ingress routes and entry points) around the site to ensure that all patrons are entering the site in a quiet and orderly manner and are not loitering in areas that may impact the nearby sensitive receivers.

During event

Security staff should continue to monitor areas in the vicinity of the site to ensure all patrons have entered and are not loitering in areas that may impact the nearby sensitive receivers.

Completion of event

At the completion of the event, security staff should ensure that all patrons are directed towards either the member's car park, the infield car park, or the exit gates on Alison Road. Security staff are to ensure that no patrons on foot exit the site via Ascot Street and Doncaster Avenue.

Patrons exiting on foot should be directed towards the taxi rank or public transport. Should the patrons leave the area on foot, security or staff should be directing them to be doing so in a quiet and orderly manner. Should the patrons ignore the requests of security, and there is a high likelihood that residents will be impacted by the noise from the patrons, the police should be called to attend to the issue if security deem the noise from the patrons is significant.

Security and staff shall also monitor the exit points of the member's and infield car park to ensure that all vehicles are leaving in an orderly manner.

4. Patron attendance times

Events are proposed to be held between 6:00 pm and 10:00 pm. It is expected that patrons will enter the site in the hour prior to this between 5:00 pm and 6:00 pm and exit the site in the hour following completion of the event, between the hours of 10:00 pm and 11:00 pm.

To reduce the impact of patrons exiting the site following completion of the event, it is recommended that the final race commence at no later than 9:45 pm. All bars and food outlets should be closed at this time to encourage patrons to commence exiting the site. All onsite activities including commentary and music should conclude at or before 10:00 pm.

5. Signage

Signage should be erected at all exits informing patrons to leave the site in a quiet and orderly manner and to consider the residential receivers in the vicinity of the racecourse. Signage must also be erected directing the patrons to the exits on Alison Road and not to use the Ascot Street exit. Pedestrian access to Ascot Street should be blocked after 8:00 pm.

Signage should be erected throughout the car parks (members and infield) and the exits advising patrons to exit in a quiet and orderly manner and to consider the residential receivers in the vicinity of the racecourse.

6. Staff training

All staff and security staff should undergo training prior to working at their first event and at 12 monthly intervals following this. The training must educate staff regarding the following:

- Requirements of this Noise Management Plan, including noise limits
- Location of the sensitive receivers (Section 1.2)
- Mitigation measures outlined in this plan
- Acoustic monitoring plan (Section 9)
- Dealing with noise complaints from residents and management of noise related complaints during the event (Section 7.2)
- Details of exit routes from the site following completion of the event (Section 3)
- Any changes to procedures since last briefing

A training program should be established to assist with the education of all staff in consultation with a qualified acoustic consultant.

A copy of this noise management plan should be provided to all staff.

7. Community Consultation

7.1 Class 2 and 3 Events

Prior to each Class 3 event, the ATC should locally advertise. The advertising should detail the following:

- a contact number for noise complaints on the evening of the event

- an email address for complaints following the event
- the name and date of the event
- the start and finish time of the event
- the expected spectator size
- hours of operation for the complaints line

7.2 Complaints

Complaints arising from the noise emission from the site during night racing events should be documented and responded to in a sensitive, timely and consistent manner. The following process should be established to ensure all complaints are dealt with in an appropriate manner:

- A staff member will be nominated to deal with complaints from the community. Contact details of this member of staff will be displayed at each entry point of the site
- All complaints will be logged within a complaint register (see example table below). An archive of complaints will be maintained, documenting the nature of the complaint and the actions implemented for resolving the complaint
- The ATC operations manager will endeavour to attend to these complaints within 48 hours of receiving
- Following each event, the complaint log is to be reviewed and actions should be put in place to resolve the complaint. Depending on the nature of the complaint, this may involve follow up discussions with the complainant, or consultation with the regulatory authority, police of acoustic engineer.
- The complaints log will be made available to relevant regulatory authority on request

Item	Comments
Date and time of call	
Name and location of the caller	
Contact details of caller	
Nature of complaint	
Action taken	
Staff member handling complaint	

Figure 7-1 Complaints log template

The complaint log should be reviewed at regular intervals to identify common complaints and recurring issues. The review can be used to adjust operations to reduce the number of complaints at future events.

8. Management plan review

Following completion of the first round of monitoring for Class 2 and Class 3 events (see acoustic monitoring plan below and will be approximately 3 months), a review of the noise

management plan should be undertaken to determine the appropriateness of the measures in the plan.

The management plan should be reviewed and updated based on the following:

- Community consultation sessions
- Emails received from the community
- Noise monitoring undertaken at the Class 2 and Class 3 events
- Complaints received during race events
- Any resolution actions taken by the ATC based on the complaints received

9. Acoustic Monitoring Plan

An Acoustic Monitoring Plan has been prepared to address the following SEARs requirement:

- *include an acoustic monitoring plan to outline results of noise compliance testing which can be used to inform any necessary additional acoustic mitigation measures.*

The acoustic management plan utilities a flexible approach of operator attended measurements combined with unattended reference point measurements. The following section details how any the coordinated flexible noise monitoring system (or approach) will be used to measure impacts during the event to assess if additional mitigation measures are required.

9.1 Class 2 and 3 Events

In the initial three (3) months of the night racing events, two (2) events will be monitored for compliance by a qualified acoustic engineer. Operator attended noise measurements will be undertaken for the duration of the event. The operator will roam between representative worst case locations surrounding the site, identified in Figure .

A minimum of one (1) race will be monitored at each location throughout the evening. This should be rotated at different events to ensure that all receivers are being monitored during the main races of the event.

An unattended noise monitor should be located opposite the grandstand (see Figure 9-1 below) to continually monitor the noise emission from the event. This will be used to compare to the levels throughout the event and those levels presented in the Acoustic Report and be used as a reference point for noise emission from the site. This is required as the noise from each race will vary depending on the volume of the amplified sound, size of the crowd and the importance of the race (ie feature races can be significantly louder than race 1 or 2).

A direct line of contact between the acoustic engineer and the sound controller must be established. Where noise levels from amplified sound (commentary and/or music) exceeds the noise limits presented in Section 2.1.1, the acoustic engineer should contact the sound controller and direct them to decrease the amplifier as required.

Should complaints be lodged during this period and are justified, noise monitoring should be undertaken at the complainant's residence (or a representative location) at the next event to determine compliance with the relevant noise limits or review the locations of the monitoring.

9.2 Noise Monitoring Procedure

1. At least one (1) 15 minute measurement must be undertaken at each of the measurement locations below, capturing the noise prior to, during and after the race

2. Sound level meters must be Type 1 and comply with AS IEC 61672-2004 *Electroacoustics – Sound Level Meters.* The equipment must be within current NATA calibration.
3. A calibration check should be performed at the start and the end of the monitoring period and be within the acceptable variance of +/-0.5 dB.
4. Extraneous noise and ambient noise should be excluded from the compliance noise measurements. This refers to any noise events not attributable to the outdoor performance (i.e passing vehicles, wind gusts in trees, noise from the general public outside of the racecourse). Any excluded measurement should be accompanied by an attended observation of the attributable noise source.
5. The measurement should not be undertaken if the wind speed exceeds 5 m/s or during any rain events. Wind speed anemometer readings should be taken and noted during the monitoring period.
6. The measurement location should be outside the potentially impacted receiver (or a representative location) at a minimum distance of 3.5 m away from a facade or vertical reflecting surface. If this is not possible an appropriate correction should be applied to the measurement to account for reflected noise.
7. The microphone height should in general be 1.2 m to 1.5 m above the ground level or at the height where a complaint (such as multi storey building).
8. Considering item 6 and 7 above, if responding to a noise complaint the measurement location should be taken as close as practicable to where the noise impact is alleged to occur.
9. The sound level meter should be set to a ‘Fast’ time weighting with the ‘A’ and ‘C’ Weighting as specified.
10. 1/3 octave band spectrum levels should be recorded
11. Details of measurement location and conditions, noise levels and observations should be documented using the noise measurement form below in Figure 9-2. An alternative may be used, however the same details should be included.

Figure 9-1 Compliance monitoring locations

ATC Royal Randwick Night Racing - Noise Measurement Form

The purpose of this noise measurement form is to provide a field record of the noise levels produced at the time of the race events and any actions taken as a result. Event monitoring is to be undertaken against the relevant criteria provided in the Acoustic Report prepared for the night racing event

Details	SLM details	Calibrator details	Calibration check:
Site:	Make:	Make:	Pre-cal:
Event:	Model:	Model:	Post cal:
Est .Crowd Size:	Type:	Serial:	
Date:	Serial:	Cal date:	
Time:	Cal date:	Cal frequency:	

Meteorological Conditions: (measurements are not to be taken when wind speed are greater than 5 m/s or it is raining)

Average wind speed:	Gust wind speed:	Wind direction:
Temperature:	Humidity:	Barometric pressure:

Monitoring location plan

Measurement Details:

ID	location	Distance	Start time	Period	L_{Aeq}	L_{Amax}	L_{Cmax}	Comments / Exceedence?

Complaints record:

Complainant name	Contact/address	Reason	Action/Status

Operator name:	Role:	Signed:	Date:

Figure 9-2 Noise measurement form template

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12542230-73834-6/https://projectsportal.ghd.com/sites/pp15_03/atcnightracingprojec/ProjectDocs/12542230-REP_ATC Randwick Noise Management Plan.docx

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