Chapter 6 General Rules and Procedures

6.1 Noise

6.1.1 Introduction

- a. This introduction is to assist the lay reader to understand how this sub-chapter works and what it applies to. It is not an aid to interpretation in a legal sense.
- b. Sub-chapter 6.1 Noise relates to the management of adverse noise effects, recognising the impact such effects can have on the <u>amenity values</u> and health of people and communities. Noise-creating activities are managed by setting limits on the sound levels they generate, their location and their duration, so that the noise generated is consistent with the anticipated outcomes for the receiving environment. In addition, this sub-chapter sets out where sound insulation is required for <u>sensitive activities</u>, or alternatively, by limiting the location of <u>sensitive activities</u> relative to activities which have elevated noise levels.
- c. The provisions in this sub-chapter give effect to the Chapter 3 Strategic Directions Objectives.

6.1.2 Objective and Policies

6.1.2.1 Objective - Adverse noise effects

a. Adverse noise effects on the <u>amenity values</u> and health of people and communities are managed to levels consistent with the anticipated outcomes for the receiving environment.

6.1.2.1.1 Policy - Managing noise effects

- a. Manage adverse noise effects by:
 - i. limitations on the sound level, location and duration of noisy activities;
 - ii. requiring sound insulation for <u>sensitive activities</u> or limiting their location relative to activities with elevated noise levels.

6.1.2.1.2 Policy - Noise during night hours

a. Achieve lower noise levels during night hours to protect sleep, and the <u>amenity values</u> of residential and other sensitive environments, so far as is practicable.

6.1.2.1.3 Policy - Entertainment and hospitality activities in precinct areas and key locations in the Central City

a. Enable entertainment and hospitality activities, and temporary events including those at identified facilities (refer to Rule 6.1.6.2.3 Temporary activities), that contribute to Christchurch's economic, social and cultural well-being to occur in the Central City Entertainment and Hospitality Precincts while ensuring the adverse noise effects of activities on

the surrounding community and environment are managed to levels consistent with the anticipated outcomes for the receiving environment.

6.1.2.1.4 Policy - Activities in key locations outside the Central City

a. Enable land use activities at identified facilities (refer to Rule 6.1.6.2.3 Temporary activities) outside the <u>Central City</u> that contribute to Christchurch's economic, social, and cultural wellbeing while ensuring the adverse noise effects of activities on the surrounding community and environment are managed to levels consistent with the anticipated outcomes for the receiving environment.

6.1.2.1.5 Policy - Airport noise

- a. Require the management of <u>aircraft operations</u> and <u>engine testing</u> at Christchurch International Airport, so that:
 - i. noise generated is limited to levels that minimise sleep disturbance and adverse effects on the <u>amenity values</u> of residential and other sensitive environments, so far as is practicable;
 - ii. where practicable, adverse noise effects are reduced over time.
- b. Mitigate adverse noise effects from the operations of the Christchurch International Airport on sensitive activities, by:
 - i. prohibiting new <u>sensitive activities</u> within the <u>Air Noise Boundary</u> and within the 65 dB L_{dn} engine testing contour; and
 - ii. requiring noise mitigation for new <u>sensitive activities</u> within the 55 dB L_{dn} air noise contour and within the 55 dB L_{dn} engine testing contour; and
 - iii. requiring Christchurch International Airport Limited (CIAL) to offer appropriate acoustic treatment in respect of <u>residential units</u> existing as at [date Chapter becomes operative] within the 65 dB L_{dn} Annual Airport Noise Contour, and within the 60 dB L_{dn} engine testing contour.

Advice note:

1. Policy 17.2.2.10 also mitigates noise effects from the operations of Christchurch International Airport on rural land.

6.1.3 How to interpret and apply the rules

- a. The rules that apply to activities generating, or affected by, noise in all zones are contained in:
 - i. The general noise rules in Rule 6.1.4;
 - ii. The activity status tables (including activity specific standards) in Rules 6.1.5.1, 6.1.6.1 and 6.1.7.1;
 - iii. The Noise Standards in Rule 6.1.5.2;
 - iv. The Activity Standards in Rules 6.1.6.2 and 6.1.7.2; and

- v. The matters of discretion in Rule 6.1.8.
- b. Activities generating, or affected by, noise are also subject to the rules in the relevant zone chapters.
- c. The activity status tables, rules and standards in the following chapters also apply to activities generating, or affected by, noise (where relevant):
 - 4 Hazardous Substances and Contaminated Land:
 - 5 Natural Hazards;
 - The other sub-chapters of General Rules and Procedures;
 - 7 Transport;
 - 8 Subdivision, Development and Earthworks;
 - 9 Natural and Cultural Heritage; and
 - 11 Utilities and Energy.
- d. Additional noise standards applying to specific activities are contained in some zone chapters and some of the chapters listed in c. above.
- e. In order to understand which rules apply to your activity, there are two aspects you need to consider in relation to Sub-chapter 6.1 Noise whether you:
 - i. are generating noise; or
 - ii. may be affected by noise (a receiver of noise).
- f. If you are generating noise, the following steps may assist:
 - i. Determine whether the activity is exempt from the noise rules, as listed in Rule 6.1.4.2 or subject to Rule 6.1.4.3.a. in the Central City.
 - ii. Check whether the activity has specific noise standards for that activity in Rule 6.1.6.2. If so, only the standards in Rule 6.1.6.2 apply (unless specified otherwise in Rule 6.1.6.2).
 - iii. Outside the <u>Central City</u>, if not an activity covered in f.ii. above, establish the zoning for all <u>sites</u> which will receive noise from the activity. This will include all <u>adjoining sites</u>, but may also include other <u>sites</u> in the vicinity, particularly those that have more stringent noise rules than the <u>adjoining sites</u>. Determine whether the noise generated by the activity will meet the Noise Standards specified in Rule 6.1.5.2.1 for all noise receiving <u>sites</u>.
 - iv. In the <u>Central City</u>, if not an activity covered in f.ii. above, establish the precinct (as shown on the Central City Entertainment and Hospitality Precinct Overlay Planning Map) for the <u>sites</u> which will receive noise from the activity. Determine whether the noise generated by the activity will meet the Noise Standards specified in Rule 6.1.5.2.2 for that precinct, at any <u>site</u> receiving noise from the activity.
 - v. Check your activity is not specified as a discretionary activity, non-complying activity or prohibited activity.

- g. If you may be affected by noise (a receiver of noise), the following steps may assist:
 - i. Check whether the activity is near infrastructure specified in Rule 6.1.7.2.1, or Rule 6.1.7.2.2, and is an activity specified in those rules.
 - ii. Check the activity status in Rule 6.1.7.1 and whether the activity meets the Activity Standards in Rule 6.1.7.2.

6.1.4 General Noise Rules

6.1.4.1 Measurement and assessment of noise

- a. Unless otherwise specified elsewhere in this <u>District Plan</u>, noise shall be measured in accordance with NZS6801:2008 "Acoustics Measurement of environmental sound", and assessed in accordance with NZS 6802:2008 "Acoustics-Environmental noise", except that provisions in NZS 6802 referring to Special Audible Characteristics shall not be applied.
- b. The noise standards shall apply at any point within a <u>site</u> receiving noise from an activity, except where:
 - i. the <u>site boundary</u> is a <u>boundary</u> with a <u>site</u> in the Transport Zone outside the <u>Central City</u>, in which case noise standards shall apply at or beyond the far boundary of the Transport Zone; or
 - ii. the <u>site boundary</u> is a <u>boundary</u> with a <u>site</u> in the Transport Zone, an open space zone or any combination of these zones in the <u>Central City</u>, in which case noise standards shall apply at or beyond the far boundary of the Transport or open space zone; or
 - iii. the standards specify otherwise.
- c. Where a <u>site</u> is divided by a zone boundary, then each part of the <u>site</u> divided by the zone boundary shall be treated as a separate <u>site</u> for the purpose of these rules.

6.1.4.2 Exempt activities

- a. The provisions in Rule 6.1.5 and Rule 6.1.6 do not apply to the following noise sources:
 - i. traffic noise generated within a Transport Zone;
 - ii. trains and crossing bells within a Transport Zone, within the area of the Scheduled Activity (Ferrymead Heritage Park), and including railway yards, <u>rail sidings</u> (excludes new sidings on private land) or stations, tramways, trams and tram crossing bells;
 - iii. sirens used during an emergency;
 - iv. helicopters used for an emergency and as an air ambulance;
 - v. outside the <u>Central City</u>, boating activities permitted under Rule 18.6.2.1 P3;
 - vi. outside the <u>Central City</u>, normal <u>farming</u> practices undertaken for a limited duration, and using equipment which is mobile during its normal use. This includes activities such as harvesting, but does not include the use of helicopters, bird-scaring devices, frost control

- fans or irrigation pumps (for these activities refer to Rule 6.1.6.2.4). Motorbikes and chainsaws are only exempt when being used as part of normal <u>farming</u> activity;
- vii. spontaneous social activities and children's play (but not including <u>preschools</u>);
- viii. the use of generators and mobile equipment (including vehicles) for <u>emergency</u> purposes where they are operated by emergency services or lifeline <u>utilities</u>; and
- ix. the use of mobile generators by lifeline <u>utilities</u> for planned electricity supply interruption not exceeding 48 hours in duration; and
- x. activities at <u>emergency service facilities</u> associated with <u>emergency</u> response and <u>emergency</u> response training.
- b. Any noise received in the Open Space Natural Zone from activities in the <u>adjoining</u> Specific Purpose (Burwood Landfill and Resource Recovery Park) is not subject to noise limits for the open space zone under Rule 6.1.5.1. All other provisions apply to activities within the zone.

Advice note:

- 1. Although these noise sources are exempted from meeting the rules, any potential and actual adverse effects shall be considered for any discretionary or non-complying activity.
- 2. While not exempt from the noise provisions, broadband reversing alarms are encouraged in preference to tonal models.

6.1.4.3 Duration of resource consents for activities operating after 23:00 hours in Category 3 Precincts in Commercial Central City Mixed Use Zones

a. In the Commercial Central City Mixed Use Zone and Commercial Central City Mixed Use (South Frame) Zone, any resource consent granted under Rule 6.1.5 for activities operating after 23:00 hours in Category 3 Precincts shall be limited in duration to 7 years. For the avoidance of doubt, further resource consent/s for an additional 7 year term, or shorter duration, can be sought.

6.1.5 Zone Specific Noise Rules

a. Rule 6.1.5 does not apply to activities for which activity specific rules are specified in Rule 6.1.6 (unless otherwise specified in Rule 6.1.6).

6.1.5.1 Activity status tables

6.1.5.1.1 Permitted activities

- a. The activities listed below are permitted activities if they meet the activity specific standards set out in the following table.
- b. Activities may also be controlled, restricted discretionary, discretionary, non-complying or prohibited as specified in Rules 6.1.5.1.2, 6.1.5.1.3, 6.1.5.1.4, 6.1.5.1.5 and 6.1.5.1.6.

	Activity	Activity specific standards
P1	Outside the <u>Central City</u> , any activity that generates noise and which is not exempt by Rule 6.1.4.2 or specified in Rule 6.1.5.1.1 P2 below.	a. Any activity that generates noise shall meet the Zone noise limits outside the <u>Central City</u> in Rule 6.1.5.2.1.
P2	Outside the Central City, people in outdoor areas of premises licensed for the sale, supply and/or consumption of alcohol, in all commercial zones.	 a. No noise standard applies. b. The activity shall only occur between 07:00 hours and 22:00 hours. c. The maximum size of the outdoor area shall be 50m². d. The outdoor area shall be setback at least 10 metres from the boundary of any site in a residential zone.
Р3	In the <u>Central City</u> , any activity that generates noise and which is not exempt by Rule 6.1.4.2.	a. Any activity that generates noise shall meet the Noise limits in the <u>Central City</u> in Rule 6.1.5.2.2.

6.1.5.1.2 Controlled activities

There are no controlled activities.

6.1.5.1.3 Restricted discretionary activities

- a. The activities listed below are restricted discretionary activities.
- b. Discretion to grant or decline consent and impose conditions is restricted to the matters of discretion set out in Rule 6.1.8, as set out in the following table.

Activity		The Council 's discretion shall be limited to the following matters:		
RD1	Any activity listed in Rule 6.1.5.1.1 P1 or P3 that exceeds the noise limits in the activity specific standards by 10 dB or less.	a. Matters of discretion - Rule 6.1.8		

6.1.5.1.4 Discretionary activities

a. The activities listed below are discretionary activities.

Activ	Activity	
D1	Any activity listed in Rule 6.1.5.1.1 P2 that does not meet one or more of the activity specific standards.	
D2	Any activity not provided for as a permitted, restricted discretionary or non-complying activity.	

6.1.5.1.5 Non-complying activities

a. The activities listed below are non-complying activities.

Activ	ity
NC1	Any activity listed in Rule 6.1.5.1.1 P1 or P3 that exceeds the noise limits in the activity specific standards by more than 10 dB.

6.1.5.1.6 Prohibited activities

There are no prohibited activities.

6.1.5.2 Noise Standards

6.1.5.2.1 Zone noise limits outside the Central City

a. Outside the <u>Central City</u>, any activity that generates noise shall meet the Zone noise limits in Table 1 below at any <u>site</u> receiving noise from that activity, as relevant to the zone of the <u>site</u> receiving the noise.

Table 1: Zone noise limits outside the Central City

Zone of <u>site</u> receiving noise from the activity		Noise Limit (dB)	
	(hrs)	<u>L</u> _{AEq}	<u>L</u> _{Amax}
a. All residential zones (other than in the Accommodation and Community Facilities Overlay)	07:00- 22:00	50	n/a
b. All rural zones, except Rural Quarry Zone, assessed at any point within a <u>notional boundary</u>	22:00- 07:00	40	65
c. Specific Purpose (Flat Land Recovery) Zone			
d. Papakāinga/Kāinga Nohoanga Zone			
e. All commercial zones	07:00-	55	n/a
f. All open space zones	22:00		
g. All rural zones, except Rural Quarry Zone, assessed at the <u>site</u> <u>boundary</u>	22:00- 07:00	45	70
h. Accommodation and Community Facilities Overlay			
All industrial park zones (excluding Awatea and Memorial Avenue)			
j. Industrial Office Zone			
k. Specific Purpose (Cemetery, Schools, Tertiary Education, Golf Resort, Defence Wigram and Hospital) Zones			
1. Industrial General Zone	07:00- 22:00	70	n/a

Zone of site receiving noise from the activity	Time	Noise	Limit (dB)
Except that noise levels shall not exceed 50 dB \underline{L}_{AEq} /75dB \underline{L}_{Amax} at any <u>residential unit</u> lawfully established prior to 6 March 2017 during the hours of 22:00 to 07:00	22:00- 07:00	70	n/a
m. Industrial Park Zones – (Awatea and Memorial Avenue)	07:00- 22:00	60	n/a
Except that noise levels shall not exceed 50 dB \underline{L}_{AEq} /75dB \underline{L}_{Amax} at any <u>residential unit</u> lawfully established prior to 6 March 2017 during the hours of 22:00 to 07:00	22:00- 07:00	60	n/a
n. Industrial Heavy Zone	07:00- 22:00	75	n/a
Except that noise levels shall not exceed 50 dB \underline{L}_{AEq} /75dB \underline{L}_{Amax} at any <u>residential unit</u> lawfully established prior to 6 March 2017 during the hours of 22:00 to 07:00.	22:00- 07:00	75	n/a
o. Rural Quarry Zone	07:00-	65	n/a
p. Specific Purpose (Styx Mill Road Transfer Station)	22:00		
q. Specific Purpose (Burwood Landfill and Resource Recovery Park) Zone	22:00- 07:00	65	n/a
Except that noise levels shall not exceed 50 dB \underline{L}_{AEq} /75dB \underline{L}_{Amax} at any <u>residential unit</u> lawfully established prior to 6 March 2017 during the hours of 22:00 to 07:00.			

6.1.5.2.2 Noise limits in the Central City

a. In the <u>Central City</u>, any activity that generates noise shall meet the Noise standards in Table 2 below at any <u>site</u> receiving noise from that activity, as relevant to the Category of Precinct in which the site receiving the noise is located (as shown on the <u>Central City Entertainment and Hospitality Precinct Overlay Planning Map</u>).

Table 2: Noise standards for each Category

Category of Precinct in		Applicable Time		Noise Limit		Exemptions
	ich the site receiving se is located	to:	(hrs)	<u>L</u> _{AEq}	<u>L</u> _{Amax}	
a.	Category 1 - Higher noise level	Activities other than	07:00- 03:00	noise fro	This shall not include noise from people in	
	entertainment and hospitality precincts.	discrete outdoor entertainme nt events	03:00- 07:00	60	75	outdoor areas of premises licensed for the sale, supply and/or consumption of alcohol
		<u>Discrete</u> outdoor	07:00- 22:00	65	85	that meet the specified outdoor area setback required by Rule
	entertainme nt events	22:00- 07:00	65	85	6.1.6.2.10.	

Ca	Category of Precinct in		tegory of Precinct in Applicable Time Noise			Limit	Exemptions	
b.	Category 2 - Lower	All except Victoria	All activities	07:00- 01:00	60	85	This shall not include noise from people in	
	noise level entertainm ent and hospitality precincts.	Street area		01:00- 07:00	50	75	outdoor areas of premises licensed for the sale, supply and/or consumption of alcohol that meet the specified outdoor area setback	
		Victoria Street area	All activities	07:00- 23:00	55	85	required by Rule 6.1.6.2.10, between	
				23:00- 07:00	50	75	07:00 hours and 23:00 hours for the Victoria Street area and between 07:00 hours and 01:00 hours for the remainder of Category 2.	
c.		areas other	All activities	07:00- 23:00	55	85	This shall not include noise from people in	
	than Catego entertainme hospitality p	nt and	All activities	23:00- 07:00	45	75	outdoor areas of premises licensed for the sale, supply and/or consumption of alcohoup to a maximum size of 50m², in all Category 3 Zones except Residential Central City Zone, between 07:00 hours and 23:00 hours.	

Advice note:

- 1. The map of the three categories is shown in the Central City Entertainment and Hospitality Precinct Overlay Planning Map.
- 2. Compliance with the noise limits in Table 2 relating to entertainment and hospitality activities may require assessment of the ability of individual <u>site</u> design and <u>building</u> construction to attenuate noise to the required level, e.g. noise lobbies, "sound ceilings" or other means, or certification by an experienced acoustic consultant.

6.1.6 Activity Specific Noise Rules

6.1.6.1 Activity status tables

6.1.6.1.1 Permitted activities

a. The activities listed below are permitted activities if they meet the activity specific standards set out in the following table.

b. Activities may also be controlled, restricted discretionary, discretionary, non-complying or prohibited as specified in Rules 6.1.6.1.2, 6.1.6.1.3, 6.1.6.1.4, 6.1.6.1.5 and 6.1.6.1.6.

Activity

- **P1** Any activity listed in:
 - a. Rule 6.1.6.2.1 (Generators for emergency purposes);
 - b. Rule 6.1.6.2.2 (Temporary military training activities or emergency management activities);
 - c. Rule 6.1.6.2.3 (Temporary activities);
 - d. Rule 6.1.6.2.4 (Rural activities);
 - e. Rule 6.1.6.2.5 (Aircraft operations at Christchurch International Airport);
 - f. Rule 6.1.6.2.6 (On-aircraft engine testing at Christchurch International Airport);
 - g. Rule 6.1.6.2.8 (Helicopter movements);
 - h. Rule 6.1.6.2.9 (Sensitive activities in the Central City), other than as provided for in Rule 6.1.6.1.4 D3;
 - i. Rule 6.1.6.2.10 (Licensed premises outdoor areas in the Central City); or
 - j. Rule 6.1.6.2.11 (Shooting ranges within 1 km of Peacock Springs).

Activity specific standards

- a. The activities shall meet the activity standards in the following rules:
 - i. Rule 6.1.6.2.1 (Generators for emergency purposes);
 - ii. Rule 6.1.6.2.2 (Temporary military training activities or emergency management activities);
 - iii. Rule 6.1.6.2.3 (Temporary activities);
 - iv. Rule 6.1.6.2.4 (Rural activities);
 - v. Rule 6.1.6.2.5 (Aircraft operations at Christchurch International Airport), including the following additional activity standards:
 - A. Rule 6.1.6.2.7.1 (Airport Noise Management Plan);
 - B. Rule 6.1.6.2.7.2 (Acoustic treatment and advice);
 - C. Rule 6.1.6.2.7.3 (Airport Noise Liaison Committee);
 - vi. Rule 6.1.6.2.6 (On-aircraft engine testing at Christchurch International Airport), including the following additional activity standards:
 - A. Rule 6.1.6.2.7.1 (Airport Noise Management Plan);
 - B. Rule 6.1.6.2.7.2 (Acoustic treatment and advice);
 - C. Rule 6.1.6.2.7.3 (Airport Noise Liaison Committee);
 - vii. Rule 6.1.6.2.8 (Helicopter movements);
 - viii. Rule 6.1.6.2.9 (Sensitive activities in the Central City);
 - ix. Rule 6.1.6.2.10 (Licensed premises outdoor areas in the Central City); or
 - x. Rule 6.1.6.2.11 (Shooting ranges within 1 km of Peacock Springs).
- b. In the Central City, all activities shall also

	Activity	Activity specific standards		
		comply with Rule 6.1.5.		
P2	Construction activities	a. Construction activities shall meet relevant noise limits in Tables 2 and 3 of NZS 6803:1999 Acoustics - Construction Noise, when measured and assessed in accordance with that standard.		

6.1.6.1.2 Controlled activities

There are no controlled activities.

6.1.6.1.3 Restricted discretionary activities

- a. The activities listed below are restricted discretionary activities.
- b. Discretion to grant or decline consent and impose conditions is restricted to the matters of discretion set out in Rule 6.1.8, as set out in the following table.

Activi	ty	The Council's discretion shall be limited to the followin matters:	
RD1	 Any activity listed in: a. Rule 6.1.6.2.1 (Generators for emergency purposes); b. Rule 6.1.6.2.2 (Temporary military training activities or emergency management activities); c. Rule 6.1.6.2.3 (Temporary activities); d. Rule 6.1.6.2.4 (Rural activities); e. Rule 6.1.6.2.9 (Sensitive activities in the Central City), other than as provided for in Rule 6.1.6.1.4 D3; f. Rule 6.1.6.2.10 (Licensed premises outdoor areas in the Central City); or g. Rule 6.1.6.2.11 (Shooting ranges within 1 km of Peacock Springs), that: exceeds any noise limits in the activity standards for that activity by 10 dB or less, or does not meet one of more of the other activity standards for that activity. Any application arising from Rule 6.1.6.1.3 RD1 g. (Shooting ranges within 1 km of Peacock Springs) shall not be publicly notified and shall be limited notified only to the trustees of The Isaac Conservation and Wildlife Trust or its successors (absent their written approval). 	a. Matters of discretion – Rule 6.1.8	

Activi	ty	The Council's discretion shall be limited to the following matters:
	Advice note: This rule does not apply to the Specific Purpose (Ruapuna Motorsport) Zone or the Christchurch Kart Club raceway at Carrs Road.	
RD2	Construction activities listed in Rule 6.1.6.1.1 P2 that do not meet the activity specific standard.	

6.1.6.1.4 Discretionary activities

a. The activities listed below are discretionary activities.

Act	ivity
D1	Any activity listed in: a. Rule 6.1.6.2.5 (Aircraft operations at Christchurch International Airport); or b. Rule 6.1.6.2.6 (On-aircraft engine testing at Christchurch International Airport); that does not meet one of more of the activity standards for that activity, including one of more of the relevant additional activity standards for these activities in Rules 6.1.6.2.7.1, 6.1.6.2.7.2 and 6.1.6.2.7.3.
D2	Helicopter movements listed in Rule 6.1.6.2.8 (Helicopter movements) that do not meet one or more of the activity standards for that activity, other than for air ambulance or emergencies.
D3	In the <u>Central City</u> , any <u>residential activity</u> or <u>guest accommodation</u> located within a Category 1 Precinct as shown on the <u>Central City Entertainment and Hospitality Precinct Overlay Planning Map.</u>

6.1.6.1.5 Non-complying activities

a. The activities listed below are non-complying activities.

Activ	Activity		
NC1	Any activity not provided for as a permitted, restricted discretionary or discretionary activity.		
NC2	Any activity listed in:		
	a. Rule 6.1.6.2.1 (Generators for emergency purposes);		
	b. Rule 6.1.6.2.2 (Temporary military training activities or emergency management activities);		
	c. Rule 6.1.6.2.3 (Temporary activities);		
	d. Rule 6.1.6.2.4 (Rural activities);		
	e. Rule 6.1.6.2.9 (Sensitive activities in the Central City), other than as provided for in Rule 6.1.6.1.3 D3;		
	f. Rule 6.1.6.2.10 (Licensed premises outdoor areas in the Central City); or		

Activity

g. Rule 6.1.6.2.11 (Shooting ranges within 1 km of Peacock Springs); that exceeds any noise limits in the activity standards for that activity by more than 10 dB.

6.1.6.1.6 Prohibited activities

There are no prohibited activities.

6.1.6.2 Activity standards

6.1.6.2.1 Generators for emergency purposes

- a. Except as provided for in Rule 6.1.4.2, the use of generators, for <u>emergency</u> purposes only, including during planned electricity supply interruption exceeding 48 hours in duration, shall meet the following activity standards:
 - i. The activity shall, at any time, meet the Zone noise limits specified for between 07:00 hours and 22:00 hours in Table 1 of Rule 6.1.5.2.1 at any <u>site</u> receiving noise from the activity, as relevant to the zone of the <u>site</u> receiving the noise.
 - ii. Routine testing shall occur only on weekdays between the hours of 09:00 and 17:00, and shall meet the Zone noise limits in Table 1 of Rule 6.1.5.2.1 at any <u>site</u> receiving noise from the activity, as relevant to the zone of the <u>site</u> receiving the noise.
- b. For avoidance of doubt, use of generators not for <u>emergency</u> purposes, including peak-lopping, shall comply with Rule 6.1.5.

6.1.6.2.2 Temporary military training activities or emergency management training activities

- a. <u>Temporary military training activities</u> or <u>emergency</u> management training activities shall meet the following activity standards:
 - i. The activities shall meet the noise standards in Table 3 below.
 - ii. Activity a. in Table 3 shall meet either the minimum separation distance; or, if within the minimum separation distance, the maximum noise limit, as specified in Table 3. At least 10 days prior to the activity occurring, the <u>Council</u> and the occupier of the land and <u>adjoining</u> properties shall be informed of the activity and whether Standard a.a. or a.b. will be used
 - iii. The decibel noise standards specified in Table 3 for Activity a and c. shall apply at any point within the <u>notional boundary</u> of any <u>sensitive activity</u>.
 - iv. The minimum separation distances specified in Table 3 shall be measured between the boundary of the <u>temporary military training activity</u> or <u>emergency</u> management training activity and the notional boundary of any sensitive activity.
 - v. The duration of the <u>temporary military training activity</u> or <u>emergency</u> management training activity shall be limited to a period not exceeding 31 days, excluding set-up and pack-down activities.

Table 3: Temporary military training activity or emergency management training activity noise standards

	Activity	Time (hrs)	Noise Standard
a.	Firing of weapons and single or multiple explosive events.	07:00 – 19:00	 a. The activity shall either: i. meet a minimum separation distance of 1,500 metres; or
			ii. if within 1,500 metres, not exceed the noise level of 65 dB <u>L</u> _{Amax} .
			b. The activity shall meet the decibel noise limits of Table 1 or 2 of Rule 6.1.5.2, except that on up to 10 days per year on any site, activities may exceed the decibel noise limits in Table 1 or 2 of Rule 6.1.5.2 by 10 dB or less.
		19:00 -	a. The activity shall either:
		07:00	i. meet a minimum separation distance of 4,500 metres; or
			ii. if within 4,500 metres, not exceed the noise level of 50 dB <u>L</u> _{Amax} .
			b. The activity shall meet the decibel noise limits of Table 1 or 2 of Rule 6.1.5.2, except that on up to 10 days per year on any site, activities may exceed the decibel noise limits in Table 1 or 2 of Rule 6.1.5.2 by 10 dB or less.
b.	Helicopter movements	All times	NZS6807:1994 'Noise Management and Land Use Planning for Helicopter Landing Areas'
c.	Any other noise-generating activities (including mobile and fixed sources).		rity shall meet the decibel noise Table 1 or 2 of Rule 6.1.5.2, except
		activ	up to 10 days per year on any site, vities may exceed the decibel noise ts in Table 1 or 2 of Rule 6.1.5.2 by

Activity	Time (hrs)	Noise Standard
	ii. the n	B or less, and oise limit in Table 1 g. of Rule .2 at a rural site boundary shall not

6.1.6.2.3 Temporary activities

- a. <u>Temporary activities and buildings</u> specified in Rule 6.2, other than <u>temporary military training</u> <u>activities</u> or <u>emergency</u> management activities which are subject to the activity standards in Rule 6.1.6.2.2, shall meet the following activity standards:
 - i. <u>Temporary activities and buildings</u> specified in Rule 6.2, and located at a location listed in Table 4 below, shall meet the noise standards set out in Table 4.
 - ii. Any <u>temporary activity and building</u> specified in Rule 6.2, and located at a location not listed in Table 4, shall:
 - A. be located no closer than 30 metres from any residential unit;
 - B. undertake <u>sound amplified activities</u> for a total duration not exceeding 4 hours per day on any <u>site</u>, including all sound checks; and
 - C. occur only between 09:00 hours and 22:00 hours;

and for sound amplified activities, either:

- D. have a total amplified power not exceeding 500 Watts RMS; or
- E. result in a sound level not exceeding 65 dB \underline{L}_{AEq} at any residential unit, to be evidenced by a report from a suitably qualified acoustic consultant.

Table 4: Location-specific noise standards

	Location	Maximum No. of Days	Time limit (hrs)	Noise limit (dB)		Qualifications
				<u>L_{AEq}</u>	L _{AFm}	
a.	Lancaster Park	3 days per year	09:00–22:30	65	85	a. Assessed at the <u>boundary</u>
b.	Queen Elizabeth II Park					with any <u>site</u> in a residential zone.
c.	Specific Purpose (Defence Wigram) Zone	Refer to Rule 13.1.4.1.1 P2	Refer to Rule 13.1.4.1.1 P2	65 (15 min)	85	a. Applies only to temporary recreation activities or exhibitions provided for by Rule 13.1.4.1.1 P2.
d.	Temporary Christchurch Stadium	Refer to the provisions for Temporary Christchurch Stadium, including noise, of Chapter 18 Rule 18.3.5.				

	Location	Maximum No. of Days	Time limit (hrs)	Noise limit (dB)		Qualifications
e.	Christchurch Kart Club Raceway at Carrs Road	120 days per year, excluding Christmas Day and Boxing Day	09:00-17:00	65	85	a. These noise limits shall apply between 09:00 hrs and 18:00 hrs for official kart racing events that comply as
		1 day between Monday and Friday each week, excluding public holidays, that is fixed in the published annual calendar of Christchurch Kart Club	13:00-17:00	65	85	a KartSport NZ race meeting with a status of Group A to Group G event, and are fixed in the published annual calendar of the Christchurch Kart Club.
f.	Ruapuna Motorsport Park – Specific Purpose (Ruapuna Motorsport) Zone	Refer to the noise J Zone in Chapter 13	•	he Speci	ific Pur	rpose (Ruapuna Motorsport)
g.	Hagley Park	Any	09:00-22:00	50	85	a. Assessed at any property in
			22:00-09:00	40	75	a Residential Central City Zone.
		30 days per year	09:00-22:30	70	85	b. Fireworks are exempt from
		5 of the above 30 days per year	09:00-23:30	75	85	the \underline{L}_{Amax} limits.
		New Years Eve/Day	09:00-00:30 (12:30am New Years Day)	75	85	
h.	Cathedral Square	120 days per year	09:00-22:30	70	85	
i.	Victoria Square	20 days per year	09:00-22:30	70	85	

Advice note:

1. Refer to Appendix 6.11.3 for maps of the locations specified in this table.

6.1.6.2.4 Rural activities

- a. Bird-scaring devices shall meet the following activity standards:
 - i. Any bird-scaring devices shall:
 - A. not operate between sunset and sunrise;

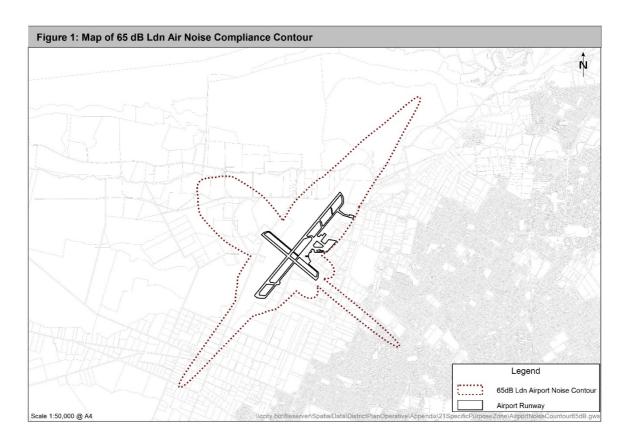
- B. not be used within 200 metres of a <u>notional boundary</u> of a <u>residential unit;</u>
- Noise from such devices, including clusters of up to three shots from gas operated devices, or three multiple shots from a firearm in rapid succession, shall not exceed 65 dB LAE when assessed at any point within the notional boundary of any residential unit on any other site.
- b. Frost control fans shall meet the following activity standards:
 - i. Any noise generated by a frost control fan shall not exceed 55 dB <u>L_AEq</u> when assessed at the <u>notional boundary</u> of any <u>residential unit</u> on a separate <u>site</u> under different ownership.
 - ii. This noise limit in Rule 6.1.6.2.4 b.i. applies to the total noise from all frost control fans in the vicinity operating simultaneously.
 - iii. The noise limit in Rule 6.1.6.2.4 b.i. includes a correction for the special audible characteristics of frost control fans and no further penalty shall be applied to measured or calculated noise levels.
- c. Any other rural activity shall comply with Rule 6.1.5.

6.1.6.2.5 Aircraft operations at Christchurch International Airport

- a. A<u>ircraft operations</u> at Christchurch International Airport shall meet the following activity standards:
 - i. Noise from <u>aircraft operations</u> shall not exceed 65 dB \underline{L}_{dn} outside the 65 dB \underline{L}_{dn} Air Noise Compliance Contour shown in Figure 1, other than as provided for in Rule 6.1.6.2.5 a.ii..
 - ii. Noise from <u>aircraft operations</u> may exceed the aircraft noise limit in Rule 6.1.6.2.5 a.i. by not more than 2 dB, provided that such exceedance is due to atypical weather, national flight disruption, natural disaster or other unplanned circumstance.
 - iii. Monitoring and determining compliance with activity standards i. and ii. above shall be as follows:
 - A. Noise monitoring of <u>aircraft operations</u> shall be based on calculations from an operational aircraft noise model, and records of actual <u>aircraft operations</u> at Christchurch International Airport over the previous year's <u>aircraft operations</u>.
 - B. Noise from <u>aircraft operations</u> shall be calculated as the Annual Aircraft Noise Contour (<u>AANC</u>), over the busiest three month period of the previous year.
 - C. The calculations shall be performed by a person with appropriate qualifications and experience in airport noise modelling and acoustics assessments.
 - D. The calculated results shall be verified by noise measurements carried out in accordance with the Airport Noise Management Plan required under Rule 6.1.6.2.7.1.
 - E. The measurement of aircraft sound exposure levels and the derivation of the 65 dB <u>L</u>_{dn} contour shall be in accordance with NZS 6805:1992.
 - iv. An Aircraft Operations Noise Monitoring Report shall be provided annually by the airport operator to the Council. The report shall include:

- A. the calculated **AANC**;
- B. the results of the verification measurements;
- C. analysis of compliance with reference to Rule 6.1.6.2.5 a.i. and ii. (including the number of exceedances and the reasons for them); and
- D. a summary of complaints received over the previous year in relation to noise from <u>aircraft operations</u>, and any actions taken in response.
- v. The additional activity standards in Rule 6.1.6.2.7 for <u>aircraft operations</u> at Christchurch International Airport shall be met.

Figure 1: 65 dB L_{dn} Air Noise Compliance Contour



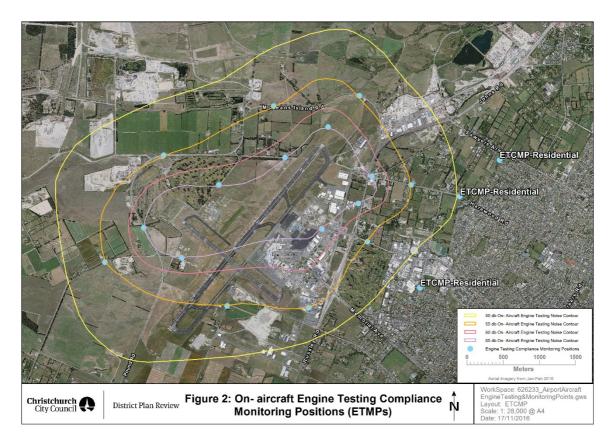
6.1.6.2.6 On-aircraft engine testing at Christchurch International Airport

- a. The testing of engines on aircraft at Christchurch International Airport shall meet the following activity standards:
 - i. Noise from the testing of engines on aircraft shall not exceed the noise limits shown in Table 5 below at the <u>engine testing</u> compliance monitoring positions (ETCMPs) shown in Figure 2.

Table 5: - On-aircraft engine testing noise limits

Noise Limit	Engine testing compliance monitoring positions (ETCMP) - refer Figure 2
65 dB <u>L</u> _{dn} , 7 day	8 points
55 dB <u>L</u> _{dn} , 7 day	8 points
75 dB <u>L_{Amax}</u> 22:00 to 07:00 only	Edge of residential zone – 3 points

Figure 2 - On-aircraft engine testing compliance monitoring positions (ETCMPs)



- ii. All high power testing of jet engines on an aircraft shall occur between the hours of 07:00h and 22:00h, except that a maximum of 5 unplanned <u>engine testing</u> events within any three month period, up to a maximum of 12 unplanned <u>engine testing</u> events per annum, may occur between the hours of 22:00h and 07:00h.
- iii. Testing of turbo prop engines on an aircraft between the hours of 22:00h and 07:00h, when the total duration of testing at high power is five minutes or more per aircraft, shall be conducted in the vicinity of the threshold of Runway 11 (ie. the north-western end of the cross-runway).
- iv. The following exclusions apply:
 - A. The testing of engines on an aircraft used for Antarctic operations, is excluded from activity standards i.-iii..

- B. The testing of engines on any aircraft is excluded from activity standards i.—iii., where such work is necessary to satisfy an airworthiness directive or other like safety requirement issued by the Minister of Transport, the Director of Civil Aviation or the Civil Aviation Authority, as is any other unplanned engine testing arising from an aircraft operator's identification of a safety issue relating to an aircraft fleet, or required as a result of a natural disaster including volcanic eruption.
- C. The testing of turbo prop engines on an aircraft is exempted from activity standard iii. when Runway 11/29 is in use.
- v. Monitoring and determining compliance with activity standard a.i. above shall be as follows:
 - A. Compliance or otherwise with activity standard a.i. shall be demonstrated by calculations of on-aircraft <u>engine testing</u> noise emissions based on the actual on-aircraft <u>engine testing</u> events and calculations of noise emissions for the <u>engine testing</u> events and configurations in question. The noise level (<u>L_{dn}</u>, _{7day}) shall be calculated as a 7 day rolling average.
 - B. The calculations in activity standard a.v.A. shall be verified by measurements undertaken with reference to at least four ETCMPs for a sample of at least two different on-aircraft engine test configurations. Verification measurements shall be carried out for an initial period of 6 months and subsequently be undertaken at least once every two years.
- vi. An On-aircraft Engine Testing Report shall be provided quarterly by the <u>airport operator</u> to the <u>Council</u>. The report shall include:
 - A. a summary of all on-aircraft engine testing activities undertaken in the quarter; and
 - B. identification of all tests undertaken both in accordance with activity standard a.i. and those excluded by activity standard a.iv., including reasons for the tests excluded and any measures taken to manage noise effects during those excluded tests.
- vii. An On-aircraft Engine Testing Noise Monitoring Report shall be provided annually by the <u>airport operator</u> to the <u>Council</u>. The report shall include:
 - A. the results of verification measurements in accordance with activity standard v.B.; and
 - B. analysis of compliance with reference to Rule 6.1.6.2.6 a.i.; and
 - C. a summary of complaints received over the previous year in relation to noise from on-aircraft <u>engine testing</u>, and any actions taken in response.
- viii. The additional activity standards in Rule 6.1.6.2.7 for on-aircraft <u>engine testing</u> at Christchurch International Airport shall be met.

6.1.6.2.7 Additional activity standards for aircraft operations and on-aircraft engine testing at Christchurch International Airport

a. The following additional activity standards apply to <u>aircraft operations</u> and to the testing of engines on aircraft at Christchurch International Airport.

6.1.6.2.7.1 Airport Noise Management Plan

- a. Within 12 months of [the date of this Chapter becoming operative], noise from aircraft operations and on-aircraft engine testing at Christchurch International Airport shall be managed in accordance with an Airport Noise Management Plan prepared by a suitably qualified and experienced person on behalf of the airport operator and in consultation with the Airport Noise Liaison Committee, in accordance with the requirements set out in Appendix 6.11.14. The Airport Noise Management Plan shall be reviewed, and updated if required, at least once every two years.
- b. The Airport Noise Management Plan shall:
 - i. demonstrate how compliance with the following noise limits will be achieved:
 - A. for aircraft operations Rule 6.1.6.2.5; and
 - B. for on-aircraft engine testing Rule 6.1.6.2.6.
 - ii. provide the details of the noise monitoring programme;
 - iii. incorporate a procedure for transparently and expediently responding to any complaints received in relation to noise from <u>aircraft operations</u> and on-aircraft <u>engine testing</u>; and
 - iv. incorporate a procedure for transparently and expediently presenting, in a publicly accessible forum, the following:
 - A. the Aircraft Operations Noise Monitoring Report, On-aircraft Engine Testing Report, and On-aircraft Engine Testing Noise Monitoring Report required by Rules 6.1.6.2.5 and 6.1.6.2.6;
 - B. a 7-day rolling report of noise from on-aircraft <u>engine testing</u> against the requirements of Rule 6.1.6.2.6 a.; and
 - C. a daily \underline{L}_{Amax} report of noise from on-aircraft <u>engine testing</u> against the requirements of Rule 6.1.6.2.6 a. at the edge of the residential zone.

6.1.6.2.7.2 Acoustic treatment and advice

- a. Within 12 months of [the date of this Chapter becoming operative], an Acoustic Treatment Programme shall be prepared by the <u>airport operator</u>, in consultation with the Airport Noise Liaison Committee, in accordance with the requirements of Appendix 6.11.15, for any <u>residential unit</u> existing as at [the date of this Chapter becoming operative] and located within the Rural Urban Fringe and Rural Waimakariri Zones, that is partly or wholly located within either:
 - i. the 65 dB L_{dn} Annual Aircraft Noise Contour as shown in the Aircraft Operations Noise Monitoring Report provided annually to the <u>Council</u> in accordance with Rule 6.1.6.2.5 a.iv.; or
 - ii. the 65 dB and 60 dB L_{dn} Engine Testing Contours shown on the Planning Maps.
 - The Acoustic Treatment Programme shall be reviewed, and updated if required, at least once every two years.
- b. Within the following timeframes, acoustic treatment shall be formally offered by the <u>airport</u> operator to the owners of any <u>residential unit</u> that meets the requirements of Rule 6.1.6.2.7.2 a., in accordance with the Acoustic Treatment Programme and the requirements of c. or d. below:

- i. within 24 months of [the date of this Chapter becoming operative] for all residential units that meet the requirements at that time; and
- ii. each year after that date, within 12 months from the date of the provision to the <u>Council</u> of the Aircraft Operations Noise Monitoring Report in accordance with Rule 6.1.6.2.5 a. iv., for any additional <u>residential units</u> that meet the requirements at that time.
- c. Where a <u>residential unit</u> is partly or wholly contained within either:
 - the 65 dB L_{dn} Annual Aircraft Noise Contour as shown in the Aircraft Operations Noise Monitoring Report provided annually to the <u>Council</u> in accordance with Rule 6.1.6.2.5 a.iv.; or
 - ii. the 65 dB L_{dn} Engine Testing Contour shown on the Planning Maps,

the formal offer from the <u>airport operator</u> to the owner of that <u>residential unit</u> shall be for 100% funding for retrofitting acoustic treatment, to achieve the internal design sound level of 40 dB <u>Lan</u> in habitable rooms. If <u>windows</u> and doors are required to be closed to achieve the internal design sound level, the acoustic treatment shall include <u>mechanical ventilation</u> meeting the requirements of Rule 6.1.7.2.1 <u>a.viii</u> for sound generation and airflow rate.

- d. Where a residential unit is partly or wholly located between the 60 dB L_{dn} and the 65 dB L_{dn} Engine Testing Contours shown on the Planning Maps (but not within the 65 dB L_{dn} Annual Aircraft Noise Contour), the formal offer from the airport operator to the owner of that residential unit shall be for 75% funding for retrofitting mechanical ventilation, to allow windows to be closed if necessary to achieve an internal design sound level of 40 dB L_{dn} for habitable rooms. Mechanical ventilation shall meet the requirements of Rule 6.1.7.2.1 a.viii for sound generation and airflow rate.
- e. Where the offers under b. d. above are accepted by the owners, the acoustic treatment shall be provided by the <u>airport operator</u> according to the Acoustic Treatment Programme prepared under a. above, but not exceeding a cost of \$30,000 (under c.) or \$22,500 (under d.) per <u>residential unit</u> (inclusive of GST and inflation adjusted from 2016 to the Consumer Price Index).
- f. An internal design sound level of 40 dB \underline{L}_{dn} for habitable rooms is not required to be achieved if:
 - i. the property owner accepts a form or level of acoustic treatment that results in a different internal design sound level; or
 - ii. it is impracticable to achieve the specified internal design sound level due to the desirability of maintaining the heritage fabric of a building. Instead, the internal design sound level of the habitable spaces will be reduced as far as practicable.
- g. Within 24 months of [the date of this Chapter becoming operative], the <u>airport operator</u> shall provide technical advice on acoustic treatment to all <u>residential units</u> existing as at [the date of this Chapter becoming operative] within the Rural Urban Fringe, Rural Waimakairiri or Rural Quarry Zones, which are located partly or wholly located between the 55 dB L_{dn} and the 60 dB L_{dn} Engine Testing Contours shown on the Planning Maps.

6.1.6.2.7.3 Airport Noise Liaison Committee

a. Within 6 months of [the date of this Chapter becoming operative], an Airport Noise Liaison Committee (the Committee) shall be established and operated by the <u>airport operator</u>.

- b. The <u>airport operator</u> shall:
 - i. invite the following parties to appoint members of the Committee:
 - A. two representatives appointed by the <u>airport operator</u>;
 - B. at least two members of Christchurch City Community Boards (as representatives of the community) appointed by the Council;
 - C. one Environmental Health Officer appointed by the Council (non-voting);
 - D. two representatives appointed by the Board of Airline Representatives of New Zealand; and
 - E. one representative appointed by the Isaac Conservation and Wildlife Trust.
 - ii. provide facilities and administrative support for the Committee in order that it can meet not less than twice annually.
- c. The Committee may consider and make recommendations to the <u>airport operator</u> on:
 - i. Any community concerns regarding noise from <u>aircraft operations</u> and <u>engine testing</u>;
 - ii. Liaison with, and provision of relevant information to the community;
 - iii. the preparation, review and updating if required of the Airport Noise Management Plan as required by Rule 6.1.6.2.7.1;
 - iv. the preparation, review and updating if required of the Acoustic Treatment Programme and its implementation as required by Rule 6.1.6.2.7.2;
 - v. complaints received over the previous year in respect of noise from <u>aircraft operations</u> and on-aircraft <u>engine testing</u>, and any actions taken in response to those complaints; and
 - vi. Reviewing, and updating if required, the procedures associated with noise complaints received over the previous year.
- d. The <u>airport operator</u> shall provide an annual report to the <u>Council</u> regarding the following:
 - i. the composition of the Committee; and
 - ii. summaries of the Committee's consideration of the matters specified in Rule 6.1.6.2.7.3 c..

6.1.6.2.8 Helicopter movements

- a. Outside the Specific Purpose (Airport) Zone, <u>helicopter movements</u> shall meet the following activity standards:
 - i. <u>Helicopter movements</u> shall only occur between 08:00 hours and 18:00 hours. These hours of operation shall not apply to <u>helicopter movements</u> which take place further than 450 metres from a residential unit.
 - ii. Within 25 metres of any <u>residential unit</u>, no <u>helicopter movement</u> shall take place, unless that <u>residential unit</u> is on the <u>site</u> on which the landing or take-off occurs.
 - iii. Between 25 metres and 450 metres from a <u>residential unit</u>, the number of <u>helicopter</u> movements on a <u>site</u> shall not exceed 24 in any calendar year, or 10 in any month, or six

in any week, unless that <u>residential unit</u> is on the <u>site</u> on which the landing or take-off occurs.

b. Within the Specific Purpose (Airport) Zone, noise created by <u>helicopter movements</u>, or hovering above points within the zone, shall not exceed 50 dB <u>L</u>_{dn} at any point within the <u>notional boundary</u> of a <u>residential unit</u> or a <u>building</u> occupied by a <u>sensitive activity</u> on any rurally zoned site or within the <u>boundary</u> of any residentially zoned site.

6.1.6.2.9 Sensitive activities in the Central City

- a. <u>Sensitive activities</u> in the <u>Central City</u> shall meet the following activity standards:
 - i. Any sensitive activity shall achieve a minimum external to internal noise reduction of:
 - A. Category 2 Precincts:
 - I. 35 dB $\underline{D}_{tr, 2m, nT, w} + \underline{C}_{tr}$ for bedrooms;
 - II. 30 dB $\underline{D}_{tr, 2m, nT, w} + \underline{C}_{tr}$ for other <u>habitable spaces</u>.
 - B. Category 3 Precincts <u>adjoining</u> the Category 1 Precinct:
 - I. 35 dB $\underline{D}_{tr, 2m, nT, w} + \underline{C}_{tr}$ for bedrooms;
 - II. 30 dB $D_{tr, 2m, nT, w} + C_{tr}$ for other habitable spaces.
 - C. Category 3 Precincts zoned residential, if within 75 metres of a Category 1 or 2 Precincts or H4 Stadium (Incorporating Spectator Events Facility) shown on Planning Maps 32 and 39, and not already covered by B. above:
 - I. 30 dB $\underline{D}_{tr, 2m, nT, w} + \underline{C}_{tr}$ for bedrooms.
 - D. Category 3 Precincts zoned Commercial Central City Business, Commercial Central City Mixed Use, Commercial Central City Mixed Use (South Frame) and Commercial Local and not already covered by B. above:
 - I. 30 dB $\underline{D}_{tr, 2m, nT, w} + \underline{C}_{tr}$ for bedrooms.

Advice note:

- 1. Meeting this activity standard can be achieved by either:
 - a. Conforming with the schedule of typical building constructions set out in Appendix 6.11.4; or
 - b. Providing an acoustic design certificate signed by a suitably qualified acoustic engineer stating the design proposed is capable of meeting the above standards.

6.1.6.2.10 Licensed premises outdoor areas in the Central City

- a. Outdoor areas of premises licensed for the sale, supply and/or consumption of alcohol in the Central City shall meet the following activity standards:
 - i. Outdoor areas of premises licensed for the sale, supply and/or consumption of alcohol located within Category 1 or 2 Precincts shall be setback by at least 25 metres from the

- boundary of any premise, or <u>boundary</u> of any <u>site</u>, that is a Category 3 Precinct zoned Residential Central City, Commercial Central City Mixed Use or Commercial Central City Mixed Use (South Frame).
- ii. Activity standard i. shall not apply to <u>sites</u> that adjoin areas designated as H4 Stadium (Incorporating Spectator Events Facility) shown in Planning Maps 32 and 39.
- iii. For the avoidance of doubt, the 25 metre setback can include any Transport Zone or open space zone, or any combination of these.

6.1.6.2.11 Shooting ranges within 1 km of Peacock Springs

- a. Any shooting ranges located within 1 km of the Peacock Springs Conservation Area, as shown in Chapter 17 Appendix 17.12.1, shall not generate noise levels exceeding 60 dB L_{Amax} at any time when received at any point within the Peacock Springs Conservation Area, except that, for the purpose of determining compliance with this rule within Lot 1 DP 38246, noise measurements shall be taken from points within the base of the former quarry.
- b. Notwithstanding Rule 6.1.3 f.ii., the Zone Specific Noise Rules in Rule 6.1.5 shall also apply.

6.1.7 Rules - Activities near infrastructure

6.1.7.1 Activity status tables

6.1.7.1.1 Permitted activities

- a. The activities listed below are permitted activities, if they meet the activity specific standards set out in the following table.
- b. Activities may also be controlled, restricted discretionary, discretionary, non-complying or prohibited as specified in Rules 6.1.7.1.2, 6.1.7.1.3, 6.1.7.1.4, 6.1.7.1.5 and 6.1.7.1.6.

Act	ivity	Activity specific standards
P1	Any activity listed in: a. Rule 6.1.7.2.1 (Sensitive activities near roads and railways); or b. Rule 6.1.7.2.2 (Activities near Christchurch Airport)	 a. The activities shall meet the activity standards in the following rules: i. Rule 6.1.7.2.1 (Sensitive activities near roads and railways); or ii. Rule 6.1.7.2.2 (Activities near Christchurch Airport)
P2	In any rural zone other than the Rural Quarry Zone, any new noise sensitive activity and any addition to an existing noise sensitive activity proposed between the Ruapuna Inner and Outer Noise Boundary relating to Ruapuna Motorsport Park as shown on the relevant Planning Maps.	 a. The activities shall be designed and constructed to ensure compliance with the indoor design sound levels in Rule 6.1.7.2.1. Advice note: These rules are intended to mitigate the effects of motorsport noise within internal building

Activi	ity	Activity specific standards	
		spaces only. Noise from motor sport activities will also be audible outside of <u>buildings</u> to a varying degree. When constructing new dwellings, residents are encouraged to consider orientating <u>outdoor living spaces</u> away from the Motorsport Park. Where this is not practical, the use of solid continuous walls or fencing encircling the outdoor space, can be used to help mitigate noise.	

6.1.7.1.2 Controlled activities

There are no controlled activities.

6.1.7.1.3 Restricted discretionary activities

- a. The activities listed below are restricted discretionary activities.
- b. Discretion to grant or decline consent and impose conditions is restricted to the matters of discretion set out in Rule 6.1.8, as set out in the following table.

Activity		The Council 's discretion shall be limited to the following matters:	
RD1	Any activity listed in Rule 6.1.7.2.1 (Sensitive activities near roads and railways) that exceeds any noise limits in the activity standards for that activity by 10 dB or less.	a. Matters of discretion – Rule 6.1.8	

6.1.7.1.4 Discretionary activities

There are no discretionary activities.

6.1.7.1.5 Non-complying activities

a. The activities listed below are non-complying activities.

Activi	Activity		
NC1	Any new <u>buildings</u> and/or additions to existing <u>buildings</u> located within the 55dB L_{dn} air noise contour shown on the Planning Maps that do not meet one or more of the activity standards in Rule 6.1.7.2.2.		
NC2	Any new <u>buildings</u> and/or additions to existing <u>buildings</u> located within the 55 dB L_{dn} engine testing contour shown on the Planning Maps that do not meet the \underline{L}_{dn} standards in the activity standards in Rule 6.1.7.2.2.		
NC3	Any activity not provided for as a permitted, restricted discretionary or prohibited activity.		
NC4	Any activity listed in Rule 6.1.7.2.1 (Sensitive activities near roads and railways) that exceeds any noise limits in the activity standards for that activity by more than 10 dB.		
NC5	In any rural zone, any new noise <u>sensitive activity</u> located within the Ruapuna Inner Noise		

Activi	Activity		
	Boundary surrounding Ruapuna Motorsport Park as shown on the relevant Planning Maps.		
NC6	In any rural zone, other than the Rural Quarry Zone, any new noise <u>sensitive activity</u> or any addition to an existing noise <u>sensitive activity</u> proposed between the Ruapuna Inner and Outer Noise Boundary relating to Ruapuna Motorsport Park, as shown on the relevant Planning Maps, that does not comply with the activity specific standard of Rule 6.1.7.1.1 P2.		

6.1.7.1.6 Prohibited activities

a. The activities listed below are prohibited activities.

Activity	
PA1	Any new sensitive activity within the Air Noise Boundary shown on the Planning Maps.
PA2	Any new <u>sensitive activity</u> within the 65 dB L _{dn} engine testing contour shown on the Planning Maps.

6.1.7.2 Activity standards

6.1.7.2.1 Sensitive activities near roads and railways

- a. The following activity standards apply to new <u>buildings</u>, or alterations or additions to existing <u>buildings</u>, intended for a <u>sensitive activity</u>:
 - i. External sound insulation Any new <u>building</u> intended for a <u>sensitive activity</u>, and any alteration or addition to an existing <u>building</u> intended for a <u>sensitive activity</u>, located within 80 metres of the boundary of any state highway or railway designation, or within 20 metres of the edge of the nearest marked traffic lane of a <u>collector road</u>, or within 40 metres of the edge of the nearest marked traffic lane of a Main Distributor, Local Distributor or <u>arterial road</u>, shall either:
 - A. be designed and constructed to achieve a minimum external to internal noise reduction of 30 dB $\underline{D}_{tr,2m,nT,w} + \underline{C}_{tr}$ to any <u>habitable space</u>; or
 - B. be designed and constructed to meet with the following indoor design sound levels:
 - I. Rail noise inside bedrooms between 22:00 hours and 07:00 hours 35 dB $\underline{L}_{AEq}(1h)$;
 - II. Rail noise inside <u>habitable spaces</u> excluding bedrooms 40 dB $\underline{L}_{AEq}(1h)$;
 - III. Road traffic noise inside all habitable spaces 40 dB $\underline{L}_{AEq}(24h)$; and
 - IV. Rail and <u>road</u> traffic noise within any other <u>building</u> intended for a <u>sensitive</u> activity maximum value recommended in AS/NZS2107:2000.

except where either:

- V. the sound incident on the most exposed part of the outside of the <u>building</u> is less than 55 dB_L_{AEq}(1h) for rail noise or 57 dB L_{AEq}(24h) for <u>road</u> traffic noise; or
- VI. the nearest façade of the <u>building</u> is at least 50 metres from all state highway and railway designations and there is a solid <u>building</u>, fence, wall or landform that blocks the line-of-sight from all parts of all <u>windows</u> and doors to all parts of any state highway <u>road</u> surface or all points 3.8 metres above railway tracks.
- ii. Compliance with Rule 6.1.7.2.1 can be achieved by either:
 - A. providing the <u>Council</u> with a design report (prior to construction) and a design certificate (prior to occupation) prepared by a suitably qualified acoustics specialist stating the design proposed is capable of meeting activity standard a.i.; and/or
 - B. conforming to the acceptable solutions listed in Appendix 6.11.4 Noise Attenuation Construction Requirements.
- iii. For the purposes of ventilation systems, compliance with Rule 6.1.7.2.1 shall be confirmed by providing the product specifications; or a design certificate (prior to occupation) prepared by a suitably qualified acoustics specialist, stating the design proposed is capable of meeting the activity standards.
- iv. Rail noise shall be deemed to be 70 <u>L_AEq</u>(1h) at a distance of 12 metres from the edge of the track, and shall be deemed to reduce at a rate of 3 dB per doubling of distance up to 40 metres and 6 dB per doubling of distance beyond 40 metres;
- v. Compliance with Rule 6.1.7.2.1 a.i.B. shall be confirmed by providing the <u>Council</u> with a design report prepared by a qualified acoustic engineer demonstrating compliance, prior to any <u>sensitive activity</u> or alteration occurring. The design shall take into account future permitted use of the <u>collector roads</u> and <u>arterial roads</u>, and railway and state highway designations outside the <u>Central City</u>, either by the addition of 2 dB to predicted sound levels or based on forecast traffic in 20 years' time.
- vi. The indoor design sound levels in Rule 6.1.7.2.1 a.i.B shall be achieved at the same time as the ventilation requirements of the New Zealand Building Code. If <u>windows</u> are required to be closed to achieve the indoor design sound levels then an alternative means of ventilation shall be required within bedrooms.
- vii. Where no traffic lane is marked, the distances stated shall be measured from 2 metres on the roadward side of the formed kerb. The classification of <u>roads</u> is shown in Appendix 7.12 Road Classification System.
- viii. Ventilation systems where <u>installed</u> shall:
 - A. generate sound levels not exceeding
 - I. 35 dB \underline{L}_{AEq} (30s) at night time in bedrooms; and
 - II. 40 dB \underline{L}_{AEq} (30s) in any other <u>habitable space</u> (excluding bedrooms) when measured 1 metre away from any grille or diffuser; and
 - B. provide an adjustable airflow rate of up to at least 6 air changes per hour.

6.1.7.2.2 Activities near Christchurch Airport

- a. The following activity standards apply to new <u>buildings</u> and additions to existing <u>buildings</u> located within the 55 dB L_{dn} air noise contour or the 55 dB L_{dn} engine testing contour shown on the Planning Maps:
 - i. Any new <u>buildings</u> and/or additions to existing <u>buildings</u> shall be insulated from aircraft noise and designed to comply with the following indoor design sound levels:
 - A. Residential units:
 - I. Sleeping areas 65 dB $\underline{L}_{AE}/40$ dB \underline{L}_{dn}
 - II. Other habitable areas 75 dB \underline{L}_{AE} /50 dB \underline{L}_{dn}
 - B. Guest accommodation, resort hotels, hospitals and health care facilities:
 - I. Relaxing or sleeping 65 dB \underline{L}_{AE} /40 dB \underline{L}_{dn}
 - II. Conference meeting rooms 65 dB \underline{L}_{AE} / 40 dB \underline{L}_{dn}
 - III. Service activities 75 dB \underline{L}_{AE} /60 dB \underline{L}_{dn}
 - C. Education activities:
 - I. Libraries, study areas 65 dB \underline{L}_{AE} /40 dB \underline{L}_{dn}
 - II. Teaching areas, assembly areas 65 dB \underline{L}_{AE} /40 dB \underline{L}_{dn}
 - III. Workshops, gymnasiums 85 dB LAE /60 dB Ldn
 - D. Retail activities, commercial services and offices:
 - I. Conference rooms $-65 \text{ dB } \underline{L}_{AE} / 40 \text{ dB } \underline{L}_{dn}$
 - II. Private offices 70 dB \underline{L}_{AE} /45 dB \underline{L}_{dn}
 - III. Drafting, open offices, exhibition spaces 75 dB \underline{L}_{AE} /50 dB \underline{L}_{dn}
 - IV. Typing, data processing 80 dB \underline{L}_{AE} /55 dB \underline{L}_{dn}
 - V. Shops, <u>supermarkets</u>, showrooms 85 dB \underline{L}_{AE} /60 dB \underline{L}_{dn}
 - ii. Noise insulation calculations and verification shall be as follows:
 - A. Building consent applications shall be accompanied with a report detailing the calculations showing how the required sound insulation and construction methods have been determined.
 - B. For the purpose of sound insulation calculations, the external noise levels for a <u>site</u> shall be determined by application of the air noise contours <u>L</u>_{dn} and <u>L</u>_{AE}. Where a <u>site</u> falls within the contours, the calculations shall be determined by linear interpolation between the contours.
 - C. If required by the <u>Council</u>, in conjunction with the final building inspection the sound transmission of the façade shall be tested in accordance with ISO 16283-

3:2016 to demonstrate that the required façade sound insulation performance has been achieved, and a test report is to be submitted to the <u>Council</u>'s Head of Building Consenting (or any subsequent equivalent position). Should the façade fail to achieve the required standard then it shall be improved to the required standard and re-tested prior to occupation.

6.1.8 Rules - Matters of discretion

- a. When considering applications for restricted discretionary activities, the <u>Council</u>'s discretion to grant or decline consent, or impose conditions, is restricted to the matters over which discretion is restricted in the tables in Rules 6.1.5.1.3, 6.1.6.1.3 and 6.1.7.1.3, and as set out for that matter below.
 - i. The level, duration and character of the noise, and proximity and nature of nearby activities, and the adverse effects that may arise from these factors on activities anticipated in the receiving environment and associated amenity.
 - ii. Whether the noise generated would be of such a level as to create a threat to the health or well-being of persons living or working in the vicinity.
 - iii. The proposals made by the applicant to reduce noise generation, including:
 - A. reduction of noise at source;
 - B. alternative techniques or machinery which may be available;
 - C. insulation or enclosure of machinery;
 - D. mounding or screen fencing/walls;
 - E. hours of operation;
 - F. in the <u>Central City</u>, the management of outdoor areas, including by closing outdoor serving areas, turning off outdoor heaters, turning off outdoor speakers, and minimising the size of outdoor areas;
 - G. in the <u>Central City</u>, the management of external doors and <u>windows</u> and other avenues for noise to emanate from within a <u>building</u>; and
 - H. in the <u>Central City</u>, any other management required to address issues such as rubbish and recycling disposal.i
 - iv. Outside the <u>Central City</u>, the adequacy of measures to address the adverse effects of noise on the natural character of the coastal environment.
 - v. The value and nature of entertainment activities and their benefit to the wider community, having regard to the frequency of noise intrusion and the practicality of mitigating noise, or utilising alternative <u>sites</u>.
 - vi. The extent to which achieving the standard is appropriate where the existing noise environment is subject to significant noise intrusion from <u>road</u> traffic, or Transport Zone activities in the Central City.

- vii. Any relevant standards, codes of practice or assessment methods based on sound acoustic principles, including those which address the reasonableness of the noise in terms of community health and amenity and/or sleep protection.
- viii. In the <u>Central City</u>, the level of noise from the activity in relation to ambient noise in its vicinity.
- ix. In the <u>Central City</u>, the reasonableness of the noise in terms of recommendations and guidelines for community health and amenity and sleep protection, including guidance given by the World Health Organisation.
- x. Additional criteria where sound insulation is required by the rules:
 - A. The extent to which a reduced level of acoustic insulation may be acceptable due to mitigation of adverse noise impacts through other means, e.g. screening by other structures, or distance from noise sources.
 - B. The ability to meet the appropriate levels of acoustic insulation through alternative technologies or materials.
 - C. The provision of a report from an acoustic specialist which provides evidence that the level of acoustic insulation is appropriate to ensure the amenity of present and future residents of the site.
 - D. In the <u>Central City</u>, the impact of any residential accommodation or <u>education</u> <u>activity</u> that does not provide the required noise insulation on the ability of existing or future permitted business activities to operate or establish without undue constraint.
 - E. In the <u>Central City</u>, the location of any nearby business activities and the degree to which the amenities of the <u>sensitive activities</u> may be adversely affected.
 - F. Outside the <u>Central City</u>, the appropriateness of a legal instrument to be registered against the title that is binding on the owner and the owner's successors in title, containing a 'no complaint' clause relating to the noise of aircraft using Christchurch International Airport.
 - xi. In the case of shooting ranges, whether the shooting range and associated activities will adversely affect the captive bird breeding programme within the Peacock Springs Conservation Area (identified in Chapter 17 Appendix 17.12.1) in terms of noise disturbance.