

32**RULES FOR NOISE AND VIBRATION****Activities Table***Policy 15.4.4*

32.1	Activities	All Zones
	Any activity (except temporary events, activities occurring in the Speedway Area, and an Organised Fireworks Display at Trentham Memorial Park) which complies with the noise and vibration standards in rules 32.3 to 32.6	P
	Any activity (except temporary events, activities occurring in the Speedway Area, and an Organised Fireworks Display at Trentham Memorial Park) which does not comply with the noise and vibration standards in rules 32.3 to 32.6	NC

Key	P Permitted activity which complies with standards for permitted activities specified in the Plan
	NC Non complying activity

Standards for Permitted Activities**32.2 Noise from the Speedway Area and from Organised fireworks Displays***Policy 7.4.6*

Noise standards which relate specifically to the Speedway Area and to an Organised Fireworks Display at Trentham Memorial Park (in the Open Space Zone) are specified in Chapter 21 and are not subject to the noise and vibration standards of Chapter 32 herein.

32.2A Noise from Temporary Events

Noise standards which relate specifically to Temporary Events are specified in Chapter 8A and are not subject to the noise and vibration standards of Chapter 32 herein.

32.3 Noise from construction and demolition*Policies 4.4.6, 15.4.4*

The maximum noise levels from construction -or demolition activities, measured at or within the boundary of any site (other than the source site) in the Residential and Open Space Zones, and immediately outside dwellings in the Rural Zone, shall not exceed the following levels:

Mon to Sat 7:00am - 7:00pm		All other times, Sundays & public holidays	
$L_{eq}dBA$	$L_{max}dBA$	$L_{eq}dBA$	$L_{max}dBA$
75	90	45	75
Notes			
Noise levels shall be measured in accordance with the requirements of NZS 6803:1999 Acoustics – Construction Noise.			
The definitions of dBA, L_{eq} and L_{max} are those found in NZS 6803:1999.			

32.4 Noise from temporary military training

Policies 4.4.6,
15.4.4

Temporary military training activities are permitted in all zones subject to the following noise limits not being exceeded at any point within 20m of a dwelling, residential institution or educational facility:

Time of day	$L_{10}dBA$	$L_{max}dBA$
6am – 7.30am	60	75
7.30am – 6pm	75	90
6pm – 8pm	70	85
8pm – 6am	55	70

In addition, all temporary military training activities shall be conducted so that the airblast overpressure arising from the use of explosives, ammunition or pyrotechnics does not exceed 120dBC at any point within 20m of a dwelling, residential institution or educational facility.

32.5 Noise from all other activities

Policies 4.4.6,
15.4.4

The following noise rules shall not apply to:

- Normal agricultural and forestry practices undertaken for a limited duration.
- Normal residential activities such as lawn mowing.
- Noise generated by sirens and alarms used by emergency services.

All activities, other than those specified above, shall not exceed the following noise standards:

	Mon to Sat 7:00am – 7:00pm		All other times, Sundays & public holidays	
	L ₁₀	L _{max}	L ₁₀	L _{max}
dBA				
Maximum noise levels measured at or within the boundary of any site (other than the source site) in the Residential, Rural and Open Space Zones.	50	-	40	70
Maximum noise levels measured at or within the boundary of any site (other than the source site) in the Business and Special Activity Zones.	65	-	45	75

The following standards apply to the Business Industrial Land on Eastern Hutt Road

	Day-time 7:00am – 9:00pm		Night-time 9:00pm – 7:00am	
	L ₁₀	L _{max}	L ₁₀	L _{max}
dBA				
Maximum noise levels from activities in the Business Industrial zone located on Eastern Hutt Road measured at or within the boundary of any site: <ul style="list-style-type: none"> • In the Residential zone; • In the Residential Conservation zone and in the Rural Hill zone, but assessed no closer than 100m from the zone boundary of the Business Industrial zone; • In the Special Activity zone that is St Patricks Estate area. 	50	-	40	70
Maximum noise levels from activities in the Business Industrial zone on Eastern Hutt Road* measured at or within the boundary of any site (other than the source site) in the Business Industrial zone on Eastern Hutt Road and at or within the boundary of any site within a Business sub-zone.	65	-	65	-

Exemption

* Except that primary warehousing operations including:

- Truck movements on sites and on access roads; and
- Loading and unloading activities –

shall be exempt from the noise rules only as they apply to receiving sites within the Business Industrial zone on Eastern Hutt Road.

Notes	
•	Noise levels shall be measured in accordance with the requirements of NZS 6801:1991 Measurement of Sound, and assessed in accordance with the requirements of NZS 6802:1991 Assessment of Environmental Sound.
•	Noise levels shall be measured with a sound level meter complying with International Standard IEC 60651 (1979): Sound Level Meters, Type 2.
•	Adjustments for special audible characteristics, if present, as provided for in clauses 4.3 and 4.4 of NZS 6802:1991, shall apply and will have the effect of imposing a maximum permitted noise level 5dBA more stringent than the L_{10} levels stated above. This condition shall not apply to impulse noise emissions arising from firing and detonation activities at the Trentham Ranges.
•	The definitions of dBA, dBC, L_{10} and L_{max} are those found in NZS 6802:1991.

32.6**Vibration standards**

Policies 4.4.6,
15.4.4

Vibration from any site due to blasting shall not exceed a peak particle velocity of 5mm/sec measured in the frequency range 3-12Hz at any point within 20m of a dwelling, residential institution or educational facility.

Airblast overpressure from blasting shall not exceed a peak sound pressure level of 120dBC at any point within 20m of a dwelling, residential institution or educational facility.

The airblast overpressure shall be measured in accordance with the requirements of NZS 6801:1991 Measurement of Sound and the Australian Standard AS 2187.2 1993: Explosives – Storage, transport and use. The lower limiting frequency of the measuring instruments shall be reported.

The measurements shall be assessed in accordance with the requirements of the Australian Standard AS 2187.2 1993: Explosives – Storage, transport and use.

Matters for Consideration

32.7

Matters that may be relevant in the consideration of any resource consent may include the following:

Noise and vibration

- The length of time, and the level by which, the standards will be exceeded, particularly at night, and the likely disturbance that may be caused.
- The nature and location of nearby activities and the effects they may experience.
- The topography of the site, and the neighbouring areas, and any influence this may have on noise or vibration transmission.
- The effects on residential activities, particularly night time effects.
- Any opportunities to avoid, remedy or mitigate the noise or vibration.
- The effectiveness of, and in particular the certainty provided by, any conditions or controls that might be imposed on the activity.