Appendices

Appendix D Noise Data

Appendices

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Appendix D

Noise Background Information

1. Noise and Vibration Basics

1.1 TERMINOLOGY AND NOISE DESCRIPTORS

The following are brief definitions of noise terminology:

- **Sound.** A vibratory disturbance that, when transmitted by pressure waves through a medium such as air, is capable of being detected by a receiving mechanism, such as the human ear or a microphone.
- Noise. Sound that is loud, unpleasant, unexpected, or otherwise undesirable.
- Decibel (dB). A unitless measure of sound on a logarithmic scale, which indicates the squared ratio
 of sound pressure amplitude to a reference sound pressure amplitude. The reference pressure is 20
 micropascals.
- **A-Weighted Decibel (dBA).** An overall frequency-weighted sound level in decibels which approximates the frequency response of the human ear.
- Equivalent Continuous Noise Level (L_{eq}). The mean of the noise level averaged over the measurement period, regarded as an average level.
- Day-Night Level (L_{dn}). The energy average of the A-weighted sound levels occurring during a 24-hour period, with 10 dB added to the A-weighted sound levels occurring during the period from 10 PM to 7 AM. The L_{dn} and the CNEL are similar noise descriptors and rarely differ by more than 1 dBA.
- Community Noise Equivalent Level (CNEL). The energy average of the A-weighted sound levels occurring during a 24-hour period, with 5 dB added to the A-weighted sound levels occurring during the period from 7 to 10 PM and 10 dB added to the A-weighted sound levels occurring during the period from 10 PM to 7 AM.
 - Note that L_{dn} and CNEL values rarely differ by more than 1 dB. As a matter of practice, L_{dn} and CNEL values are considered to be equivalent and are treated as such in this assessment.
- Sensitive Receptor. Certain land uses are particularly sensitive to noise and vibration. Noise- and vibration-sensitive receptors include land uses where quiet environments are necessary for enjoyment and public health and safety. Residences, schools, guest lodging (motels and hotels), libraries, religious institutions, hospitals, nursing homes, and passive recreation areas are generally more sensitive to noise than are commercial and industrial land uses.

1.2 CHARACTERISTICS OF SOUND

Sound is a pressure wave transmitted through the air. When an object vibrates, it radiates part of its energy as acoustical pressure in the form of a sound wave. Sound can be described in terms of amplitude (loudness), frequency (pitch), or duration (time). The standard unit of measurement of the loudness of sound is the decibel (dB). The human hearing system is not equally sensitive to sound at all frequencies. Sound waves below 16 Hz are not heard at all and are "felt" more as a vibration. Similarly, while people with extremely sensitive hearing can hear sounds as high as 20,000 Hz, most people cannot hear above 15,000 Hz. In all cases, hearing acuity falls off rapidly above about 10,000 Hz and below about 200 Hz. Since the human ear is not equally sensitive to sound at all frequencies, a special frequency-dependent rating scale is usually used to relate noise to human sensitivity. The A-weighted decibel scale (dBA) performs this compensation by discriminating against frequencies in a manner approximating the sensitivity of the human ear.

Because of the physical characteristics of noise transmission and noise perception, the relative loudness of sound does not closely match the actual amounts of sound energy. Table 1, Change in Sound Pressure Level, dB, presents the subjective effect of changes in sound pressure levels. Typical human hearing can detect changes of approximately 3 dBA or greater under normal conditions. Changes of 1 to 3 dBA are detectable under quiet, controlled conditions and changes of less than 1 dBA are usually indiscernible. A change of 5 dBA or greater is typically noticeable to most people in an exterior environment and a change of 10 dBA is perceived as a doubling (or halving) of the noise.

Table 1 Change in Sound Pressure Level, dB								
Change in Apparent Loudness								
± 3 dB	Threshold of human perceptibility							
± 5 dB	Clearly noticeable change in noise level							
± 10 dB	Half or twice as loud							
± 20 dB	Much quieter or louder							
Source: Bies and Hansen 2009.								

1.2.1 Point and Line Sources

Noise may be generated from a point source, such as a piece of construction equipment, or from a line source, such as a road containing moving vehicles. Because noise spreads in an ever-widening pattern, the given amount of noise striking an object, such as an eardrum, is reduced with distance from the source. This is known as "spreading loss." The typical spreading loss for point source noise is 6 dBA per doubling of the distance from the noise source.

A line source of noise, such as vehicles proceeding down a roadway, would also be reduced with distance, but the rate of reduction is affected by of both distance and the type of terrain over which the noise passes. Hard sites, such as developed areas with paving, reduce noise at a rate of 3 dBA per doubling of the distance while soft sites, such as undeveloped areas, open space and vegetated areas reduce noise at a rate of 4.5 dBA per doubling of the distance. These represent the extremes and most areas would actually contain a combination

of hard and soft elements with the noise reduction placed somewhere in between these two factors. Unfortunately the only way to actually determine the absolute amount of attenuation that an area provides is through field measurement under operating conditions with subsequent noise level measurements conducted at varying distances from a constant noise source.

Objects that block the line of sight attenuate the noise source if the receptor is located within the "shadow" of the blockage (such as behind a sound wall). If a receptor is located behind the wall, but has a view of the source, the wall would do little to reduce the noise. Additionally, a receptor located on the same side of the wall as the noise source may experience an increase in the perceived noise level, as the wall would reflect noise back to the receptor compounding the noise.

1.2.2 Noise Metrics

Several rating scales (or noise "metrics") exist to analyze adverse effects of noise, including traffic-generated noise, on a community. These scales include the equivalent noise level (Leq), the community noise equivalent level (CNEL) and the day/night noise level (Ldn). Leq is a measurement of the sound energy level averaged over a specified time period.

The CNEL noise metric is based on 24 hours of measurement. CNEL differs from Leq in that it applies a time-weighted factor designed to emphasize noise events that occur during the evening and nighttime hours (when quiet time and sleep disturbance is of particular concern). Noise occurring during the daytime period (7:00 AM to 7:00 PM) receives no penalty. Noise produced during the evening time period (7:00 to 10:00 PM) is penalized by 5 dB, while nighttime (10:00 PM to 7:00 AM) noise is penalized by 10 dB. The Ldn noise metric is similar to the CNEL metric except that the period from 7:00 to 10:00 PM receives no penalty. Both the CNEL and Ldn metrics yield approximately the same 24-hour value (within 1 dB) with the CNEL being the more restrictive (i.e., higher) of the two.

1.2.3 Psychological and Physiological Effects of Noise

Physical damage to human hearing begins at prolonged exposure to noise levels higher than 85 dBA. Exposure to high noise levels affects the entire system, with prolonged noise exposure in excess of 75 dBA increasing body tensions, thereby affecting blood pressure and functions of the heart and the nervous system. In comparison, extended periods of noise exposure above 90 dBA would result in permanent cell damage. When the noise level reaches 120 dBA, a tickling sensation occurs in the human ear even with short-term exposure. This level of noise is called the threshold of feeling. As the sound reaches 140 dBA, the tickling sensation is replaced by the feeling of pain in the ear. This is called the threshold of pain. A sound level of 160 to 165 dBA will result in dizziness or loss of equilibrium. A sound level of 190 dBA will rupture the eardrum and permanently damage the inner ear. Table 2 shows typical noise levels from various noise sources.

Table 2 Typical Noise Levels from Noise Sources

Common Outdoor Activities	Noise Level (dBA)	Common Indoor Activities
	110	Rock Band
Jet Flyover at 1,000 feet		
	100	
Gas Lawn Mower at three feet		
	90	
Diesel Truck at 50 feet, at 50 mph		Food Blender at 3 feet
	80	Garbage Disposal at 3 feet
Noisy Urban Area, Daytime		
	70	Vacuum Cleaner at 10 feet
Commercial Area		Normal speech at 3 feet
Heavy Traffic at 300 feet	60	
		Large Business Office
Quiet Urban Daytime	50	Dishwasher Next Room
Quiet Urban Nighttime	40	Theater, Large Conference Room (background
Quiet Suburban Nighttime		
	30	Library
Quiet Rural Nighttime		Bedroom at Night, Concert Hall (background)
	20	
		Broadcast/Recording Studio
	10	
Lowest Threshold of Human Hearing	0	Lowest Threshold of Human Hearing

1.3 CHARACTERISTICS OF VIBRATION

Vibration is an oscillatory motion through a solid medium in which the motion's amplitude can be described in terms of displacement, velocity, or acceleration. Vibration is normally associated with activities such as railroads or vibration-intensive stationary sources, but can also be associated with construction equipment, such as jackhammers, pile drivers, and hydraulic hammers. Vibration displacement is the distance that a point on a surface moves away from its original static position. The instantaneous speed that a point on a surface moves is described as the velocity, and the rate of change of the speed is described as the acceleration. Each of these descriptors can be used to correlate vibration to human response, building damage, and acceptable equipment vibration levels. During the construction of a building, the operation of construction equipment could cause groundborne vibration. The three main wave types of concern in the propagation of groundborne vibrations are surface or Rayleigh waves, compression or P-waves, and shear or S-waves.

Surface or Rayleigh waves travel along the ground surface. They carry most of their energy along an
expanding cylindrical wave front, similar to the ripples produced by throwing a rock into a lake. The

particle motion is more or less perpendicular to the direction of propagation (known as retrograde elliptical).

- Compression or P-waves are body waves that carry their energy along an expanding spherical wave front. The particle motion in these waves is longitudinal, in a push-pull motion. P-waves are analogous to airborne sound waves.
- Shear or S-waves are also body waves, carrying their energy along an expanding spherical wave front. Unlike P-waves, however, the particle motion is transverse, or perpendicular to the direction of propagation.

The peak particle velocity (PPV) or the root mean square (RMS) velocity is usually used to describe vibration amplitudes. PPV is defined as the maximum instantaneous peak of the vibration signal and RMS is defined as the square root of the average of the squared amplitude of the signal. PPV is more appropriate for evaluating potential building damage, whereas RMS is typically more suitable for evaluating human response.

The units for PPV and RMS velocity are normally inches per second (in/sec). Often, vibration is presented and discussed in dB units to compress the range of numbers required to describe the vibration. All PPV and RMS velocity are in in/sec and all vibration levels in this study are in dB relative to 1 micro-inch per second (abbreviated as VdB). The threshold of perception is approximately 65 VdB. Typically groundborne vibration generated by manmade activities attenuates rapidly with distance from the source of the vibration. Manmade vibration problems are usually confined to short distances (500 feet or less) from the source.

Construction generally includes a wide range of activities that can generate groundborne vibration. In general, demolition of structures generates the highest vibrations. Vibratory compactors or rollers, pile drivers, and pavement breakers can generate perceptible amounts of vibration at distances within 200 feet of the vibration sources. Heavy trucks can also generate groundborne vibrations that vary, depending on vehicle type, weight, and pavement conditions. Potholes, pavement joints, discontinuities, differential settlement of pavement, etc., all increase the vibration levels from vehicles passing over a road surface. Construction vibration is normally of greater concern than vibration of normal traffic on streets and freeways with smooth pavement conditions. Trains generate substantial quantities of vibration due to their engines, steel wheels, and heavy loads.

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The urban environment contains a variety of land uses—residential, commercial, institutional, industrial, and recreational—that can be sources of noise and affect the way people live and work. In general, the greatest source of noise throughout La Habra is vehicle roadway noise generated along the City's arterial roadways such as Beach Boulevard, Imperial Highway, Whittier Boulevard, and Harbor Boulevard in addition to roadways within residential areas. Other sources of noise in La Habra include freight trains passing though the City on the rail line and various stationary sources such as commercial heating, ventilation, and air conditioning (HVAC) units and park facilities with active sports fields.

Noise Reduction

The following goals and policies are designed to maintain compatible land uses with acceptable environmental noise levels to protect La Habra's residents and workforce from excessive noise.

Goal N 1

Noise Environment. Ambient noise levels that are compatible with La Habra's small town character and are not disruptive to the residents' quality of life.

Policies

N 1.1 Land Use Compatibility. Restrict the development of noise-sensitive land uses (i.e., schools, medical centers and hospitals, senior centers, and residences) in areas with noise levels that exceed those considered clearly incompatible with the use, as shown in Figure 7-2 and Table 7-1(Land Use Compatibility with Community Noise Environments), unless measures can be implemented to reduce noise to acceptable levels.

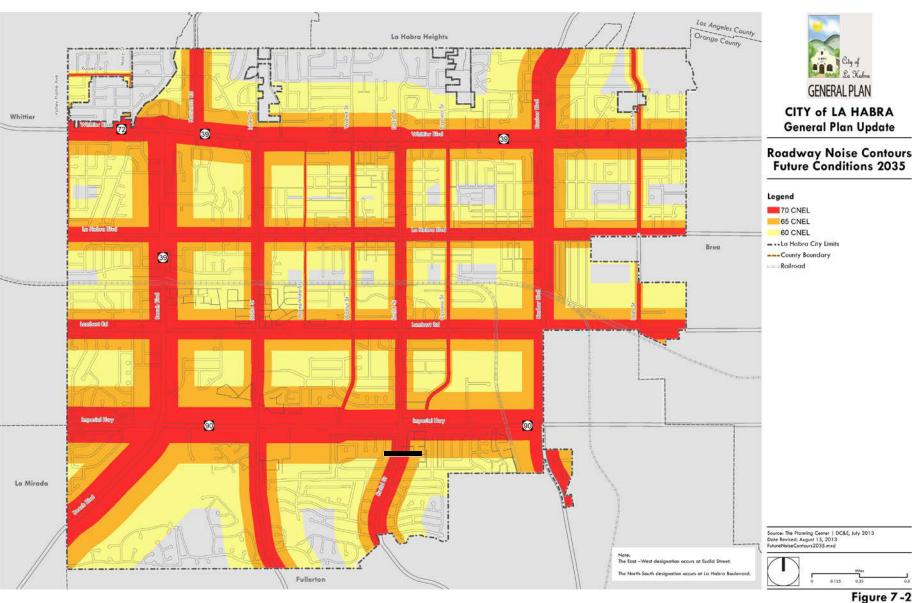


Table 7-1	Land Use Compatibility with	ı Commui	nity Noi	ise Envir	onments			
Land Us	se Categories and Uses			Compatil	ble Land U	se Zones		
CATEGORIES	Uses	CNEL <55	55- 60	60-65	65-70	70-75	75- 80	CNEL >80
Residential	Single Family, Duplex, Multiple Family	Α	А	В	В	С	D	D
	Mobile Home	Α	Α	В	С	С	D	D
Commercial Regional, District	Hotel, Motel, Transient Lodging	Α	А	В	В	С	С	D
Commercial Regional, Village District, Special	Commercial Retail, Bank, Restaurant, Movie Theater	A	А	A	А	В	В	С
Commercial, Industrial, Institutional	Office Building, Research and Development, Professional Offices, City Office Building	A	А	A	В	В	С	D
Commercial Recreation Institutional Civic Center	Amphitheater, Concert Hall, Auditorium, Meeting Hall	В	В	С	С	D	D	D
Commercial Recreation	Children's Amusement Park, Miniature Golf Course, Go-cart Track, Equestrian Center, Sports Club	A	А	А	В	В	D	D
Commercial General, Special Industrial, Institutional	Automobile Service Station, Auto Dealership, Manufacturing, Warehousing, Wholesale, Utilities	A	A	A	A	В	В	В
Institutional General	Hospital, Church, Library, Schools' Classroom, Day Care	А	А	В	С	С	D	D
	Parks	Α	Α	Α	В	С	D	D
Open Space	Golf Course, Cemeteries, Nature Centers, Wildlife Reserves, Wildlife Habitat	А	А	А	А	В	С	С
Agriculture	Agriculture	Α	Α	Α	Α	Α	Α	Α

SOURCE: California Governor's Office of Planning and Research, General Plan Guidelines 2003, Appendix C (Guidelines for the Preparation and Content of the Noise Element of the General Plan) (October 2003).

INTERPRETATION:

Zone A Clearly Compatible: Specified land use is satisfactory, based upon the assumption that any buildings involved are of normal conventional construction without any special noise insulation requirements.

Zone B Compatible with Mitigation: New construction or development should be undertaken only after detailed analysis of the noise reduction requirements are made and needed noise insulation features in the design are determined. Conventional construction, with closed windows and fresh air supply systems or air conditioning, will normally suffice. Note that residential uses are prohibited with Airport CNEL greater than 65.

Zone C Normally Incompatible: New construction or development should generally be discouraged. If new construction or development does proceed, a detailed analysis of noise reduction requirements must be made and needed noise insulation features included in the design.

Zone D Clearly Incompatible: New construction or development should generally not be undertaken.

N 1.2 Noise Standards. Require noise attenuation for residential development where the projected exterior and interior noise levels exceed those shown in Table 7-2 (Residential Exterior and Interior Noise Standards).

Table 7-2 Residential Exterior and Interior Noise Standards										
	Exterior Noise Levels	Interior Noise Levels								
7:00 am to 10:00 pm	55 dBA	55 dBA								
10:00 pm to 7:00 am	50 dBA	45 dBA								

SOURCE: City of La Habra, La Habra Municipal Code, Noise Ordinance Section 9.32.050 and Section 9.32.060.

- N 1.3 Noise Studies for New Development. Require an acoustical study for all new residential developments that lie within the 65 dBA noise contour based on projections of future noise conditions resulting from the Plan's traffic increases to ensure indoor levels will not exceed City standards. In addition, the City will continue to enforce the California Building Code for indoor noise levels.
- N 1.4 Noise Attenuation through Building Design. Require measures that attenuate exterior and/or interior noise levels to acceptable levels to be incorporated into all development projects where current and/or future noise levels may be unacceptable.
- N 1.5 Noise Attenuation through Site Design. Require noise reduction features to be used in the site planning process for new projects where current and/or future noise levels may be unacceptable. The focus of these efforts will be site design techniques. Techniques include:
 - Designing landscaped building setbacks to serve as a buffer between the noise source and receptor.
 - Placing noise-tolerant land uses such as parking lots, maintenance facilities, and utility areas between the noise source and receptor.
 - Orienting buildings to shield noise-sensitive outdoor spaces from a noise source.
 - Locating bedrooms or balconies on the sides of buildings facing away from noise sources.
 - Utilizing noise barriers (e.g., fences, walls, or landscaped berms) to reduce adverse noise levels in noise-sensitive outdoor activity areas.
- N 1.6 Noise Between Adjacent and Mixed Uses. Require that mixed-use and multi-family residential developments demonstrate adequate isolation of noise between adjacent uses through building design and location of loading areas, parking lots, driveways, trash enclosures, mechanical equipment, and other noise sources away from the residential portion of the development.

- N 1.7 Interior Vibration Standards. Require construction projects anticipated to generate a significant amount of vibration to ensure acceptable interior vibration levels at nearby residential and commercial uses based on current City or Federal Transit Administration (FTA) criteria.
- **N 1.8 Construction Noise.** Require development projects subject to discretionary approval to assess potential construction noise impacts on nearby sensitive uses and to minimize impacts on these uses, to the extent feasible.

Goal N 2

Mobile Noise Sources. Minimized noise impacts of motor vehicle traffic on sensitive receptors.

Policies

- N 2.1 State Motor Vehicle Noise Standards. Encourage the enforcement of State motor vehicle noise standards for cars, trucks, and motorcycles through coordination with the California Highway Patrol and La Habra Police Department.
- **N 2.2 Municipal Fleet.** Purchase municipal vehicles and equipment with low noise generation and maintain them to minimize noise.
- N 2.3 Roadway Noise Sensitivity Measures. Ensure the implementation of noise attenuation measures in the design of roadway improvements consistent with funding capability.
- **N 2.4** Roadway Construction. Minimize transportation noise through street and right-of-way design or route coordination including reducing speed limits or planting street trees along high-volume arterials.
- **N 2.5 Train Operations.** Work with the railroad company to ensure that they mitigate train operations and noise levels to the extent feasible as to not adversely impact adjoining residential neighborhoods including incorporation of mitigating buffers or other noise abatement improvements.

Goal N 3

Stationary Noise Sources. Minimized noise impacts of non-transportation-related sources on sensitive receptors.

Policies

N 3.1 Protection from Stationary Noise Sources. Continue to enforce interior and exterior noise standards to ensure that sensitive noise receptors are not exposed to excessive noise levels from stationary sources such as machinery, equipment fans, and air conditioning equipment.

- N 3.2 High-Noise Generating Uses. Require that bars, clubs, entertainment venues, and other uses characterized by high levels of patronage and activity be constructed and designed consistent with the City's noise standards to isolate noise to the interiors and limit perceptible exterior noise.
- N 3.3 Compatibility with Parks and Recreation Uses. Limit the hours of operation for parks and active recreation uses in residential areas to minimize disturbances to residents.
- **N 3.4** Regulation of Sound-Amplifying Equipment. Continue to regulate the use of sound-amplifying equipment to prevent impacts on sensitive receptors.
- N 3.5 Construction Activity Hours. Continue to enforce restrictions on the hours of construction activity to minimize impacts of noise and vibration on adjoining uses from the use of trucks, heavily drilling equipment, and other heavy machinery.



Chapter 9.32 NOISE CONTROL

9.32.010 Declaration of policy.

- A. In order to control unnecessary, excessive and annoying sounds emanating from areas of the city, it is declared to be the policy of the city to prohibit such sounds generated from all sources as specified in the ordinance codified in this chapter.
- B. It is determined that certain sound levels are detrimental to the public health, welfare and safety, and contrary to public interest, therefore, the city council does ordain and declare that creating, maintaining, causing or allowing to create, maintain or cause any noise in a manner prohibited by or not in conformity with the provisions of this chapter, is a public nuisance and shall be punishable as such. (Ord. 923 § 1(A), 1975; Ord. 880 § 1, 1973)

9.32.020 Definitions.

The following words, phrases and terms, as used in the ordinance codified in this chapter, shall have the meaning as indicated in this section:

- A. "Ambient noise level" means the all-encompassing noise level associated with a given environment, being a composite of sounds from all sources, excluding the alleged offensive noise, at the location and approximate time at which a comparison with the alleged offensive noise is to be made.
- B. "Cumulative period" means an additive period of time composed of individual time segments which may be continuous or interrupted.
- C. "Decibel" (dB) means a unit which denotes the ratio between two quantities which are proportional to power: the number of decibels corresponding to the ratio of two amounts of power is ten times the logarithm to the base ten of this ratio.
- D. "Emergency machinery, vehicles or work" means any machinery vehicle or work used, employed or performed in an effort to protect, provide or restore safe conditions in the community or for the citizenry, or work by private or public utilities when restoring utility service.
- E. "Fixed noise source" means a stationary device which creates sounds while fixed or motionless, including, but not limited to, industrial and commercial machinery and equipment, pumps, fans, compressors, generators, air conditioners and refrigeration equipment.
- F. "Grading" means any excavating or filling of earth material or any combination thereof conducted to prepare a site for construction or other improvements thereon.

- G. "Impact noise" means the noise produced by the collision of one mass in motion with a second mass which may be either in motion or at rest.
- H. "Licensed" means the issuance of a formal license or a permit by the appropriate jurisdictional authority, or where no permits or licenses are issued, the sanctioning of the activity by the jurisdiction as noted in public records.
 - I. "Mobile noise source" means any noise source other than a fixed source.
- J. "Noise level" means the "A" weighted sound pressure level in decibels obtained by using a sound level meter at slow response with a reference pressure of twenty micro-newtons per square meter. The unit measurement shall be designated as dB(A).
- K. "Noise variance board" means an administrative board of five members appointed by the board of supervisors of the county of Orange, per Title 4, Division 6, Article 1 of the codified ordinances of the county of Orange.
- L. "Person" means a person, firm, association, co-partnership, joint venture, corporation, or any entity, public or private in nature.
- M. "Simple noise tone" means a noise characterized by a predominant frequency or frequencies so that other frequencies cannot be readily distinguished.
- N. "Sound level meter" means an instrument meeting American National Standard Institutes Standards S1.4-1971 for Type 1 or Type 2 sound level meters or an instrument and the associated recording and analyzing equipment which will provide equivalent data.
- O. "Sound pressure level" of a sound, in decibels, means twenty times the logarithm to the base ten of the ratio of the pressure of the sound to a reference pressure, which reference pressure shall be explicitly stated.
- P. "Residential property" means a parcel of real property which is zoned, developed, and used for residential purposes, other than transient uses such as hotels and motels. (Ord. 923 § 1(B), (C), (D), 1975; Ord. 880 § 2, 1973)

9.32.030 Noise level measurement criteria.

Any noise level measurements made pursuant to the provisions of this chapter shall be performed using a sound level meter as defined in subsection N of Section 9.32.020. (Ord. 880 § 3, 1973)

9.32.040 Assignment of residential properties to noise zones.

The residential properties described in this section are assigned to the following noise zones:

Noise Zone 1: All residential properties, whether incorporated or unincorporated. (Ord. 923 § 1(E), 1975; Ord. 880 § 4, 1973)

9.32.050 Noise standards—Exterior.

A. The following noise standards, unless otherwise specifically indicated, shall apply to all residential property within a designated noise zone:

Noise Standards

Noise Zone	Noise Level	Time Period
1	55 dB(A)	7:00 a.m.—10:00 p.m.
	50 dB(A)	10:00 p.m.—7:00 a.m.

- B. It is unlawful for any person at any location within the incorporated area of the city to create any noise, or to allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, which causes the noise level, when measured on any other residential property either incorporated or unincorporated, to exceed:
- 1. The noise standard for a cumulative period of more than thirty minutes in any hour; or
- 2. The noise standard plus five dB(A) for a cumulative period of more than fifteen minutes in any hour; or
- 3. The noise standard plus ten dB(A) for a cumulative period of more than five minutes in any hour; or
- 4. The noise standard plus fifteen dB(A) for a cumulative period of more than one minute in any hour; or
 - 5. The noise standard plus twenty dB(A) for any period of time.
- C. In the event the ambient noise level exceeds any of the five noise limit categories set forth in subsection B1 through B5 of this section, the cumulative period applicable to the category shall be increased to reflect the ambient noise level. Furthermore, the maximum permissible noise level shall never exceed the maximum ambient noise level.
- D. Each of the noise limits specified in subsection A shall be reduced by five dB(A) for impact or simple tone noises, or for noises consisting of speech or music. (Ord. 923 § 1(F), 1975; Ord. 880 § 5, 1973)

9.32.060 Noise standards—Interior.

A. The following noise standards, unless otherwise specifically indicated, shall apply to all residential property within a designated noise zone:

Noise Standards

Noise Zone	Noise Level	Time Period
1	55 dB(A)	7:00 a.m.—10:00 p.m.
	45 dB(A)	10:00 p.m.—7:00 a.m.

- B. It is unlawful for any person at any location within the incorporated area of the city to create any noise, or to allow the creation of any noise on property owned, leased, occupied or otherwise controlled by such person, which causes the noise level, when measured within any other dwelling unit on any residential property to exceed:
- 1. The noise standard for a cumulative period of more than five minutes in any hour; or
- 2. The noise standard plus five dB(A) for a cumulative period of more than one minute in any hour; or
 - 3. The noise standard plus ten dB(A) for any period of time.
- C. In the event the ambient noise level exceeds any of the three noise limit categories set forth in subsection A1 through A3 of this section, the cumulative period applicable to the category shall be increased to reflect the ambient noise level. Furthermore, the maximum permissible noise level shall never exceed the maximum ambient noise level.
- D. Each of the noise limits specified in subsection A shall be reduced by five dB(A) for impact or simple tone noises, or for noises consisting of speech or music. (Ord. 923 § 1(G), 1975; Ord. 880 § 6, 1973)

9.32.070 Activities exempt from chapter provisions.

The following activities shall be exempted from the provisions of this chapter except as regulated under Sections 12.28.090 and 12.28.100 of this code:

- A. School bands, school athletic and school entertainment events;
- B. Outdoor gatherings, public dances, shows and sporting and entertainment events provided the events are conducted pursuant to a permit issued by the city pursuant to Chapter 5.32 relative to the staging of said events;

- C. Activities conducted on public parks, public playgrounds, and public or private school grounds;
- D. Any mechanical device, apparatus or equipment used, related to or connected with emergency machinery, vehicle or work;
- E. Noise sources associated with construction, repair, remodeling, or grading of any real property, provided the activities do not take place between the hours of eight p.m. and seven a.m. on weekdays, including Saturday, or at any time on Sunday or a federal holiday;
- F. All mechanical devices, apparatus or equipment which are utilized for the protection or salvage of agricultural crops during periods of potential or actual frost damage or other adverse weather conditions;
- G. Mobile noise sources associated with agricultural operations provided such operations do not take place between the hours of eight p.m. and seven a.m. on weekdays, including Saturday or at any time on Sunday or a federal holiday;
- H. Mobile noise sources associated with agricultural pest control through pesticide application; provided, that the application is made in accordance with restricted material permits issued by or regulations enforced by the agricultural commissioner;
- I. Noise sources associated with the maintenance of real property provided the activities take place between the hours of seven a.m. and eight p.m. on any day except Sunday or federal holiday, or between the hours of nine a.m. and eight p.m. on Sunday or federal holiday;
- J. Any activity to the extent regulation thereof has been preempted by state or federal law. (Ord. 1367 § 1, 1989; Ord. 923 § 1(H), 1975)

9.32.080 Noise level—Near schools, hospitals and churches.

It is unlawful for any person to create any noise which causes the noise level at any school, hospital or church while the same is in use, to exceed the noise limits as specified in Section 9.32.050 prescribed for the assigned noise zone in which the school, hospital or church is located, or which noise level unreasonably interferes with the use of such institutions or which unreasonably disturbs or annoys patients in the hospital, provided conspicuous signs are displayed in three separate locations within one-tenth of a mile of the institution indicating the presence of a school, church or hospital. (Ord. 923 § 1, 1975; Ord. 880 § 9, 1973)

9.32.090 Noise level—Location of measurement.

The location selected for measuring exterior noise levels shall be at any point on the affected residential property. Interior noise measurement shall be made within the affected residential unit. The measurement shall be made at a point at least four feet from the wall, ceiling or floor nearest the noise source. (Ord. 923 § 1, 1975; Ord. 880 § 11, 1973)

9.32.100 Enforcement authority—Interference with prohibited.

- A. The county health officer and his/her duly authorized representatives are directed to enforce the provisions of this chapter. The county health officer and his/her duly authorized representatives are authorized, pursuant to Penal Code Section 836.5, to arrest any person without a warrant when they have reasonable cause to believe that such person has committed a misdemeanor in their presence.
- B. No person shall interfere with, oppose or resist any authorized person charged with enforcement of this chapter while such person is engaged in the performance of his/her duty. (Ord. 923 § 1, 1975; Ord. 880 § 12, 1973)

9.32.110 Variance—Application—Fee—Applicants remain subject to prosecution.

- A. The owner or operator of a noise source which violates any of the provisions of this chapter may file an application with the health officer for a variance from the provisions thereof wherein the owner or operator shall set forth all actions taken to comply with the provisions, the reasons why immediate compliance cannot be achieved, a proposed method of achieving compliance, and a proposed time schedule for its accomplishment. The application shall be accompanied by a fee as set by resolution of the city council and on file in the office of the city clerk. A separate application shall be filed for each noise source; provided, however, that several mobile sources under common ownership, or several fixed sources on a single property may be combined into one application.
- B. Upon receipt of the application and fee, the health officer shall refer it with his/her recommendations thereon within thirty days to the noise variance board for action thereon in accordance with the provisions of this chapter.
- C. An applicant for a variance shall remain subject to prosecution under the terms of this chapter until a variance is granted. (Ord. 1213 §§ 2, 3, 1983; Ord. 923 § 1, 1975; Ord. 880 § 13, 1973)

9.32.120 Variance—Authority to grant—Terms and conditions—Violation unlawful.

The noise variance board shall evaluate all applications for variance from the requirements of this chapter and may grant the variances with respect to time for compliance, subject to such terms, conditions and requirements as it may deem reasonable to achieve maximum compliance with the provisions of this chapter. The terms, conditions and requirements may include, but shall not be limited to, limitations on noise levels and operating hours. Each such variance shall set forth in detail the approved

method of achieving maximum compliance and a time schedule for its accomplishment. In its determinations the board shall consider the magnitude of nuisance caused by the offensive noise; the uses of property within the area of impingement by the noise; the time factors related to study, design, financing and construction of remedial work; the economic factors related to age and useful life of equipment; and the general public interest and welfare. Any variance granted by the board shall be by resolution and shall be transmitted to the health officer for enforcement. Any violation of the terms of the variance shall be unlawful. (Ord. 923 § 1, 1975; Ord. 880 § 14, 1973)

9.32.130 Variances—Appeals.

- A. Within fifteen days following the decision of the variance board on an application the applicant, the health officer, or any member of the city council, may appeal the decision to the city council by filing a notice of appeal with the secretary of the variance board. In the case of an appeal by the applicant for a variance, the notice of appeal shall be accompanied by a fee to be computed by the secretary on the basis of the estimated cost of preparing the materials required to be forwarded to the city council as discussed hereafter in this section. If the actual cost of such preparation differs from the estimated cost, appropriate payments shall be made either to or by the secretary.
- B. Within fifteen days following receipt of a notice of appeal and the appeal fee, the secretary of the variance board shall forward to the city council copies of the application for variance; the recommendation of the health officer; the notice of appeal; and all evidence concerning the application received by the variance board and its decision thereon. In addition, any person may file with the city council written arguments supporting or attacking the decision and the city council may in its discretion hear oral arguments thereon. The city clerk shall mail to the applicant a notice of the date set for hearing of the appeal. The notice shall be mailed at least ten days prior to the hearing date.
- C. Within sixty days following its receipt of the notice of the appeal, the city council shall either affirm, modify or reverse the decision of the variance board. Such decision shall be based upon the city council's evaluation of the matters submitted to the city council in light of the powers conferred on the variance board and the factors to be considered, both as enumerated in Sections 9.32.110 and 9.32.120. As part of its decision the council may direct the variance board to conduct further proceedings on the application. Failure of the city council to affirm, modify or reverse the decision of the variance board within the sixty-day period shall constitute an affirmance of the decision. (Ord. 923 § 14, 1975)

D-19

U. S. DOT CROSSING INVENTORY FORM

DEPARTMENT OF TRANSPORTATION

FEDERAL RAILROAD ADMINISTRATION OMB No. 2130-0017

Instructions for the initial reporting of the following types of new or previously unreported crossings: For public highway-rail grade crossings, complete the entire inventory												
Form. For private hig	ghway-ra	il grade crossi	ngs, compl	ete the Hea	der, Pai	rts I and	II, aı	nd the S	ubmission Informatio	n section. For p	oublic pathway g	grade crossings (including
pedestrian station grade crossings), complete the Header, Parts I and II, and the Submission Information section. For Private pathway grade crossings, complete the Header,												
Parts I and II, and the	Submiss	sion Informatio	n section. I	or grade-se	parated	highway	-rail (or pathw	ay crossings (including	g pedestrian sta	tion crossings), o	complete the Header, Part
I, and the Submission	n Inform	ation section.	For change	es to existin	g data,	complet	e the	Header,	Part I Items 1-3, and	d the Submissio	on Information s	ection, in addition to the
updated data fields. N	Note: For	private crossir	ngs only, Pa	rt I Item 20	and Par	t III Item	2.K. a	are requi	red unless otherwise	noted.	An asterisk * o	denotes an optional field.
A. Revision Date		B. Reporting A	Agency	C. R	eason fo	r Updat	e (Sel	lect only	one)			D. DOT Crossing
(MM/DD/YYYY)		■ Railroad	☐ Tra	nsit 🗷 C	hange ir	ı	lew		Closed	□ No Train	☐ Quiet	Inventory Number
09 / 22 / 2012				Data	a .	Cro	ssing			Traffic	Zone Update	
		☐ State	☐ Oth	er 🗆 R	e-Open		ate		Change in Primary	\square Admin.		761449C
					•	Cha	nge C	Only C	perating RR	Correction		
				Part I: L	ocatio	n and	Cla	-	tion Informatio	n		
1. Primary Operating	1. Primary Operating Railroad 2. State 3. County											
Union Pacific Railro						CALIFO	DRNI	Α		ORANGE		
4. City / Municipality	,		5. Stre	et/Road Na	me & Bl	ock Nun	her			6. Highway Ty	ne & No.	
In I				ERIAL HW		oun mun		1		or mgmuy ry	pc & 1101	
□ Near LA HAB	RA		(Stree	t/Road Nan	 ne)			1 * (Bloc	k Number)	STATE90		
7. Do Other Railroads	s Operat	e a Separate T		•		lo	8. C		Railroads Operate Ov	ver Your Track a	at Crossing?	Yes ⊠ No
If Yes, Specify RR								Yes, Spe	-			
, ,		,						,	- /	,		,
9. Railroad Division o	r Regior)	10. Railro	d Subdivisi	on or Di	strict		11. Bra	nch or Line Name		12. RR Milepos	t
	-0 -										0506	
□ None LOS AN	NGELES	3	☐ None	BREA C	HEM IN	ID		☐ Non	e		(prefix) (nnn	n.nnn) (suffix)
13. Line Segment		14. Near	rest RR Tim	etable	15.	Parent l	RR (ii	f applicat	nle)	16. Crossin	g Owner (if appl	, , , ,, ,
*		Station	*				1,		-,		3 () - -	,
BBJ506.14C						N/A				□ N/A		
17. Crossing Type	18. Cro	ssing Purpose	19. Cro	sing Positio	n 2	0. Public	Acce	ess	21. Type of Train	<u> </u>		22. Average Passenger
<i>o </i>	■ High	• .	■ At G	-		if Private	Cros	sing)	☐ Freight	□ Transit		Train Count Per Day
■ Public	☐ Path	way, Ped.	☐ RR U	nder	,	_ ☐ Yes		3,	☐ Intercity Passeng	er 🗆 Shared	Use Transit	☐ Less Than One Per Day
☐ Private		ion, Ped.	□ RR O			□No			☐ Commuter	☐ Tourist		□ Number Per Day 0
23. Type of Land Use												•
☐ Open Space	☐ Farm	☐ Resi	idential	☐ Comm	nercial	X	ndus	trial	☐ Institutional	☐ Recreation	nal 🗆 RR	Yard
24. Is there an Adjace	ent Cross	sing with a Sep	arate Num	ber?		25. Q	uiet 2	Zone (Fl	RA provided)			
•												
☐ Yes ☐ No If Y	Yes, Prov	vide Crossing N	umber			■ No		24 Hr	☐ Partial ☐ Chicag	go Excused	Date Establish	ned
26. HSR Corridor ID		27. Latit	ude in deci	mal degrees	s		28.	Longitud	le in decimal degrees	1	29. Lat	t/Long Source
				-	04000	4.0		_	- 44-	7.0000010		_
	_□ N/A	(WGS84	std: nn.nr	nnnnn) 33	.91690 ⁻	10	(W	GS84 std:	-nnn.nnnnnnn) ⁻¹¹	7.9280010	☐ Acti	ual 🗆 Estimated
30.A. Railroad Use	*							31.A. S	tate Use *			
30.B. Railroad Use 3	*							31.B. 9	tate Use *			
30.C. Railroad Use *	*							31.C. S	tate Use *			
30.D. Railroad Use	*							31.D. 9	tate Use *			
32.A. Narrative (Rail	lroad Us	e) *						32.B. N	larrative (State Use)	*		
33. Emergency Notifi	cation T	elephone No. ((posted)	34. Rai	Iroad Co	ntact (7	elepl	hone No.,		35. State Con	tact (Telephone	No.)
000 040 0715										445 702 270	22	
800-848-8715										415-703-372	.z 	
					Part	II: Rail	roa	d Info	mation			
1. Estimated Number	of Daily	Train Moveme	ents									
1.A. Total Day Thru T			otal Night T	hru Trains	1 C T	otal Swit	chine	Trains	1.D. Total Transit	Trains	1.E. Check if Le	ss Than
(6 AM to 6 PM)	Tunis		to 6 AM)	ina manis	1.0.1	otal Swit		, mains	1.D. Total Transit	1141113	One Movemen	
0		0	to o Aivij		10						How many trai	<u>-</u>
2. Year of Train Count	t Data /V	VVV)		3. Speed of	Train at	Crossing	7			<u>:</u>	How many trai	113 per week:
2. Tear of Train Count	L Data (1	111)		3.A. Maxim				(mnh) 1	0			
				3 R Typical	Sneed F	Sange Or	or Cr	nesing /n	<i>nph)</i> From 10	to 10		
4. Type and Count of	Tracks			J.D. Typical	эрссит	tarige Ot	CI CI	0331118 (11	<i>ipiij</i> 110iii	_ to		
4. Type and Count of	Hacks											
Main 0	Siding	Va	ard	Trans	cit		Indi	ıstry				
5. Train Detection (M					JIC		mac	23ti y				
☐ Constant Warn			Detection	□AFO □	PTC [[]	X DC	□ O	ther \Box	None			
6. Is Track Signaled?	0		_ 0.0001011			ent Rec					7.B. Remote	Health Monitoring
☐ Yes ■ No						Yes \square					☐ Yes ☐	•

U. S. DOT CROSSING INVENTORY FORM

A. Revision Date (N 09/22/2012	лм/DD/YYYY)				P.	AGE 2			D. 761	Crossing Inve	ntory Nun	n ber (7 c	har.)	
00/22/2012		Part	III: Highwa	v or Pat	hwav	Traffic C	Control De	vice						
1. Are there	2. Types of P	assive Traffic Co		•										
Signs or Signals?	2.A. Crossbuc	ck 2.B. S	TOP Signs (R1	1) 2.C. \	YIELD Sig	ns (R1-2)			_	igns (Check al			•	☐ None
■ Yes □ No	Assemblies (d	0		(cour	יונ)		■ W10-1 _ □ W10-2 _			□ W10-4			/10-11 /10-12	
2.E. Low Ground Cl (W10-5)	J	2.F. Paveme	nt Markings			2.G. Char Devices/I	nnelization Medians			2.H. EXEMP (R15-3)	T Sign	2.I. ENS Display	S Sign <i>(I-13)</i> ed	
☐ Yes (count)	Stop Lines		ynamic En	velope	☐ All App		☐ Med		☐ Yes		☐ Yes		
☐ No 2.J. Other MUTCD S	lans	RR Xing S		None		One A		Non		□ No hanced Signs	/list tunos	□ No		
Specify Type		Count				Signs (if p	ite Crossing orivate)	Z.L.	ביט בוו	manced Signs	(List types	,		
Specify Type		Count				☐ Yes [□No							
Specify Type		Count					_ 1 10							
3. Types of Train A	ctivated Warni	ng Devices at th	e Grade Crossi	ing (specify	count o	f each devi	ce for all that	apply)					
3.A. Gate Arms	3.B. Gate Cor	nfiguration		ntilevered		<i>ged)</i> Flashir	ng Light			Mounted Flash	ning Lights		3.E. Total	
(count)	□ 2 Oad	□ Full (Dameia		ures (count)						nasts) <u>4</u>			Flashing Li	ght Pairs
Roadway 0	☐ 2 Quad ☐ 3 Quad	☐ Full (Barrie Resistance	r) Over i	raffic Lane		_	candescent		ncande	scent hts Included	☐ LED ☐ Side	Lights	_	
Pedestrian	☐ 4 Quad	☐ Median Ga	tes Not Ov	er Traffic L	ane 0	□ LE	D		ack Lig	nts included	Include	_	0	
3.F. Installation Dat	e of Current		3.G. Waysid	de Horn					3.H. H	lighway Traffi	c Signals C	ontrollin	g 3.I. Be	lls
Active Warning Dev			☐ Yes	Installed or	. //////	'VVV)	J		Crossi	•			(count	:)
/	⊔	Not Required	□ No	inistaneu oi	1 (141141) 1	''''		-	□ Yes	s I ■ No			4	
3.J. Non-Train Activ ☐ Flagging/Flagma	J	Operated Signal	s 🗆 Watchma	n 🗆 Floodl	lighting	□ None				Flashing Light				
4.A. Does nearby H	wy 4.B. Hwy	y Traffic Signal	4.C. Hwy Tr	affic Signal	Preemp	tion	5. Highway Ti						oring Devic	es
Intersection have	Intercon	-	'	☐ Yes ☐ N				_				ck all that apply)		
Traffic Signals?		nterconnected										Photo/Video Recording		
☐ Yes ☐ No		raffic Signals Varning Signs		_										tection
□ 1e3 □ NO	1 101 4	varriirig Sigris	Huvanice		Dhyei	<u> </u>								
1 Troffic Laures Cue	asia a Dailean d	□ O	- tt: -				acteristic		- D	C++7	A la Cua	: III.	:td2 /	Chunch
Traffic Lanes Cro Number of Lanes		☐ Two-way T	raffic	2. Is Roa Paved?	•	atriway □ No	3. Does Tr	ack kui	II ⊠ II		lights wi	thin appı	minated? (: rox. 50 feet ; es	from
Crossing Surface													:	
☐ 1 Timber ■☐ 8 Unconsolidate	2 Asphalt □	3 Asphalt and	Timber 🗆	4 Concrete						r 🗆 7 Me				
6. Intersecting Roa	dway within 50	00 feet?				7. Smalle	st Crossing Ar	ngle			8. Is Commercial Power Available? *			ilable? *
□ Yes 🗷 No	If Yes, Approxii	mate Distance (feet)			□ 0° – 29° □ 30° – 59° ■ 60° - 90°			¥ Yes □ No					
			P	art V: Pu	ıblic H	lighway	Informati	ion						
1. Highway System		T	2. Functional C						s Cross	sing on State I	Highway	4. H	Highway Spe	ed Limit
0 1,1,1				☐ (0) Rur			O		tem?	0	0 -7	MPH		
	tate Highway S	•	(1) Interstat			(5) Major	Collector	¥ Yes □ No □ Posted □ Statutory				Statutory		
	Nat Hwy Syste al AID, Not NHS		 □ (2) Other Fr □ (3) Other Pr 				Collector	5. L	inear l	Referencing Sy	ystem (LRS	Route IL	D) *	
☐ (03) Feder	•		(3) Other Pi			(7) Local	Collector	6. L	RS Mil	epost *				
7. Annual Average Year 1988 AA	Daily Traffic <i>(A</i> DT 032000		timated Percen			gularly Used	d by School Bu Average Nui		er Day	0	10. □ Y	_	ncy Services No	Route
Submi	ission Infor	mation - Th	is informatio	on is used	l for ac	lministra	tive purpos	ses an	nd is n	ot availabl	e on the	public	website.	
Submitted by			Organ	nization						Phone		D	ate	
Public reporting bu	rden for this inf	formation collec	tion is estimate	ed to avera					he tim			ons, sear	ching existi	ng data
sources, gathering		-	•	-	_					• .			-	
agency may not cor displays a currently	•	•	•	-	•		•	•			-			
other aspect of this											_	-		-
Washington, DC 20		5.2	J				. ,	0 4				,	. , = 5	

FORM FRA F 6180.71 (Rev. 3/15)

My AirNav

Airport Search Results

17 airports found near La Habra, CA

	ID	CITY	AIRPORT NAME	WHERE
\rightarrow	FUL	FULLERTON, CA	FULLERTON MUNICIPAL AIRPORT	4.0 nm SW
-	7L5	${\it CITY\ OF\ INDUSTRY,\ CA}$	L A COUNTY SHERIFF'S DEPARTMENT HELIPORT	4.4 nm N
**	9CA3	${\it CITY\ OF\ INDUSTRY,\ CA}$	RECREATION AND CONFERENCE CENTER HELIPORT	5.3 nm N
-	40CA	${\it CITY\ OF\ INDUSTRY,\ CA}$	CITY OF INDUSTRY CIVIC FINANCIAL CENTER HELIPORT	5.6 nm N
<u> </u>	31CL	WHITTIER, CA	PRESBYTERIAN INTERCOMMUNITY HOSPITAL HELIPORT	5.7 nm WNW
•	CL87	${\it CITY\ OF\ INDUSTRY,\ CA}$	HADDICKS HELIPORT	5.9 nm N
-	84L	NORWALK, CA	NORWALK SHERIFF STATION HELIPORT	6.3 nm W
-	CN43	ANAHEIM, CA	ANAHEIM CANYON TOWER HELIPORT	6.4 nm SE
-	83L	NORWALK, CA	SOUTHEAST SUPERIOR COURT HELIPORT	6.5 nm W
-	3CN4	ANAHEIM, CA	KAISER PERMANENTE ANAHEIM MEDICAL CENTER HELIPORT	6.9 nm SE
-	6CN5	${\it CITY\ OF\ INDUSTRY,\ CA}$	LOS ALTOS HELIPORT	7.8 nm NNW
-	CL45	ANAHEIM, CA	NORTH NET FIRE TRAINING HELIPORT	8.8 nm SSE
-	1CL4	ORANGE, CA	UCI MEDICAL CENTER HELIPORT	9.0 nm SSE
-	6CA2	ROSEMEAD, CA	SCE ROSEMEAD HELIPORT	9.9 nm NW
-	4CA5	ORANGE, CA	CHILDRENS HOSPITAL OF ORANGE COUNTY HELIPORT	9.9 nm SSE
-	CL75	ROSEMEAD, CA	ROBERT D CLOUD HELIPORT	9.9 nm NW
-	CL55	ORANGE, CA	SCE SERRANO SUBSTATION HELIPORT	9.9 nm SE

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