Model Noise Control Ordinance
Preamble to
Model Community
Noise Control
Ordinance

This model noise control ordinance was
drafted by the U.S. Environmental Protection Agency
and the National Institute of Municipal Law Officers.

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U.S. Environmental Protection Agency
Washington, D.C. 20460
INTRODUCTION

Purpose

The Model Community Noise Control Ordinance (model ordinance) is intended to be a basic tool which communities, both large and small, can use to construct noise control ordinances suited to local needs and conditions. The complete model ordinance, including optional provisions, is perhaps most suitable for larger communities, with populations of about 100,000 or more. Smaller communities and large communities with limited resources may wish to adopt only those provisions which address their most pressing noise problems. It is important that the community ensure that all provisions adopted are realistic in relation to local needs and conditions; that all provisions are consistent with one another, with other local law, and with State and Federal law; and, finally, that all provisions are clear and otherwise well drafted so that enforcement problems will be minimized.

Background

This model ordinance is an outgrowth of the Federal Noise Control Act of 1972 (49 U.S.C. §§ 4901 et seq.) and the tremendous increase in interest regarding noise abatement and control which the Act has precipitated. Many existing community noise ordinances are based on outdated model ordinances and/or the common law approach to noise control which relies exclusively on difficult to enforce nuisance provisions. While the model ordinance preserves common law with Article VI provisions prohibiting noise disturbances, it also contains definitive performance standards for motor vehicles and other sources of community noise. The increase in reliable monitoring equipment available to local governments, coupled with definitive standards incorporated into local noise control ordinances, should result in ordinances which are more easily enforceable than many have been in the past.

It is anticipated that an analogous model ordinance will form part of a workbook on community noise abatement and control to be published by the U.S. Environmental Protection Agency during late 1972. In addition to containing the model ordinance (perhaps with discussions of a number of alternative provisions), the workbook may contain chapters on the legal basis of noise control, the health effects of noise and various enforcement approaches.

Although the model ordinance will stand alone as a legal document, for preparatory enforcement the City/County must additionally have a code of recommended practices or rules and regulations which give general specifications for sound measuring equipment and measurement methodologies. This document should also provide detailed procedures for measurements to be taken for certain provisions of the ordinance, such as motor vehicles and stationary sources. To assist communities in the development of a code of recommended practices, EPA is preparing a model code which, when completed, will be sent to recipients of the model ordinance.

Interrelationship of Various Provisions

An overview of the model ordinance can most readily be obtained by reading the List of Provisions. When a community determines which activities it wishes to regulate, the appropriate model provision or provisions can be located by referring to this list.

A glance through the List of Provisions suggests that certain acts may be prohibited by more than one provision. For example, use of a noisy go-cart could violate Section 9.3 ("Recreational Vehicles Operating Off Public Rights-Of-Way"), as well as Section 6.1 (Noise Disturbances). It may be that a community desires such multiple coverage. In this case, enforcement against the owner or operator of a noisy go-cart would probably come under the provision more easily enforced, but could come under both provisions violated, at the discretion of the enforcement agency. If a community does not desire such multiple coverage, it can either omit certain provisions or it can exempt acts covered by other provisions from multiple coverage. Such modifications deserve careful consideration, however, so that they do not modify the ordinance more than desired or otherwise jeopardize enforcement.

GENERAL PROVISIONS

Policy Regarding Levels

In this model ordinance, recommended values for sound levels in the performance standards have been omitted in most cases. Suggested times for the curfews on the hours of the conduct of activities or the operation of equipment have also generally been omitted. The reason for these omissions is that the drafters of the ordinance feel that there is no single number that can be chosen for each provision that would be appropriate for all types of communities. Each community has its own set of environmental, health, economic and other goals it wishes to attain. Each community also has its own configuration of noise sources and their impact which it wishes to control. The level and extent of such control is fully within the purview of local decision. Of course, localities will wish to consider the
technical practicality and economic reasonableness of sound levels chosen. However, in
the regulation of noise pollution, the protection of public health and welfare is the ma-
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or legal basis for control and must be carefully considered in the determination of per-
formance standard noise levels and hours of curfew. For a specification of national maxi-
2
mum noise exposure guidelines, consult In-
formation on the Levels of Environmental
Noise Requirements to Protect Public Health
and Welfare with an Adequate Margin of
Safety (U.S. Environmental Protection

Pre-Emption

Under the Noise Control Act of 1972 (49
U.S.C. §§ 4001 et seq.), certain areas of lo-
2
cal authority will become pre-empted, on
the effective date of regulations developed
by the U.S. Environmental Protection
Agency pursuant to Sections 6, 17 and 18
of this Act. In this discussion, we will pre-
sent the scope of Federal pre-emption and
indicate the provisions of the model ordi-
nance which were drafted wholly or par-
tially to respond to the issue of pre-emption.

An over-all requirement to monitor Fed-
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eral pre-emptive regulations and to respond
to them in the local noise ordinance is con-
tained in Section 4.3.C(6b). This subsection
provides that, at such time as Federal regu-
lations become effective, which are by law
pre-emptive of the laws of State and local
governments, the Environmental Protection
Officer(s)/Noise Control Officer(s) (EPO/ 
NCO) shall review the provisions of the lo-
cal ordinance which may be affected and
make appropriate recommendations for
changes to the city council/legislative body.

The purposes of including such a provi-
sion in this ordinance are to facilitate the
coordinating of the local noise control ef-
2
forts with the Federal noise program and to
reduce the possibility of defendants rais-
ing Federal pre-emption as a defense to
charges of local law violations.

With regard to the scope of pre-emption,
the pre-emptive provision of Section 6 of
the Noise Control Act differs considerably
from those of Sections 17 and 18. The Sec-
2
tion 6 provision is relatively narrow, pre-
empting local laws covering new product
noise emission levels which are directed at
the manufacture or sale of such products.
The preemptive provisions of Sections 17
and 18 are very broad, pre-empting local
noise laws which affect the operation of in-
testate motor and rail carrier vehicles.

In Section 6, subsection 6(e)(1) provides
that, after the effective date of an EPA
regulation prescribing noise emission lev-
2
els for a specific new product or component,
no State or political subdivision thereof may
also adopt or enforce with respect to that par-
2

cular new product or component any law

2
Hearing Board and Advisory Council

A City/County with a large EPO/NCO may prefer to utilize a Hearing Board (or an administrative court) to hear cases regarding ordinance violations. Under this approach, the Hearing Board would decide the case and determine the penalty. Local courts would be utilized in appeals of the decisions of the board. This approach avoids overburdening existing courts.

The City/County may also wish to use a Hearing Board to make determinations on Special Variances (Section 7.2) and Variance for Time to Comply (Section 7.3). This would free EPO/NCO personnel to perform other tasks under the ordinance. However, the EPO/NCO could still be consulted on technical matters.

If the City/County decides to have a Hearing Board, the terms of existence and operation of the Board should be specified in the ordinance.

A Noise Control Advisory Council should also be considered by the City/County. The functions of this council could include providing (1) advice on development of the noise control program; (2) recommendations on which provisions of the model ordinance should be included in the City/County ordinance; (3) recommendations on sound level values and curfew periods for the various provisions; and (4) stimulation of public interest in noise abatement. This Council could also be responsible for writing the periodic reports specified in Section 4.1.9, concerning the progress of the local noise control program.

SPECIFIC PROVISIONS

Article III—Definitions

1. Section 3.2.14, Definition of "Motorboat"

A community which serves as an international port may wish to explicitly exclude vessels in international commerce from the definition of motorboat, since many such vessels would be effectively prohibited from using the port (under Section 6.2.15, Motorboats).

2. Section 3.2.29, Definition of "Sound"

The term "sound" is generally used as the operative word in this ordinance rather than the term "noise." This is to avoid the problem of associating "noise" with a sound that is "disturbing" or "unwanted," with the attendant possibility that in order to prove a violation of the ordinance, proof must be given that the sound had indeed been "disturbing" or "unwanted." Because the substantive provisions of the ordinance have been narrowly drawn and often contain objective criteria, proof of an additional subjective element is unnecessary.
3. Section 3.2.11, Definition of "Person"

The definition of person does not include Federal agencies and departments. This is because legal decisions have not yet determined the extent of a locality's authority to bring action against the Federal government for noise control violations.

Section 4 of the Noise Control Act of 1972 requires that all departments, agencies, and instrumentalities of the executive legislative, and judicial branches of the Federal government comply with Federal, State, interstate, and local requirements respecting control and abatement of environment noise to the same extent that any person is subject to such requirements. The Federal Courts of Appeals, deciding cases under identical language in the Clean Air Act, have disagreed as to whether this language extends to administrative as well as substantive requirements. See State of Alabama v. Seeber, 502 F. 2d 1238 (5th Cir. 1974); Commonwealth of Kentucky v. Ruckelshaus, 497 F. 2d. 1172, (6th Cir. 1974); Kentucky v. Ruckelshaus is pending before the Supreme Court, and a resolution of the issue is likely. Further questions exist as to whether a State or local government can bring an action against the Federal Government for violations of their noise control laws, regulations, and ordinances. Accordingly, the key definition of "person" in the model ordinance, which serves as an applicability section, does not include the Federal Government.

In the absence of such specificity, Section 4 of the Noise Control Act continues to require that the Federal Government comply with the local ordinance. However, it is left to each community to determine the position it will take with respect to the relevant issues, such as whether the Federal Government must comply with administrative provisions, and whether penalties, orders, and enforcement actions will be directed at the Federal Government under Article XI (Enforcement).

Article IV—Powers and Duties of The (Environmental Protection) (Noise Control) Office(r)

Resolving Inter-Departmental Conflicts

Section 4.2.4 (Review of Actions of Other Departments). Section 4.2.5 (Review of Public and Private Projects). Section 4.3.4 (Truck Routes and Transportation Plans) and Article V (Duties and Responsibilities of Other Departments) have the potential of causing inter-departmental conflicts since there is shared responsibility. The continuing need to specify in the ordinance a method for resolving such conflicts, perhaps by authorizing city council, county board of supervisors, mayor, etc., to negotiate differences and make a final decision.

Education

Section 4.2.2 authorizes the Environmental Protection (Noise Control) Office(r) to educate the public on methods of controlling noise and on the provisions of the ordinance. The EPO may wish to exercise caution, however, in providing specific advice on solving a particular noise problem. For instance, if the EPO were to advise a commercial establishment on a method of reducing noise from its air conditioning unit and this method failed to be effective, the commercial establishment may try to use this fact as a defense in any action brought against it by the EPO. The EPO officer should use his discretion in handling matters of this type.

Review of Public and Private Projects

Section 4.2.5 grants the EPO the power to review public and private projects over which another department has authority in order to determine whether they will comply with the ordinance. This applies to matters as licensing a race track, approving a housing project, or granting a permit for a construction site, if required to be approved by a department other than that of the EPO/NCO and if likely to create sound levels or sound exposures in violation of the ordinance.

Some communities may wish to expand this section to authorize the EPO to recommend to other departments appropriate modifications to projects if the EPO believes such projects will violate the ordinance or to allow him veto power over projects significantly impacting the noise environment.

This provision does not set criteria for determining whether a proposed project must be reviewed by the EPO/NCO. If the City/County wishes the EPO/NCO to review every proposed project, such criteria are not necessary, but this policy may create an unnecessarily large burden on the EPO/NCO. If the City/County wishes to limit situations where the proposed project is subject to noise impact review, criteria can be either included in the language of this provision, or the EPO/NCO can develop criteria in consultation with affected departments. Such criteria may include, for example, minimum monetary or time limits for the review of activities or specification of the types of activities which are likely to produce sound in violation of the ordinance.

Inspections

Section 4.2.6 concerns inspections. To be constitutionally permissible, administrative searches or inspections conducted by municipal inspectors on private property must be made using a warrant procedure (Camara v. Municipal Court, 387 U.S. 533 (1967).
See v. Seattle, 187 U.S. 511 (1907)). Thus, if a private property holder refuses to allow his premises to be inspected by a City/County official, the official must obtain a search warrant for the premises before he may inspect them. The Court in See also held that there is no distinction between the rights of a residential property holder and those of a commercial property holder concerning searches or inspections. Both types of property are thus treated the same in Section 4.2.6(a).

Violations of Article VIII (Noise Levels by Receiving Land Use) and most Article VI (Prohibited Acts) violations can be determined without an inspection on the premises on which the sound source is situated, so a search warrant is not needed in these situations.

Article VIII—Sound Levels by Receiving Land Use (Defining Land Use Districts)

Article VIII sets property line sound limits for the broad receiving land use categories of residential, commercial and industrial. Many communities are employing this type of quantifiable limit to provide stronger legal control over undesirable sound levels than is attainable with an ordinance containing only substance provisions.

If the community land use/zoning code accurately reflects the actual use of the land, then the designations used by the city for zoning categories may effectively be plugged into the three Article VIII categories (with the corresponding definitions placed in Article III). On the other hand, if there are numerous discrepancies between the way the land is zoned and the way it is actually used (e.g., commercial establishments in a residential zone), or if there are large tracts of unzoned land, the community may prefer to base property line limits on the actual use of the land. This would provide greater protection for impacted properties.

A related matter to be considered in controlling property line noise is that of the occasional non-conforming land use. An example is the case of a single residence located in an industrial area. It may not be possible for several manufacturers impacting the residence to lower their noise levels to meet the limit specified for residential areas. Situations of this type will require some discretion in enforcement.

Figures 1, II, and III summarize graphically the property line levels set by current municipal noise ordinances.

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![Fixed Source Noise Levels Allowable At Residential District Boundaries](image-url)
Article X—Land Use

The basic purpose of the Article X land use planning provisions is to ensure that no new residences, institutions or recreational areas are constructed in high noise areas, as determined by the appropriate sections. Although the Article was drafted to stand independently from the existing community land use planning or zoning systems, it is
important for a community considering enactment of this Article to study the interaction of Article X with the land use planning and/or zoning laws and to reconcile them where necessary. It may be better, for example, to enact Article X as an amendment to an existing land use law rather than as a part of the noise control ordinance. Furthermore, because this Article effectively recites land subject to its provisions, the community may want or need to take special measures before enactment of this Article. These may include a general identification of the areas that will be affected by these provisions.

Article XI—Enforcement

Provisions in this Article are more likely to need revision to conform with local law than other provisions of the model ordinance. For example, the City/County may wish to make violations of the ordinance “infractions,” similar to minor traffic violations, rather than misdemeanors, due to the stigma attached to such violations.

The City/County may wish to ensure that the public is reasonably well-informed of activities prohibited by the ordinance before fully enforcing its enforcement program. For example, the City/County may utilize a discretionary policy of issuing an abatement order for a first violation, followed by a citation for the original violation, if the abatement order is not complied with. This approach is provided for in Section 11.2 (Abatement Order) and would be used for violations that are presumed to be unintentional. The EPO/NCO may wish to establish guidelines for use of the abatement order, indicating, for example, appropriate types of violations for which an order may be issued and maximum time period of an order.

The enforcement scheme contained in this ordinance also includes a provision for citizen suits (Section 11.5). The advantage of the citizen suit approach is that many violations of the ordinance which the EPO/NCO has insufficient resources to prosecute can be legally dealt with by persons affected by the violation. Provisions under which one citizen can bring another are limited to those listed in Table VI, to minimize the possibility of “harassment” suits.

Section 11.3 (Notice of Violation) is incomplete in several respects for easy adaptation to the local law of the particular City/County.

Section 11.4 (Immediate Threats to Health and Welfare) provides the EPO/NCO with the authority to force immediate abatement of sources producing sound intensities that not only violate the ordinance but are also unquestionably harmful to the health of the public exposed to them. The sound levels regulated (see Tables IV and V) are deliberately set high, because there is no procedure in this provision for balancing public health with economic or other considerations; public health is the sole determinant. The health and welfare criterion for the levels set is a temporary threshold shift of 30 dB at 4 kHz.

Subsection (b) limits the applicability of this provision to impacts on members of the general public who are involuntarily exposed to the sound. Employees exposed at their workplace are exempted because employee sound exposure levels are regulated under the Occupational Safety and Health Act (29 U.S.C. §§ 655 et seq. (1970)).

Severe sanctions for noncompliance with the order are provided for in subsection (d), so that the sound will not continue to be a detriment to public health. If the order is unjustified, a court can invalidate or suspend it after the order is issued, in a mandamus type proceeding. This remedy is contained in subsection (c), which may need to be modified to conform with local procedure.

Under Section 11.4 (Other Remedies), common law and statutory remedies previously used to regulate excessive sound will still remain available. It is desirable to retain such remedies to allow private persons the possibility of recovering damages or other remedies for the effects of excessive sound since private recovery is not provided for under the ordinance. The ordinance is intended to expand existing sound control law, not to limit it.

FORMAT

In reading the model ordinance it is essential that certain typographical symbols and format be understood. Several brief rules have been followed in drafting. These are:

- The material contained in square brackets [ ] is optional, depending on the needs and conditions of a given community. (Of course, communities developing ordinances may decide that any given provision should be deleted.)
- Parentheses ( ) are generally used to designate alternative choices, but in some cases contain explanatory information, depending on the context.
- Blanks — must be filled in by the community with appropriate information.
- Wherever the term EPO/NCO appears, the title of the community’s lead noise enforcement agency or official should be inserted.
# Model Community Noise Control Ordinance

## List of Provisions

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### 4.2 Powers of The (Environmental Protection)(Noise Control) Officer(s)

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#### 4.2.2 Education

#### 4.2.3 Coordination and Cooperation

#### 4.2.4 Review of Actions of Other Departments

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### Article VI Prohibited Acts

#### 6.1 Noise Disturbances Prohibited

#### 6.2 Specific Prohibitions

#### 6.2.1 Radios, Television Sets, Musical Instruments and Similar Devices

#### 6.2.2 Loudspeakers/Public Address Systems

#### 6.2.3 Street Sales

#### 6.2.4 Animals and Birds

#### 6.2.5 Loading and Unloading

#### 6.2.6 Construction

#### 6.2.7 Vehicle or Motorboat Repairs and Testing

#### 6.2.8 Airport and Aircraft Operations

#### 6.2.9 Places of Public Entertainment

#### 6.2.10 Explosives, Firearms, and Similar Devices

#### 6.2.11 Powered Model Vehicles

#### 6.2.12 Vibration

#### 6.2.13 Stationary Non-Emergency Signaling Devices

#### 6.2.14 Emergency Signaling Devices
ARTICLE I Short Title
This ordinance may be cited as the
"Noise Control Ordinance of the
(City/County) of ............"

ARTICLE II Declaration of Findings and Policy Scope
2.1 Declaration of Findings and Policy
WHEREAS excessive sound and vibration are a serious hazard to the
public health and welfare, safety, and the quality of life; and
WHEREAS a substantial body of science and technology exists by
which excessive sound and vibration may be substantially abated; and,
WHEREAS the people have a right to and should be ensured an environ-
ment free from excessive sound and vibration that may jeopardize their
health or welfare or safety or degrade the quality of life; and,
NOW, THEREFORE, it is the policy of the (City/County) of ............
to prevent excessive sound and vibration which may jeopardize the health
and welfare or safety of its citizens or degrade the quality of life.

2.2 Scope
This ordinance shall apply to the
control of all sound and vibration
originating within the limits of the
(City/County) of ............

ARTICLE III Definitions
3.1 Terminology
All terminology used in this ordi-
nance, not defined below, shall be in
conformance with applicable publica-
tions of the American National Standards Institute (ANSI) or its suc-
cessor body.

3.2.1 "A-Weighted Sound Level" Means
The sound pressure level in decibels as measured on a sound level meter
using the A-weighting network. The level so read is designated dB(A) or
dBA.

3.2.2 "Commercial Area" Means
(As defined in the community (com-
prehensive plan)/(zoning ordinance)).

3.2.3 "Construction" Means
Any site preparation, assembly, erection, substantial repair, alteration, or
similar action, but excluding demolition, for or of public or private
rights-of-way, structures, utilities or similar property.

3.2.4 "Day-Night Average Sound Level
(Ldn)" Means
The 24-hour energy average of the
A-weighted sound pressure level,
with the levels during the period
10:00 p.m. to 7:00 a.m. the follow-
ing day increased by 10 dBA before
averaging.

3.2.5 "Decibel (dB)" Means
A unit for measuring the volume of
sound, equal to 20 times the log-
arithm to the base 10 of the ratio
of the pressure of the sound meas-
ured to the reference pressure
which is 20 micropascals (20 micropascals
per square meter).

3.2.6 "Demolition" Means
Any dismantling, intentional destruc-
tion or removal of structures, utili-
ties, public or private right-of-way
surfaces, or similar property.

3.2.7 "Emergency" Means
Any occurrence or set of circum-
stances involving actual or imminent
physical trauma or property damage
which demands immediate action.

3.2.8 "Emergency Work" Means
Any work performed for the purpose
of preventing or alleviating the physi-
cal trauma or property damage
threatened or caused by an emer-
gency.

3.2.9 "Environmental Protection Officer(s)/
Noise Control Officer(s) (EPO/NCIO)" Means
The municipal agency or department
having lead responsibility for this
ordinance. (If no such agency is
designated, the term shall mean the
municipal official having lead respon-
sibility for this ordinance.)

3.2.10 "Equivalent A-Weighted Sound
Level (Leq)" Means
The constant sound level that, in a
given situation and time period, con-
vveys the same sound energy as the
actual time-varying A-weighted sound.
(For purposes of this ordi-
nance, a time period of 24 hours shall
be used, unless otherwise specified.)

3.2.11 "Gross Vehicle Weight Rating
(GVWR)" Means
The value specified by the manufac-
turer as the recommended maximum
loaded weight of a single motor ve-
hicle. In cases where trailers and tra-
ctor are separable, the gross combina-
tion weight rating (GCWR), which is
the value specified by the manufac-
turer as the recommended maximum
loaded weight of the combination ve-
hicle, shall be used.

3.2.12 "Impulsive Sound" Means
Sound of short duration, usually less
than one second, with an abrupt onset and rapid decay. Examples of sources of impulsive sound include explosions, drop forage impacts, and the discharge of firearms.

3.1.13 "Industrial Area" Means
(As defined in the community comprehensive plan / zoning ordinances).

3.1.14 "Motor Carrier Vehicle Engaged in Interstate Commerce" Means
Any vehicle which regulations apply pursuant to Section 18 of the Federal Noise Control Act of 1972 (P.L. 92-574), as amended, pertaining to motor carriers engaged in interstate commerce.

3.1.15 "Motor Vehicle" Means
(As defined in the motor vehicle code of the State)/ (Any vehicle which is propelled or drawn on land by a motor, such as, but not limited to, passenger cars, trucks, truck-trailers, semi-trailers, campers, go-carts, snowmobiles, amphibious craft on land, June buggies, or racing vehicles, but not including motorcycles.)

3.1.16 "Motorboat" Means
Any vessel which operates on water and which is propelled by a motor, including, but not limited to, boats, barges, amphibious craft, water skiing devices, and hovercraft.

3.1.17 "Motorcycle" Means
(As defined in the motor vehicle code of the State) / (An unenclosed motor vehicle having a saddle for the use of the operator and two or three wheels in contact with the ground, including, but not limited to, motor scooters and minibikes.)

3.1.18 "Muffler or Sound Dampening Device" Means
A device for abating the sound of escaping gases of an internal combustion engine.

3.1.19 "Noise" Means
Any sound which annoys or disturbs human beings or which causes or tends to cause an adverse psychological or physiological effect on humans.

3.1.20 "Noise Disturbance" Means
Any sound which (a) endangers or injures the safety or health of humans or animals, or (b) annoys or disturbs a reasonable person of normal sensitivities, or (c) endangers or injures personal or real property.

3.1.21 "Noise Sensitive Zone" Means
Any area designated pursuant to Section 4.210 of this ordinance for the purpose of ensuring exceptional quiet.

3.2.22 "Person" Means
Any individual, association, partnership, or corporation, and includes any officer, employee, department, agency or instrumentality of a State or any political subdivision of a State.

3.2.23 "Powered Model Vehicle" Means
Any self-propelled airborne, waterborne, or landborne plate, vessel, or vehicle, which is not designed to carry persons, including, but not limited to, any model airplane, boat, car, or rocket.

3.2.24 "Public Right-of-Way" Means
Any street, avenue, boulevard, highway, sidewalk or alley or similar place which is owned or controlled by a governmental entity.

3.2.25 "Public Space" Means
Any real property or structures thereon which are owned or controlled by a governmental entity.

3.2.26 "Pure Tone" Means
Any sound which can be distinctly heard as a single pitch or a set of single pitches. For the purposes of this ordinance, a pure tone shall exist if the one-third octave band sound pressure level in the band with the tone exceeds the arithmetic average of the sound pressure levels of the two contiguous one-third octave bands by 5 dB for center frequencies of 500 Hz and above and by 8 dB for center frequencies between 160 and 400 Hz and by 13 dB for center frequencies less than or equal to 125 Hz.

3.2.27 "Real Property Boundary" Means
An imaginary line along the ground surface, and its vertical extension, which separates the real property owned by one person from that owned by another person, but not including intra-building real property divisions.

3.2.28 "Residential Area" Means
(As defined in the community comprehensive plan / zoning ordinances).

3.2.29 "RMS Sound Pressure" Means
The square root of the time averaged square of the sound pressure, denoted \( P_{RMS} \).

3.2.30 "Sound" Means
An oscillation in pressure, particle displacement, particle velocity or other physical parameter, in a medium with internal forces that cause compression and rarefaction of that medium. The description of sound may include any characteristic of such sound, including duration, intensity and frequency.
3.2.31 “Sound Level” Means
The weighted sound pressure level obtained by the use of a sound level meter and frequency weighting network, such as A, B, or C as specified in American National Standards Institute specifications for sound level meters (ANSI S1.4—1971, or the latest approved revision thereof). If the frequency weighting employed is not indicated, the A-weighting shall apply.

3.2.32 “Sound Level Meter” Means
An instrument which includes a microphone, amplifier, RMS detector, integrator or time averager, output meter, and weighting networks used to measure sound pressure levels.

3.2.33 “Sound Pressure” Means
The instantaneous difference between the actual pressure and the average or barometric pressure at a given point in space, as produced by sound energy.

3.2.34 “Sound Pressure Level” Means
20 times the logarithm to the base 10 of the ratio of the RMS sound pressure to the reference pressure of 20 micropascals (20×10⁻⁶ N/m²). The sound pressure level is denoted $L_p$ or SPL and is expressed in decibels.

3.2.35 “Vibration” Means
An oscillatory motion of solid bodies of deterministic or random nature described by displacement, velocity, or acceleration with respect to a given reference point.

3.2.36 “Weekday” Means
Any day Monday through Friday which is not a legal holiday.

ARTICLE IV Powers and Duties of the (Environmental Protection/Noise Control) Officer(s)

4.1 Lead (Agency/OFFICIAL)
The noise control program established by this ordinance shall be administered by (title of municipal agency or lead official).

4.2 Power of The (Environmental Protection/Noise Control Officer(s)
In order to implement and enforce this ordinance and for the general purpose of sound and vibration abatement and control, the EPD/NCO shall have, in addition to any other authority vested in it, the power to:

4.2.1 Studies
Conduct, or cause to be conducted, research, monitoring, and other studies related to sound and vibration.

4.2.2 Education
(a) Conduct programs of public education regarding:
(1) the causes, effects and general methods of abatement and control of noise and vibration; and,
(2) the actions prohibited by this ordinance and the procedures for reporting violations; and
(b) Encourage the participation of public interest groups in related public information efforts.

4.2.3 Coordination and Cooperation
(a) Coordinate the noise and vibration control activities of all municipal departments;
(b) Cooperate to the extent practicable with all appropriate State and Federal agencies;
(c) Cooperate or combine to the extent practicable with appropriate county and municipal agencies; and,
(d) Enter into contracts (with the approval of the appropriate authority) for the provision of technical and enforcement services.

4.2.4 Review of Actions of Other Departments
Request any other department or agency responsible for any proposed or final standard, regulation or similar action to consult on the advisability of revising the action, if there is reason to believe that the action is not consistent with this ordinance.

4.2.5 Review of Public and Private Projects
Review public and private projects, subject to mandatory review or approval by other departments, for compliance with this ordinance, if such projects are likely to cause sound or vibration in violation of this ordinance.

4.2.6 Inspections
(a) Upon presentation of proper credentials, enter and inspect any private property or place, and inspect any report or records at any reasonable time when granted permission by the owner, or by some other person with apparent authority to act for the owner. When permission is refused or cannot be obtained, a search warrant may be obtained from a court of competent jurisdiction upon showing of probable cause to believe that a violation of this ordinance may exist. Such inspection may include administration of any necessary tests.
(b) Stop any motor vehicle, motorcycle, or motorboat operated on a
public right-of-way, public space, or public waterway reasonably suspected of violating any provision of this ordinance, and issue a notice of violation or abatement order which may require the motor vehicle, motorcycle or motorboat to be inspected or tested as the EPO/NCO may reasonably require.

4.2.7 Records
Require the owner or operator of any commercial or industrial activity to establish and maintain records and make such reports as the EPO/NCO may reasonably prescribe.

4.2.8 Measurement by the Owner or Operator
Require the owner or operator of any commercial or industrial activity to measure the sound level of or the vibration from any source in accordance with the methods and procedures and at such locations and times as the EPO/NCO may reasonably prescribe and to furnish reports of the results of such measurements to the EPO/NCO. The EPO/NCO may require the measurements to be conducted in the presence of its enforcement officials.

4.2.9 Product Performance Standards Recommendations
(a) Develop and recommend for promulgation (to the appropriate authority) provisions regulating the use and operation of any product, including the specification of maximum allowable sound emission levels of such products.
(b) Develop and recommend for promulgation (to the appropriate authority) provisions prohibiting the sale of products which do not meet specified sound emission levels, where the sound level of the product is not regulated by the United States Environmental Protection Agency under Section 6 of the Noise Control Act of 1972.

4.2.10 Noise Sensitive Zone Recommendations
Prepare recommendations, to be approved by (the appropriate authority), for the designation of noise sensitive zones which contain noise sensitive activities. Existing quiet zones shall be considered noise sensitive zones until otherwise designated. Noise sensitive activities include, but are not limited to, operations of schools, libraries open to the public, churches, hospitals, and nursing homes.

4.3 Various (Environmental Protection) (Noise Control Officer(s)
In order to implement and enforce this ordinance effectively, the EPO/NCO shall within a reasonable time after the effective date of the ordinance:

4.3.1 Standards, Testing Methods, and Procedures
Develop, (recommend to the appropriate authority,) and promulgate standards, testing methods and procedures.

4.3.2 Investigate and Pursue Violations
In conjunction with Section 4.2.6, Article XI, and other provisions of this ordinance, investigate and pursue possible violations of this ordinance.

4.3.3 Delegation of Authority
Delegate functions, where appropriate under this ordinance, to personnel within the EPO/NCO and to other agencies or departments, (subject to approval of ..................).

4.3.4 Truck Routes and Transportation Planning
(a) Study the existing transportation systems, such as truck routes within the community; determine areas with sensitivity to sound and vibration caused by transportation; recommend changes or modifications to transportation systems to minimize the sound and vibration impact on residential areas and noise sensitive zones.
(b) Assist in or review the total transportation planning of the community, including planning for new roads and highways, bus routes, airports, and other systems for public transportation, to ensure that the impact of sound and vibration receives adequate consideration.

4.3.5 Capital Improvement Guidelines
Establish noise assessment guidelines for the evaluation of proposed improvements for the capital improvements budget and program pursuant to Section 5.5. These guidelines shall assist in the determination of the relative priority of each improvement in terms of noise impact.

4.3.6 State and Federal Laws and Regulations
(a) Prepare and publish (with the approval of .................) a list of those products manufactured to meet specified noise emission limits under Federal, State, or community law for which "tampering" enforcement will be conducted; and,
(b) Make recommendations for modi-
ifications or amendments to this ordi-
nance to ensure consistency with all
State and Federal laws and regula-
tions.

[4.3.7] Planning to Achieve Long Term
Noise Goals
[Develop a generalized sound level
map of the (city/county), a long term
plan for achieving quiet in the (city/
county), and (with the approval of
..........) Integrate this plan into the planning process of the
(city/county).]

4.3.8 Administer Grants, Funds and Gifts
Administer noise program grants and
other funds and gifts from public and
private sources, including the State
and Federal governments.

[4.3.9] Periodic Report
(Evaluate and report, every ...........
year(s) following the effective date of
this ordinance, on the effectiveness
of the (city/county) noise control
program and make recommendations
for any legislative or budgetary
changes necessary to improve the
program. This report shall be made
to the (Noise Control Advisory
Board)/(appropriate authority) which
may amend it after consultation with
the EPO/NCO, and then submit it to
the (appropriate authority), for
approval.)

ARTICLE V Duties and Responsibilities
of Other Departments

5.1 Departmental Actions
All departments and agencies shall, to
the fullest extent consistent with other
law, carry out their programs in such
a manner as to further the policy of
this ordinance.

5.2 Departmental Cooperation
All departments and agencies shall
cooperate with the EPO/NCO to the
fullest extent in enforcing this ordi-
nance.

5.3 Departmental Compliance with Other
Laws
All departments and agencies shall
comply with Federal and State laws
and regulations and the provisions and
intent of this ordinance respecting the
control and abatement of noise to the
same extent that any person is subject
to such laws and regulations.

5.4 Project Approval
All departments whose duty it is to
review and approve new projects or
changes to existing projects, shall re-
sult, or may result, in the production
of sound or vibration shall consult
with the EPO/NCO prior to any such
approval.

5.5 Contracts
Any written contract, agreement,
purchase order, or other instrument
whereby the (city/county) is com-
mited to the expenditure of ..........
dollars or more in return for goods or
services shall contain provisions re-
quiring compliance with this ordi-
nance.

5.6 Low Noise Emission Products
Any product which has been certified
by the Administrator of the United
States Environmental Protection
Agency pursuant to Section 12 of the
Noise Control Act as a low noise
emission product and which he deter-
mines is suitable for use as a substi-
tute, shall be procured by the city/
county and used in preference to any
other product, provided that such
certified product is reasonably avail-
able and has a procurement cost
which is not more than (125) per-
centum of the least expensive type of
product for which it is certified as a
substitute.

5.7 Capital Improvement Program
All departments responsible for a
capital improvements budget and pro-
gram shall prepare an analysis of the
noise impact of any proposed im-
provements in accordance with noise
assessment guidelines established by
the EPO/NCO pursuant to Section
4.1.5. Proposed capital improvements
include land acquisition, building con-
struction, highway improvements, and
utilities and fixed equipment installa-
tion.

ARTICLE VI Prohibited Acts

6.1 Noise Disturbances Prohibited
No person shall unreasonably make,
continue, or cause to be made or
continued, any noise disturbance.
Non-commercial public speaking and
public assembly activities conducted
on any public space or public right-
of-way shall be exempt from the op-
eration of this Section.

6.2 Specific Prohibitions
The following acts, and the causing
thereof, are declared to be in viola-
tion of this ordinance:

6.2.1 Radio, Television Sets, Musical
Instruments and Similar Devices
Operating, playing or permitting the
operation or playing of any radio,
television, phonograph, drum, medi-
cal instrument, sound amplifier, or
similar device which produces, reproduces, or amplifies sound; (a) Between the hours of .......p.m. and .......a.m. the following day in such a manner as to create a noise disturbance across a real property boundary or within a noise sensitive zone, except for activities open to the public and for which a permit has been issued by (appropriate authority) according to criteria set forth in [........]; (b) In such a manner as to create a noise disturbance at 30 feet (15 meters) from such device, when operated in or on a motor vehicle on a public right-of-way or public space, or in a boat on public waters; or, (c) In such a manner as to create a noise disturbance to any person other than the operator of the device, when operated by any passenger on a common carrier; (d) This section shall not apply to non-commercial spoken language covered under Section 6.2.2.

6.2.2 Loudspeakers/Public Address Systems (a) Using or operating for any non-commercial purpose any loudspeaker, public address system, or similar device between the hours of 10:00 p.m. and 6:00 a.m. the following day, such that the sound therewith creates a noise disturbance across a residential real property boundary or within a noise sensitive zone. (b) Using or operating for any commercial purpose any loudspeaker, public address system, or similar device (1) such that the sound therewith creates a noise disturbance across a real property boundary or within a noise sensitive zone; or (2) between the hours of .......p.m. and .......a.m. the following day on a public right-of-way or public space.

6.2.3 Street Sales Offering for sale or selling anything by shouting or outcry within any residential or commercial area of the city/county except by permit issued by (appropriate authority) according to criteria set forth in ....... and/or except between the hours of .......a.m. and .......p.m.

6.2.4 Animals and Birds Owning, possessing or harboring any animal or bird which frequently or for continued duration, howls, barks, meows, squawks, or makes other sounds which create a noise disturbance across a residential real property boundary or within a noise sensitive zone. [This provision shall not apply to public zoos.]

6.2.5 Loading and Unloading Loading, unloading, opening, closing or other handling of boxes, crates, containers, building materials, garbage cans, or similar objects between the hours of .......p.m. and .......a.m. the following day in such a manner as to cause a noise disturbance across a residential real property boundary or within a noise sensitive zone.

6.2.6 Construction Operating or permitting the operation of any tools or equipment used in construction, drilling, or demolition work; (a) Between the hours of .......p.m. and .......a.m. the following day on weekdays or at any time on (Sundays/weekends) or holidays, such that the sound therefrom creates a noise disturbance across a residential real property boundary or within a noise sensitive zone, except for emergency work of public service utilities or by special variance issued pursuant to Section 7.1; (b) At any other time such that the sound level at or across a real property boundary exceeds 75 Leq of .......dba for the daily period of operation. (c) This section shall not apply to the use of domestic power tools subject to Section 6.2.7.

6.2.7 Vehicle or Motorboat Repairs and Testing Repairing, rebuilding, modifying, or testing any motor vehicle, motorcycle, or motorboat in such a manner as to cause a noise disturbance across a residential real property boundary or within a noise sensitive zone.

6.2.8 Airport and Aircraft Operations (a) The EPO/NGO shall consult with the airport proprietor to recommend changes in airport operations to minimize any noise disturbance which the airport owner may have authority to control in its capacity as proprietor. (b) Nothing in this section shall be construed to prohibit, restrict, penalize, enjoin, or in any manner regulate the movement of aircraft which are in all respects conducted in accordance with, or pursuant to, applicable Federal laws or regulations.

6.2.9 Places of Public Entertainment Operating, playing or permitting the operation or playing of any radio, television, phonograph, drum, musical instrument, sound amplifier, or
similar device which produces, reproduces, or amplifies sound in any place of public entertainment at a sound level greater than \( \ldots \ldots \text{dBA} \) as read by the slow response on a sound level meter at any point that is normally occupied by a customer, unless a conspicuous and legible sign is located outside such place, near each public entrance, stating "WARNING: SOUND LEVELS WITHIN MAY CAUSE PERMANENT HEARING IMPAIRMENT."

6.2.10 Explosives, Firearms, and Similar Devices

The use or firing of explosives, firearms, or similar devices which create impulsive sound so as to cause a noise disturbance across a real property boundary or on a public space or right-of-way, without first obtaining a special variance issued pursuant to Section 7.2. (Such permit need not be obtained for licensed game-hunting activities on property where such activities are authorized.)

6.2.11 Powered Model Vehicles

Operating or permitting the operation of powered model vehicles so as to create a noise disturbance across a residential real property boundary, in a public space, or within a noise sensitive zone between the hours of \( \ldots \ldots \text{p.m. and \ldots \ldots a.m.} \) the following day. Maximum sound levels in a public space during the permitted period of operation shall conform to those set forth for residential land use in Table 1 of Section 8.1 and shall be measured at a distance of \( \ldots \ldots \text{feet} \) from any point on the path of the vehicle. Maximum sound levels for residential property and noise sensitive zones, during the permitted period of operation, shall be governed by Section 8.1 and Section 6.2.16, respectively.

6.2.12 Vibration

Operating or permitting the operation of any device that creates vibration which is above the vibration perception threshold of an individual at or beyond the property of the source if on private property or at \( \ldots \ldots \text{feet} \) (meters) from the source if on a public space or public right-of-way. For the purposes of this section, "vibration perception threshold" means the minimum ground- or structure-borne vibrational motion necessary to cause a normal person to be aware of the vibration by such direct means as, but not limited to, sensation by touch or visual observation of moving objects.

6.2.13 Stationary Non-Emergency Signalling Devices

(a) Sounding or permitting the sounding of any (electronically-amplified) signal from any stationary bell, siren, whistle, or similar device, intended primarily for nonemergency purposes, from any place, [for more than \( \ldots \ldots \text{minutes in any hourly period.} \]

(b) Devices used in conjunction with places of religious worship shall be exempt from the operation of this provision.

(c) Sound sources covered by this provision and not excepted under subsection (b) shall be exempted by (appropriate authority) using criteria set forth in Section 7.2.

6.2.14 Emergency Signalling Devices

(a) The intentional sounding or permitting the sounding outdoors of any fire, burglar, or civil defense alarm, siren, whistle or similar stationary emergency signalling device, except for emergency purposes or for testing, as provided in Subsection (b).

(b) (i) Testing of a stationary emergency signalling device shall occur at the same time of day each time such a test is performed, but not before \( \ldots \ldots \text{a.m. or after \ldots \ldots p.m.} \) Any such testing shall use only the minimum cycle test time. In no case shall such test time exceed \( \ldots \ldots \text{seconds.} \)

(ii) Testing of the complete emergency signalling system, including the functioning of the signalling device and the personnel response to the signalling device, shall not occur more than once in (each calendar month). Such testing shall not occur before \( \ldots \ldots \text{a.m. or after \ldots \ldots p.m.} \) The time limits specified in subsection (i) shall not apply to such complete system testing.

(c) Sound testing of the sounding of any exterior burglar [or fire] alarm or any motor vehicle burglar alarm unless such alarm is automatically terminated within \( \ldots \ldots \text{minutes of activation.} \) (This section shall not be interpreted to apply to \( \ldots \ldots \text{alarms.} \])

6.2.15 Motorboats

Operating or permitting the operation of any motorboat in any lake, river, stream, or other waterway in such manner as to exceed a sound level of \( \ldots \ldots \text{dBA at 50 feet (15 meters)} \) or the nearest shoreline, whichever distance is less.

6.2.16 Noise Sensitive Zones

(a) Creating or causing the creation
of any sound within any noise sensitive zone designated pursuant to Section 4.2.10, so as to disrupt the activities normally conducted within the zone, provided that conspicuous signs are displayed indicating the presence of the zone; or

(b) Creating or causing the creation of any sound within any noise sensitive zone, designated pursuant to Section 4.2.10, containing a hospital, nursing home, or similar activity, so as to interfere with the functions of such activity or disturb or annoy the patients in the activity, provided that conspicuous signs are displayed indicating the presence of the zone.

6.2.17 Domestic Power Tools

Operating or permitting the operation of any mechanically powered saw, sander, drill, grinder, lawn or garden tool, snow blower, or similar device used outdoors in residential areas between the hours of ____ p.m. and ____ a.m. the following day so as to cause a noise disturbance across a residential real property boundary.

6.2.18 Tampering

The following acts or the causing thereof are prohibited:

(a) The removal or rendering inoperative by any person other than for purposes of maintenance, repair, or replacement, of any noise control device or element of design or noise label of any product identified under Section 4.3.6. The EPO/NCO may, by regulation, list those acts which constitute violation of this provision.

(b) The (intentional) moving or rendering inaccurate or inoperative of any sound monitoring instrument or device positioned by or for the EPO/NCO, provided such device or the immediate area is clearly labeled, in accordance with EPO/NCO regulations, to warn of the potential illegality.

(c) The use of a product, identified under Section 4.3.6, which has had a noise control device or element of design or noise label removed or rendered inoperative, with knowledge that such action has occurred.

7.2 Special Variances

(a) The (EPO/NCO)/(Hearing Board) shall have the authority, consistent with this section, to grant special variances which may be requested pursuant to Sections 4.2.6 (Construction) and 4.2.10 (Explosives, Firearms, and Similar Devices).

(b) Any person seeking a special variance pursuant to this section shall file an application with the (EPO/NCO)/(Hearing Board). The application shall contain information which demonstrates that bringing the source of sound or activity for which the special variance is sought into compliance with this ordinance would constitute an unreasonable hardship on the applicant, on the community, or on other persons. [Notice of an application for a special variance shall be published according to jurisdictional procedure.] Any individual who claims to be adversely affected by allowance of the special variance may file a statement with the (EPO/NCO)/(Hearing Board) containing any information to support his claim. If the (EPO/NCO)/(Hearing Board) finds that a sufficient controversy exists regarding an application, a public hearing may be held.

(c) In determining whether to grant or deny the application, the (EPO/NCO)/(Hearing Board) shall balance the hardship to the applicant, the community, and other persons of not granting the special variance against the adverse impact on the health, safety, and welfare of persons affected, the adverse impact on property affected, and any other adverse impacts of granting the special variance. Applicants for special variances and persons contesting special variances may be required to submit any information the (EPO/NCO)/(Hearing Board) may reasonably require. In granting or denying an application, the (EPO/NCO)/(Hearing Board) shall place on public file a copy of the decision and the reasons for denying or granting the special variance.

(d) Special variances shall be granted by notice to the applicant containing all necessary conditions, including a time limit on the permitted activity. The special variance shall not become effective until all conditions are agreed to by the applicant. Noncompliance with any condition of the special variance shall terminate it and subject the person holding it to those provisions of this ordinance regulating the source of sound or activity for
which the special variance was
granted.
(e) Application for extension of time
limits specified in special variances or
for modification of other substantial
conditions shall be treated like appli-
cations for initial special variances
under subsection (b).
(f) The (EPO/NCO)/(Hearing
Board) may issue guidelines [ap-
proved by ......................] defining
the procedures to be followed in
applying for a special variance and
the criteria to be considered in deci-
ding whether to grant a special vari-
ance.

7.3 Variances for Time to Comply
(a) Within ....... days following the
effective date of this ordinance, the
owner of any commercial or industrial
source of sound may apply to the
(EPO/NCO)/(Hearing Board) for a
variance in time to comply with Sec-
tion 9.2.12 (Vibration) or Article
VIII. The (EPO/NCO)/(Hearing
Board) shall have the authority, con-
sistent with this section, to grant a
variance, not to exceed ....... days
from the effective date of this ordi-
nance.
(b) Any person seeking a variance in
time to comply shall file an applica-
tion with the (EPO/NCO)/(Hearing
Board). The application shall contain
information which demonstrates that
bringing the source of sound or activ-
ity for which the variance is sought
into compliance with this ordinance
prior to the date requested in the
application would constitute an un-
reasonable hardship on the applicant,
on the community, or on other per-
sons. [Notice of an application for a
variance in time to comply shall be
published according to (jurisdic-
tional procedure).] Any individual
who claims to be adversely affected by
allowance of the variance in time to
comply may file a statement with the
(EPO/NCO)/(Hearing Board) con-
taining any information to support
his claim. If the (EPO/NCO)/(Hear-
ing Board) finds that a sufficient con-
troversy exists regarding an applica-
tion, a public hearing may be held.
(c) In determining whether to grant
or deny the application, the (EPO/
NCO)/(Hearing Board) shall bal-
cence the hardship to the applicant, the
community, and other persons of not
granting the variance in time to com-
ply against the adverse impact on
health, safety, and welfare of persons
affected, the adverse impact on prop-
erty affected, and any other adverse
impacts of granting the variance.
Applicants for variances in time to
comply and persons contesting vari-
ances may be required to submit
any information the (EPO/NCO)/
(Hearing Board) may reasonably re-
quire. In granting or denying an ap-
plication, the (EPO/NCO)/(Hearing
Board) shall place on public file a
copy of the decision and the reasons
for denying or granting the variance
in time to comply.
(d) Variances in time to comply shall
be granted to the applicant contain-
ing all necessary conditions, includ-
ing a schedule for achieving compli-
cance. The variance in time to comply shall
not become effective until all condi-
tions are agreed to by the applicant.
Noncompliance with any condition of
the variance shall terminate the vari-
ance and subject the person holding it
to those provisions of this ordinance
for which the variance was granted.
(e) Application for extension of time
limits specified in variances in time
to comply or for modification of other
substantial conditions shall be treated
like applications for initial variances
under subsection (b), except that the
(EPO/NCO)/(Hearing Board) must
find that the need for the extension
or modification clearly outweighs any
adverse impacts of granting the exten-
sion or modification.
(f) The (EPO/NCO)/(Hearing
Board) may issue guidelines [ap-
proved by ......................] defining
the procedures to be followed in
applying for a variance in time to
comply and the criteria to be con-
sidered in deciding whether to grant
a variance.

7.4 Appeals
Appeals of an adverse decision of the
(EPO/NCO)/(Hearing Board) shall
be made to the (appropriate court of
law). Review of the court shall be
(de novo)(limited to whether the
decision is supported by substantial
evidence)/(as specified by the
..............).

ARTICLE VIII Sound Levels by Receiving
Land Use
8.1 Maximum Permissible Sound Levels
by Receiving Land Use
No person shall operate or cause to
be operated on private property any
source of sound in such a manner as
to create a sound level which exceeds
the limits set forth for the receiving
land use category in Table I when
measured at or within the property
boundary of the receiving land use.
TABLE I  SOUND LEVELS BY RECEIVING LAND USE

<table>
<thead>
<tr>
<th>Receiving Land Use</th>
<th>Sound Level</th>
<th>Time</th>
<th>Limit, dBA</th>
</tr>
</thead>
<tbody>
<tr>
<td>R-1, R-2, etc.</td>
<td>(A) a.m.</td>
<td></td>
<td>L</td>
</tr>
<tr>
<td></td>
<td>(B) p.m.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Residential, Public</td>
<td>(B) p.m.</td>
<td></td>
<td>L</td>
</tr>
<tr>
<td>Space, Open Space,</td>
<td>(A) a.m.</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Agricultural or</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Institutional</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>C-1, C-2, etc.</td>
<td></td>
<td></td>
<td>L</td>
</tr>
<tr>
<td>B-1, B-2, etc.</td>
<td></td>
<td></td>
<td>L</td>
</tr>
<tr>
<td>Commercial or</td>
<td></td>
<td></td>
<td>L</td>
</tr>
<tr>
<td>Business</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>M-1, M-2, etc.</td>
<td></td>
<td></td>
<td>L</td>
</tr>
<tr>
<td>Industrial</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

5.2 Correction for Character of Sound
For any source of sound which emits a pure tone or impulsive sound, the maximum sound level limits set forth in Section 5.1 shall be reduced by 6 dBA.

5.3 Exemptions
The provisions of this article shall not apply to:
(a) Activities covered by the following Sections: 6.2.6 (Construction), 6.2.8 (Aircraft and Airport Operations), 6.2.10 (Explosives, Firearms, and Similar Devices), 6.2.12 (Stationary Nonemergency Signing Devices), 6.2.13 (Emergency Signing Devices), 6.2.15 (Motorbikes), 6.2.17 (Domestic Power Tools), 9.1.3 (Refuse Collection Vehicles), 9.2 (Recreational Motorized Vehicles Operating Off Public Rights-Of-Way);
(b) the unamplified human voice;
(c) interstate railway locomotives and cars; and
[(d) (non-stationary farming equipment)/all agricultural activities]

ARTICLE IX  Motor Vehicle Maximum Sound Levels

9.1 Motor Vehicles and Motorcycles on Public Rights-of-Way
No person shall operate or cause to be operated any motor vehicle or motorcycle not equipped with a muffler or other sound dissipative device in good working order and in constant operation;

9.1.1 Adequate Mufflers or Sound Dissipative Devices
(a) No person shall operate or cause to be operated any motor vehicle or motorcycle not equipped with a muffler or other sound dissipative device in good working order and in constant operation;
(b) No person shall remove or render inoperative, or cause to be removed or rendered inoperative, other than for purposes of maintenance, repair, or replacement, any muffler or sound dissipative device on a motor vehicle or motorcycle;
(c) The EPO/NCO may, by (guidelines) (regulations subject to approval by ..............), list those acts which constitutes violation of this section.

9.1.3 Motor Vehicle Horns and Signalling Devices
The following acts and the causing thereof are declared to be in violation of this ordinance:
(a) The sounding of any horn or other auditory signalling device on or
in any motor vehicle on any public right-of-way or public space, except (as a warning of danger) as provided in the vehicle code.

(b) The sounding of any horn or other auditory signaling device which produces a sound level in excess of 100
dBA at 100 feet (meters).

9.1.3 Refuse Collection Vehicles
No person shall:
(a) On or after (2 years) following the effective date of this ordinance, operate or permit the operation of the compacting mechanism of any motor vehicle which compacts refuse and which creates, during the compacting cycle, a sound level in excess of 100
dBA when measured at 100 feet (meters) from any point on the vehicle; or
(b) Operate or permit the operation of the compacting mechanism of any motor vehicle which compacts refuse, between the hours of 10 p.m. and 7 a.m. the following day in a residential area or noise sensitive zone; or
(c) Collect refuse with a refuse collection vehicle between the hours of 10 p.m. and 7 a.m. the following day in a residential area or noise sensitive zone.

9.1.4 Standing Motor Vehicles
No person shall operate or permit the operation of any motor vehicle with a gross vehicle weight rating (GVWR) in excess of ten thousand (10,000) pounds, or any auxiliary equipment attached to such a vehicle, for a period longer than 15 minutes in any hour while the vehicle is stationary, for reasons other than traffic congestion, on a public right-
of-way or public space within 150 feet (46 meters) of a residential area or designated noise sensitive zone, between the hours of 10 p.m. and 7 a.m. the following day.

9.2 Recreation Motorized Vehicles
(a) Except as permitted in subsection (b) or (c), no person shall operate or cause to be operated any recreational motorized vehicle on a public right-of-way in such a manner that the sound level emitted therefrom exceeds the limits set forth in Table III at a distance of 30 feet (11. meters) or more from the path of the vehicle when operated on a public space or at or across the boundary of private property when operated on private property. This section shall apply to all recreational motorized vehicles, whether or not duly licensed and registered, including, but not limited to, commercial or non-commercial racing vehicles, motorcycles, go-
carts, snowmobiles, amphibious craft, campers and dune buggies, but not including motorboats.
(b) Permits for motor vehicle racing events may be obtained from (appropriate authority) according to procedures and criteria set forth in ...........
(c) Special variances for ....may be obtained from (appropriate authority) according to procedure and criteria set forth in ...........

| TABLE III | RECREATIONAL MOTORIZED VEHICLE SOUND LIMITS (MEASURED AT 50 FEET OR 15 METERS) |
| Vehicle Type | Sound Level, dBA |
| Snowmobile | A |
| Motorcycle | B |
| Any Other Vehicle | C |

ARTICLE X Land Use
10.1 General Provisions
(a) No owner of any land shall commence or cause to be commenced construction of any structure covered by Sections 10.2, 10.3, 10.5 or 10.6 unless approved by the EPO/NCO as provided in this Article.
(b) Any application for approval required by this Article shall be submitted in writing to the EPO/NCO, with a copy to the (Building Department)/(Appropriate Department), by the owner of the land on which the structure is proposed to be constructed and shall contain the following information:

1. Identification of the land on which the construction is proposed;
2. The section of this Article under which approval is requested;
3. Information and data supporting the claim that the appropriate requirements will be met; and,
4. Any other information which the EPO/NCO may reasonably require.

10.2 Construction Restrictions for Habitable and Institutional Structures
(a) Except as provided in subsection (c), no new single family residential structure shall be approved for con-
struction (excluding substantial re-
pair or alteration) if the exterior day-night average sound level ($L_{dn}$) anywhere on the site of the proposed structure is projected to be in excess of $--------$ dBA anywhere on the site of the proposed structure is projected to be in excess of $--------$ dBA within $--------$ years following the estimated completion date of the structure.

(b) Except as provided in subsection (c), no new multiple-family residence, dormitory, mobile home park, transient lodging, school, hospital, nursing home or similar structure, or substantial modification of such existing structure, shall be approved for construction if the exterior day-night average sound level ($L_{dn}$) anywhere on the site of the proposed structure is projected to be in excess of $--------$ dBA within $--------$ years following the estimated completion date of the structure or modification.

(c) Construction otherwise prohibited pursuant to subsections (a) or (b) shall be allowed if the exterior day-night average sound level ($L_{dn}$) on the site of the proposed structure is projected to be in excess of $--------$ dBA for $--------$ years following construction, provided that there is incorporated into the design and construction of the structure such sound attenuation measures as are necessary to reduce the maximum interior day-night average sound level ($L_{in}$) to $--------$ dBA. Subsections (a) and (b) shall not apply to any site development plan or its equivalent on which four or fewer dwelling units are to be constructed.

(d) Prior to issuance of any occupancy permit for any structure regulated pursuant to subsection (c), the owner of the structure shall submit for EPO/NCO review the report of an independent testing agency approved by the EPO/NCO certifying that sound attenuation measures have been properly incorporated into the design and construction of the structure and that the interior $L_{in}$ meets the criterion specified in subsection (c). Such report shall contain the results of simultaneous measurements of the exterior and interior day-night average sound levels for a representative sample of locations.

(e) The EPO/NCO may conduct such inspections and measurements as are necessary to ensure the accuracy of any report submitted pursuant to subsection (d) and to ascertain compliance with this section. These may include site inspections by a certified independent testing agency during specified periods of construction.

10.3 Recreational Area Restrictions

(a) Except as provided in subsections (b), (c), and (d) no land shall be designated or approved for construction or use as a public or private exterior recreational area, including, but not limited to, children's playgrounds, outdoor theaters and amphitheaters, picnic grounds, tennis courts and swimming pools, if the exterior day-night average sound level ($L_{dn}$) anywhere on the site of the proposed recreational area is projected to be in the excess of $--------$ dBA within $--------$ years following the construction or designation of the site.

(b) This section shall not apply to the designation or approval of any green belt or open space in any area in which the $L_{dn}$ exceeds the level specified in subsection (a) regardless of whether such green belt or open space is open to public use, provided that no recreational improvement or facility is constructed thereon.

(c) Designation or approval of exterior recreational areas otherwise prohibited under subsection (a) shall be allowed if the $L_{dn}$ specified in that subsection can be achieved by appropriate means of sound attenuation, such as barriers, barriers, or buildings, at the perimeter of or elsewhere on the site.

(d) No new interior recreational facility, including, but not limited to, gymnasiums, ice or roller skating rinks, indoor swimming pools, and tennis courts, shall be approved for construction if the exterior day-night average sound level anywhere on the site is projected to be in excess of $--------$ dBA within $--------$ years following the estimated date of completion of the structure unless there is incorporated into the design and construction of the structure such sound attenuation measures as are necessary to reduce the maximum interior day-night average sound level ($L_{in}$) to $--------$ dBA.

10.4 Site Study Requirement

(a) If the EPO/NCO has reason to believe that a full report is necessary to determine whether a proposed project is prohibited under Section 10.1, such report shall be made by the applicant prior to approval of any subdivision, zoning, or building permit application. If a full report has not been made and the applicant believes the project was wrongfully prohibited under Section 10.1, he may file a full report within $--------$ days of the EPO/NCO decision and re-
quest reconsideration by the EPO/NCO. A full report shall contain the following information and any other information which the EPO/NCO may reasonably require:
(1) the existing day-night average sound levels (L_{eq}) at the site during 

... years following completion of the project, and the projected future 

L_{eq} at the site resulting from these new or expanded sources; and,
(3) where applicable, plans for sound attenuation measures on the site and/or of the structure proposed to be built and the amount of sound attenuation anticipated as a result of these measures.

(b) in determining whether an applicant should be required to submit a full report pursuant to subsection (a), the EPO/NCO shall consider Circular 13902 (Noise Abatement and Control) and other publications of the U.S. Department of Housing and Urban Development.

10.5 Commercial and Industrial
"Commercial and Industrial Construction"
No new or substantially modified structure on land used or zoned as commercial or industrial shall be approved for construction unless the owner or developer of such land has demonstrated, in accordance with guidelines published by the EPO/NCO, that the completed structure and the activities associated with and on the same property as the structure, will comply with the provisions of Article VIII at the time for initial full-scale operation of such activities.

10.6 Sound From New Transportation Systems in Residential Areas or Noise Sensitive Zones
No plans for construction of new transportation systems or expansion of the capacity of existing transportation systems will be approved for location in or near residential areas or noise sensitive zones, regardless of the source of project funds, unless such plan includes all control measures necessary to ensure that the projected day-night average sound level (L_{eq}) due to the operation of the transportation system does not exceed ... dBA at any point on residential property within ... years after the expected completion of the project.

10.7 Equivalent Measurement Systems
For the purposes of this Article, all measurements and designations of sound levels shall be expressed in day-night average sound levels (L_{eq}) or in any other equivalent measurement system the EPO/NCO may reasonably approve.

10.8 Zoning Ordinance or Comprehensive Plan
(a) No proposed zoning ordinance or comprehensive plan shall be approved unless such plan includes a sound analysis which (1) identifies existing and projected noise sources and associated sound levels for ... years in and around the area under consideration, and (2) ensures usage of adequate measures to avoid violation of any provision of this ordinance.

(b) No zoning or change application shall be approved unless the site feasibility study submitted, as required by the (Zoning Board of Appeals)/(Planning Commission), contains an analysis which shows (1) the impact of existing and projected noise sources for ... years on the intended use, and (2) the projected noise impact of the intended use, when completed, on surrounding areas. Such study shall ensure the use of adequate measures to avoid violation of any provision of this ordinance.

10.9 Truth in Selling or Renting
No person shall sell or rent, or cause to be sold or rented, any structure or property to be used for human habitation, where the structure or property is exposed to sound levels regularly in excess of (an L_{eq} in any hour of ... dBA)/(an L_{eq} of ... dBA), without making full written disclosure to all potential buyers or renters of the existence of such sound levels and of the nature of the sources. The EPO/NCO shall develop a standard format for written disclosures, which shall include information on the effects of noise on human health and welfare.

10.10 Appeals
Any applicant may appeal an adverse decision by the EPO/NCO under this Article, in the appropriate court of law, on the grounds that the EPO/NCO disapproval was arbitrary, capricious, or unreasonable.
ARTICLE XI Enforcement

11.1 Penalties

(a) Any person who violates any provision of this ordinance shall be fined for each offense not more than $________ dollars.

(b) Any person who willfully or knowingly violates any provision of this ordinance shall be fined for each offense a sum of not less than $________ dollars and not more than $________ dollars.

(c) Each day of violation of any provision of this ordinance shall constitute a separate offense.

11.2 Abatement Orders

(a) Except as provided in subsection (b), in lieu of issuing a notice of violation as provided for in Section 11.1, the EPO/NCO or other agency/officer responsible for enforcement of any provision of this ordinance may issue an order requiring abatement of any source of sound or vibration alleged to be in violation of the ordinance within a reasonable time period and according to guidelines to be approved by appropriate authority which the EPO/NCO may prescribe.

(b) An abatement order shall not be issued: (1) for any violation covered by Section 11.1; (2) for any violation of _______; or, (3) when the EPO/NCO or other enforcement agency/officer has reason to believe that there will not be compliance with the abatement order.

11.3 Notice of Violation

(Except where a person is acting in good faith to comply with an abatement order issued pursuant to Section 11.2 (a)), violation of any provision of this ordinance shall be cause for a notice of violation/summons/complaint/information or indictment to be issued by the EPO/NCO or other responsible enforcement agency/officer according to procedures (which the EPO/NCO may prescribe) to be set forth in _______.

11.4 Immediate Threats to Health and Welfare

(a) The EPO/NCO shall order an immediate halt to any sound which exposes any person, except those excluded pursuant to subsection (b), to continuous sound levels in excess of those shown in Table IV or to impulsive sound levels in excess of those shown in Table V. Within _______ days following issuance of such an order, the EPO/NCO shall apply to the appropriate court for an injunction to replace the order.

(b) No order pursuant to subsection (a) shall be issued if the only persons exposed to sound levels in excess of those listed in Tables IV and V are exposed as a result of (1) trespass; (2) invasions upon private property by the person causing or permitting the sound; (3) employment by the person or a contractor of the person causing or permitting the sound.

(c) Any person subject to an order issued pursuant to subsection (a) shall comply with such order until (1) the sound is brought into compliance with the order, as determined by the EPO/NCO; or (2) a judicial order has superseded the EPO/NCO order.

(d) Any person who violates an order issued pursuant to this section shall, for each day of violation, be fined not less than $________ dollars nor more than $________ dollars.

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TABLE IV
CONTINUOUS SOUND LEVELS WHICH POSE AN IMMEDIATE THREAT TO HEALTH AND WELFARE
(Measured at 30 Feet or 15 Meters)*

<table>
<thead>
<tr>
<th>Sound Level Limit (dBA)</th>
<th>Duration</th>
</tr>
</thead>
<tbody>
<tr>
<td>90</td>
<td>24 hours</td>
</tr>
<tr>
<td>93</td>
<td>12 hours</td>
</tr>
<tr>
<td>96</td>
<td>6 hours</td>
</tr>
<tr>
<td>99</td>
<td>3 hours</td>
</tr>
<tr>
<td>102</td>
<td>1.5 hours</td>
</tr>
<tr>
<td>105</td>
<td>45 minutes</td>
</tr>
<tr>
<td>108</td>
<td>22 minutes</td>
</tr>
</tbody>
</table>

* Use equal energy-time-intensity trade-off if level varies; find energy equivalent over 24 hours.

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TABLE V
IMPULSIVE SOUND LEVELS WHICH POSE AN IMMEDIATE THREAT TO HEALTH AND WELFARE
(Measured at 30 Feet or 15 Meters)

<table>
<thead>
<tr>
<th>Sound Level Limit (dBA)</th>
<th>Repetitions per 24 Hour Period</th>
</tr>
</thead>
<tbody>
<tr>
<td>145</td>
<td>1</td>
</tr>
<tr>
<td>135</td>
<td>10</td>
</tr>
<tr>
<td>125</td>
<td>100</td>
</tr>
</tbody>
</table>
11.5 Citizen Suits
(a) Any person, other than persons responsible for enforcement of this ordinance, may commence a civil action on his own behalf (1) against any person who is alleged to be in violation of any provision of this ordinance set forth in Table VI below or (2) against the EPO/NCO where there is alleged a failure of the EPO/NCO to perform any act under this ordinance which is not discretionary. The court shall have jurisdiction, without regard to the amount in controversy, to grant such relief as it deems necessary.
(b) No action may be commenced
(1) under subsection (a)(1)
(A) prior to ..... days after the plaintiff has given notice of the alleged violation to the EPO/NCO (and to the alleged violator) of such violation, or
(B) if the EPO/NCO has commenced and is diligently prosecuting an action against the alleged violator with respect to such violation. [but in such action any affected person may intervene as a matter of right], or
(2) under subsection (a)(2), prior to ..... days after the plaintiff has given notice to the EPO/NCO that he will commence such action. Notice under this subsection shall be given in a manner prescribed by the EPO/NCO.
(c) In any action under this section, the EPO/NCO, if not a party, may intervene as a matter of right.
(d) The court, in issuing any final order in any action brought pursuant to subsection (a), may at its discretion award the costs of litigation to any party.

11.6 Other Remedies
No provision of this ordinance shall be construed to impair any common law or statutory cause of action, or legal remedy therefrom, of any person for injury or damage arising from any violation of this ordinance or from other law.

11.7 Severability
If any provision of this ordinance is held to be unconstitutional or otherwise invalid by any court of competent jurisdiction, the remaining provisions of the ordinance shall not be invalidated.

11.8 Effective Date
This law/ordinance shall take the effect on ..........................