Zoning Resolution

THE CITY OF NEW YORK
Zohran K. Mamdani, Mayor

CITY PLANNING COMMISSION
Sideya Sherman, Chair

42-40 - PERFORMANCE STANDARDS

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42-40 - PERFORMANCE STANDARDS

LAST AMENDED
6/6/2024

In all #Manufacturing Districts#, after December 15, 1961, any #use# thereafter established or changed to a #use# listed in Use Group I, IV, VI, VIII, IX or X, and every #building or other structure# or open area of a #zoning lot# thereafter #developed#, constructed, or used for any #use# listed in Use Group I, IV, VI, VIII, IX or X, shall comply with each and every performance standard governing noise, vibration, smoke and other particulate matter, odorous matter, toxic or noxious matter, radiation hazards, fire and explosive hazards, humidity, heat or glare applicable to the district in which such #use#, #building or other structure# or open area is located.

If any existing #use# or #building or other structure# is #extended#, #enlarged# or reconstructed after December 15, 1961, the applicable district regulations for each and every performance standard shall apply with respect to such #extended#, #enlarged#, or reconstructed portion or portions of such #use# or #building or other structure#.

In case of any conflict between the Use Groups and the performance standards, the latter shall control.

In case of any conflict between the performance standards and the rules and regulations adopted by the Department of Environmental Protection, the more restrictive shall apply.

42-41 - Performance Standards Regulating Noise

LAST AMENDED
6/6/2024

42-411 - Definitions

LAST AMENDED
6/6/2024

For the purposes of this Section, the following terms are defined:

Decibel

A “decibel" is a unit of measurement of the intensity of sound (the sound pressure level).

Impact noise analyzer

An “impact noise analyzer” is an instrument used in conjunction with the #sound level meter# to measure the peak intensities of short duration sounds.

Octave band

An “octave band” is one of a series of eight bands which cover the normal range of frequencies included in sound measurements. Such #octave bands# serve to define the sound in terms of its pitch components.

Octave band analyzer

An “octave band analyzer” is an instrument used in conjunction with a #sound level meter# to measure sound in each of eight #octave bands#.

Sound level meter

A “sound level meter” is an instrument standardized by the American Standards Association, which is used for measurement of the intensity of sound and is calibrated in #decibels#.

42-412 - Method of measurement

LAST AMENDED
6/6/2024

The “C” network and the “slow” meter response of the #sound level meter# shall be used. Sounds of short duration, as from forge hammers, punch presses, and metal shears, which cannot be measured accurately with the #sound level meter#, shall be measured with the #impact noise analyzer# as manufactured by the General Radio Company, or its equivalent, in order to determine the peak value of the impact. For sounds so measured, the sound pressure levels set forth in Section 42-413 (Maximum permitted decibel levels) may be increased by six #decibels#.

42-413 - Maximum permitted decibel levels

LAST AMENDED
6/6/2024

In all #Manufacturing Districts#, the sound pressure level resulting from any activity, whether open or enclosed, shall not exceed, at any point on or beyond any #lot line#, the maximum permitted #decibel# levels for the designated #octave band# as set forth in the following table for the district indicated.

In the enforcement of this regulation, sounds produced by the operation of motor vehicles or other transportation facilities shall not be included in determining the maximum permitted #decibel# levels.

MAXIMUM PERMITTED SOUND PRESSURE LEVEL
(in #decibels#)

	District		
#Octave Band# (cycles per second)	M1	M2	M3
20 to 75	79	79	80
75 to 150	74	75	75
150 to 300	66	68	70
300 to 600	59	62	64
600 to 1,200	53	56	58
1,200 to 2,400	47	51	53
2,400 to 4,800	41	47	49
Above 4,800	39	44	46

42-414 - Special provisions applying along district boundaries

LAST AMENDED
6/6/2024

Whenever a #Manufacturing District# adjoins a #Residence District#, at any point at the district boundary or within the #Residence District#, the maximum permitted #decibel# levels in all #octave bands# shall be reduced by six #decibels# from the maximum levels set forth in the table in Section 42-413 (Maximum permitted decibel levels).

42-42 - Performance Standards Regulating Vibration

LAST AMENDED
6/6/2024

42-421 - Definitions

LAST AMENDED
6/6/2024

For the purposes of this Section, the following terms are defined:

Frequency
A "frequency" is the number of oscillations per second of a vibration.

Impact vibrations

"Impact vibrations" are earth-borne oscillations occurring in discrete pulses at or less than 100 pulses per minute.

Steady state vibrations

"Steady state vibrations" are earth-borne oscillations that are continuous. Discrete pulses that occur more frequently than 100 times per minute shall be considered to be #steady state vibrations#.

Three-component measuring system

A "three-component measuring system" is a device for recording the intensity of any vibration in three mutually perpendicular directions.

42-422 - Method of measurement

LAST AMENDED
6/6/2024

For the purpose of measuring vibration, a #three-component measuring system# approved by the Commissioner of Buildings shall be employed.

42-423 - Maximum permitted steady state vibration displacement

LAST AMENDED
6/6/2024

In all #Manufacturing Districts#, no activity shall cause or create a #steady state vibration# at any point on any #lot line#, with a displacement in excess of the permitted #steady state vibration# displacement for the #frequencies# as set forth in the following table for the district indicated.

MAXIMUM PERMITTED STEADY STATE VIBRATION DISPLACEMENT

(in inches)

	District		
#Frequency# (cycles per second)	M1	M2	M3
10 and below	.0008	.0020	.0039
10 - 20	.0005	.0010	.0022
20 - 30	.0003	.0006	.0011
30 - 40	.0002	.0004	.0007
40 - 50	.0001	.0003	.0005
50 - 60	.0001	.0002	.0004
60 and over	.0001	.0001	.0004

42-424 - Maximum permitted impact vibration displacement

LAST AMENDED

6/6/2024

In all #Manufacturing Districts#, no activity shall cause or create an #impact vibration#, at any point on any #lot line#, with a displacement in excess of the permitted #impact vibration# displacement for the #frequencies# as set forth in the following table for the district indicated.

MAXIMUM PERMITTED IMPACT VIBRATION DISPLACEMENT
(in inches)

	District		
#Frequency# (cycles per second)	M1	M2	M3
10 and below	.0016	.0040	.0078
10 - 20	.0010	.0020	.0044
20 - 30	.0006	.0012	.0022
30 - 40	.0004	.0008	.0014
40 - 50	.0002	.0006	.0010
50 - 60	.0002	.0004	.0008
60 and over	.0002	.0002	.0008

42-425 - Special provisions applying along district boundaries

LAST AMENDED
6/6/2024

Whenever an M2 or M3 District adjoins a #Residence District#, the #steady state# and #impact vibration# displacement, measured at the district boundary, shall not exceed the maximum permitted for an M1 District for the #frequencies# as set forth in the tables in Section 42-423 (Maximum permitted steady state vibration displacement) or Section 42-424 (Maximum permitted impact vibration displacement).

42-43 - Performance Standards Regulating Smoke, Dust and Other Particulate Matter

LAST AMENDED
6/6/2024

42-431 - Definitions

LAST AMENDED
6/6/2024

For the purposes of this Section, the following terms are defined:

Combustion for indirect heating
"Combustion for indirect heating" is the burning of fuel in equipment, such as steam boilers, water or air heaters, stills, or brew kettles, where there is no contact between the products of combustion and the materials being heated.

Dust

"Dust" is solid #particulate matter# capable of being air- or gas-borne.

Particulate matter

"Particulate matter" is any finely divided liquid or solid matter capable of being air- or gas-borne.

Process weight

"Process weight" is the total weight of all materials used in any process which discharges #dust# into the atmosphere. Such materials shall include solid fuels, but not liquid or gaseous fuels or combustion air.

Smoke

"Smoke" is any visible emission into the open air from any source, except emissions of an uncontaminated water vapor.

Smoke unit

A "smoke unit" is a measure of the quantity of #smoke# being discharged and is the number obtained by multiplying the #smoke# density in a #Standard Smoke Chart number# by the time of emission in minutes. For example, the emission of #Standard Smoke Chart number# 1 for one minute equals one #smoke unit#.

Standard Smoke Chart numbers

"Standard Smoke Chart numbers" are the numbers on the Standard Smoke Chart of the Department of Air Pollution Control that coincide most nearly with the grids on the Standard Smoke Chart indicating graduations of light-obscuring capacity of #smoke#.

42-432 - Maximum permitted emission of smoke

LAST AMENDED

6/6/2024

In all #Manufacturing Districts#, the density of emission of #smoke# during normal operations shall not exceed #Standard Smoke Chart number# 2, and the quantity of #smoke# shall not exceed a maximum of 10 #smoke units# per hour per stack in M1 Districts, 20 such units in M2 Districts, and 30 such units in M3 Districts. The method of measurement, additional limitations on the emission of #smoke# of a density not exceeding #Standard Smoke Chart number# 2, and the maximum permitted density and quantity of #smoke# during special operations such as building new fires, banking, or cleaning fires, soot blowing, or process purging, shall be determined in accordance with rules and regulations adopted by the Department of Environmental Protection.

42-433 - Maximum permitted emission of dust

LAST AMENDED
6/6/2024

(a) Related to #combustion for indirect heating#

In all #Manufacturing Districts#, the emission into the atmosphere of #dust# related to #combustion for indirect heating# from any source shall not exceed the maximum number of pounds of #dust# per million British thermal units heat input per hour as set forth herein:

(1) In M1 Districts

In M1 Districts, the maximum permitted emission shall be 0.50 pounds for minimum-size plants producing a heat input of 10 million or less British thermal units per hour and 0.15 for maximum size plants producing a heat input of 10,000 million or more British thermal units per hour. All intermediate values shall be determined from a straight line plotted on log graph paper.

(2) In M2 or M3 Districts

In M2 or M3 Districts, the maximum permitted emission for such minimum-size plants shall be 0.60 in M2 Districts and 0.70 in M3 Districts, and for such maximum-size plants shall be 0.16 in M2 Districts and 0.18 in M3 Districts. All intermediate values shall be determined from a straight line plotted on log graph paper.

(b) Related to processes

In all #Manufacturing Districts#, the emission into the atmosphere of process #dust# or other #particulate matter# which is unrelated to #combustion for indirect heating# or incineration shall not exceed 0.50 pounds per hour for 100 pounds of #process weight# or 50 pounds per hour for 100,000 pounds of #process weight#. All intermediate values shall be determined from a straight line plotted on log graph paper.

(c) Total limit on emission of #dust# or other #particulate matter# in M1 or M2 Districts

In M1 or M2 Districts the maximum amount of #dust# or other #particulate matter# from all sources including #combustion for indirect heating#, process #dust#, or combustion for incineration which may be emitted from a single stack or vent shall not exceed 33 pounds per hour in M1 Districts, nor 250 pounds per hour in M2 Districts.

(d) Method of measurement and #dust# from incineration

In all #Manufacturing Districts#, the method of measurement and permitted emission of #dust# related to combustion for incineration shall not exceed the maximum allowances established under rules and regulations adopted by the Department of Environmental Protection.

(e) Prevention of wind-blown air pollution

In all #Manufacturing Districts#, all storage areas, yards, service roads, or other untreated open areas within the boundaries of a #zoning lot# shall be improved with appropriate landscaping or paving, or treated by oiling or any other means as specified in rules and regulations adopted by the Department of Environmental Protection, so that #dust# or other types of air pollution borne by the wind from such sources shall be minimized.

42-434 - General control over smoke and other particulate matter

LAST AMENDED
6/6/2024

In addition to the performance standards of regulating #smoke# and other #particulate matter#, the emission of such matter shall be so controlled in manner and quantity of emission as not to be detrimental to or endanger the public health, safety, comfort, or other aspects of the general welfare, or cause damage or injury to property.

42-44 - Performance Standards Regulating Odorous Matter

LAST AMENDED
6/6/2024

42-441 - In M1 or M2 Districts

LAST AMENDED
6/6/2024

In M1 or M2 Districts, the emission of odorous matter shall be in accordance with limits established by the Department of Environmental Protection. In addition to such limits, the emission of odorous matter in such quantities as to be readily detectable at any point along #lot lines# or to produce a public nuisance or hazard beyond #lot lines# is prohibited.

42-442 - In M3 Districts

LAST AMENDED
6/6/2024

In M3 Districts, the emission of odorous matter in such quantities as to produce a public nuisance or hazard at or beyond #lot lines# is prohibited.

42-45 - Performance Standards Regulating Toxic Noxious Matter

LAST AMENDED
6/6/2024

42-451 - Definitions

LAST AMENDED
6/6/2024

For the purposes of this Section, the following term is defined:

Toxic or noxious matter

"Toxic or noxious matter" is any solid, liquid, or gaseous matter, including but not limited to gases, vapors, #dusts#, fumes, and mists, containing properties which by chemical means are:

(a) inherently harmful and likely to destroy life or impair health; or

(b) capable of causing injury to the well-being of persons or damage to property.

42-452 - Regulation of toxic or noxious matter

LAST AMENDED
6/6/2024

In all #Manufacturing Districts#, the emission of #toxic or noxious matter# into the atmosphere shall be in accordance with limits established by the Department of Environmental Protection. In addition to such emission limits, the emission of such matter shall be so controlled that no concentration at or beyond #lot lines# shall be detrimental to or endanger the public health, safety, comfort, and other aspects of the general welfare, or cause damage or injury to property.

42-46 - Performance Standards Regulating Radiation Hazards

LAST AMENDED
6/6/2024

42-461 - Definitions

LAST AMENDED
11/19/1987

For the purposes of this Section, the following term is defined:

Fireproof containers

"Fireproof containers" shall include steel or concrete containers and shall not include lead or other low-melting metals or alloys, unless the lead or low-melting metal or alloys are completely encased in steel.

42-462 - Maximum permitted quantities of unsealed radioactive material

LAST AMENDED
6/6/2024

In M1 Districts, unsealed radioactive materials shall not be manufactured, utilized, or stored (unless such materials are stored in a #fireproof container# at or below ground level) in excess of one million times the quantities set forth in Column 1 of the table in Section 38-2 of the Industrial Code Rule No. 38, relating to Radiation Protection adopted by the Board of Standards and Appeals of the New York State Department of Labor on October 10, 1955, effective December 15, 1955.

In M2 Districts, such materials shall not be manufactured, utilized, or stored (unless such materials are stored in a #fireproof container# at or below ground level) in excess of 10 million times the quantities set forth in Column 1 of the table cited in this Section. In M3 Districts no limits as to such permitted quantities shall apply.

42-463 - Maximum permitted quantities of fissionable materials

LAST AMENDED
6/6/2024

In M1 or M2 Districts, no one of the following fissionable materials shall be assembled at any one point, place, or work area on a #zoning lot# in a quantity equal to or in excess of the amount set forth herein:

Material	Quantity
Uranium-233	200 grams
Plutonium-239	200 grams
Uranium-235	350 grams

In addition, any establishment which provides radiation waste disposal services in the nature of collection or storage of radioactive waste from other #manufacturing uses# shall be prohibited in M1 or M2 Districts.

42-464 - Administration and appeal

LAST AMENDED
6/6/2024

The Department of Health shall have exclusive jurisdiction to enforce and administer these hazards in accordance with the rules and regulations promulgated by the Board of Health. An appeal may be made to the Board of Health to permit the manufacture, utilization, or storage of unsealed radioactive materials or fissionable materials, in excess of the quantities set forth in Section 42-462 (Maximum permitted quantities of unsealed radioactive material) or Section 42-463 (Maximum permitted quantities of fissionable materials). In any case where the Board of Health determines that the radiation hazard on or beyond any #lot line# is remote and minimal, even in the event of an accident, the Board may permit such additional quantity.

42-47 - Performance Standards Regulating Fire and Explosive Hazards

LAST AMENDED
6/6/2024

42-471 - Definitions

LAST AMENDED
6/6/2024

For the purposes of this Section, the following terms are defined:

Flammable or explosive

"Flammable or explosive" materials are materials which produce flammable or explosive vapors or gases under ordinary weather temperature, including liquids with an #open cup flash point# of less

than 100 degrees F.

Free burning

"Free burning" materials are materials constituting an active fuel.

Intense burning

"Intense burning" materials are materials which by virtue of low ignition temperature, high rate of burning, and large heat evolution burn with great intensity.

Moderate burning

"Moderate burning" materials are materials which in themselves burn moderately and may contain small quantities of a higher grade of combustibility.

Open cup flash point

The "open cup flash point" is the temperature at which a liquid sample produces sufficient vapor to flash but not ignite when in contact with a flame in a Tagliabue open cup tester.

Original sealed containers

"Original sealed containers" are containers with a capacity of not more than 55 gallons.

Slow burning

"Slow burning" materials are materials which will not ignite or actively support combustion during an exposure for five minutes to a temperature of 1,200 degrees F. and which, therefore, do not constitute an active fuel.

42-472 - Classifications

LAST AMENDED
6/6/2024

For the purposes of this Section, materials are divided into four classifications or ratings based on the degree of fire and explosive hazard. The rating of liquids is established by specified #open cup flash points# as set forth in this Section, and the Board of Standards and Appeals shall determine the rating of solids under this Section.

(a) Class I includes #slow burning# to #moderate burning# materials. This shall include all liquids with an #open cup flash point# of 182 degrees F. or more.

(b) Class II includes #free burning# to #intense burning# materials. This shall include all liquids with an #open cup flash point# between 100 and 182 degrees F.

(c) Class III includes materials which produce #flammable or explosive# vapors or gases under ordinary weather temperature. This shall include all liquids with an #open cup flash point# of less than 100 degrees F.

(d) Class IV includes materials which decompose by detonation, including but not limited to all primary explosives such as lead azide, lead styphnate, fulminates, and tetracene; all high explosives such as TNT, RDX, HMX, PETN, and picric acid; propellants and components thereof, such as nitrocellulose, black powder, boron hydrides, hydrazine, and its derivatives;

pyrotechnics and fireworks such as magnesium powder, potassium chlorate and potassium nitrate; blasting explosives such as dynamite and nitroglycerine; unstable organic compounds such as acetylides, tetrazoles and ozonides; and strong oxidizing agents such as perchloric acid, perchlorates, chlorates, chlorites, or hydrogen peroxide in concentrations greater than 35 percent.

42-473 - Regulations applying to Class I materials or products

LAST AMENDED
6/6/2024

In all #Manufacturing Districts#, Class I materials or products may be stored, manufactured, or utilized in manufacturing processes or other production.

42-474 - Regulations applying to Class II materials or products

LAST AMENDED
6/6/2024

Class II materials or products may be stored, manufactured or utilized in manufacturing processes or other production only in accordance with the following provisions:

(a) In M1 Districts

In M1 Districts, Class II materials or products shall be stored, manufactured, or utilized subject to the following limitations:

(1) such storage, manufacture or utilization shall be carried on only within #buildings or other structures# which are #completely enclosed# by incombustible exterior walls;

(2) such #buildings or other structures# shall either be set back at least 40 feet from any #lot lines# or, in lieu thereof, all such #buildings or other structures# shall be protected throughout by an automatic fire extinguishing system which shall comply with the requirements set forth in the Administrative Code, and all such structures as storage tanks shall be protected by a fire extinguishing system which shall comply with the requirements set forth in the Administrative Code; and

(3) the storage of Class II materials or products shall be limited to 100,000 gallons.

(b) In M2 Districts

In M2 Districts, Class II materials or products may be manufactured or utilized without limitation. The storage of Class II materials or products shall be limited to 200,000 gallons, except that such limitation shall not apply to storage in underground tanks or storage of finished products in #original sealed containers#.

(1) Special provisions applying along district boundaries

In M2 Districts and within 100 feet of the district boundary of a #Residence District#, a #Commercial District# or an M1 District, Class II materials or products shall be stored, manufactured, or utilized only in accordance with the provisions set forth in Section 42-474, paragraph (a), for M1 Districts.

(c) In M3 Districts

In M3 Districts, Class II materials or products may be stored, manufactured, or utilized without limitation.

(1) Special provisions applying along district boundaries

In M3 Districts and within 100 feet of the district boundary of a #Residence District#, a #Commercial District# or an M1 District, Class II materials or products shall be stored, manufactured, or utilized only in accordance with the provisions set forth in paragraph (a) of this Section for M1 Districts.

42-475 - Regulations applying to Class III materials or products

LAST AMENDED
6/6/2024

Class III materials or products may be stored, manufactured or utilized in manufacturing processes or other production only in accordance with the following provisions:

(a) In M1 Districts

In M1 Districts, Class III materials or products shall not be manufactured in any event, and shall be stored or utilized subject to the following limitations:

(1) such storage or utilization shall be carried on only within #buildings or other structures# which are #completely enclosed# by incombustible exterior walls;

(2) such #buildings or other structures# shall either be set back at least 40 feet from any #lot line# or, in lieu thereof, all such #buildings or other structures# shall be protected throughout by an automatic fire extinguishing system which shall comply with the requirements set forth in the Administrative Code, and all such structures as storage tanks shall be protected by a fire extinguishing system which shall comply with the requirements set forth in the Administrative Code;

(3) the final manufactured product shall have a rating of Class I; and

(4) the storage of Class III materials or products shall be limited to 50,000 gallons.

(b) In M2 Districts

In M2 Districts, Class III materials or products shall not be manufactured in any event and shall be stored or utilized subject to the following limitations:

(1) the final manufactured product shall have a rating of Class II; and

(2) the storage of Class III materials or products shall be limited to 100,000 gallons, except that such limitation shall not apply to storage in underground tanks and storage of finished products in #original sealed containers#.

(3) In M2 Districts, and within 100 feet of the district boundary of a #Residence District#, a #Commercial District# or an M1 District, Class III materials or products shall be stored or utilized only in accordance with the provisions set forth in paragraph (a) of this Section for M1 Districts.

(c) In M3 Districts

In M3 Districts, Class III materials or products may be stored, manufactured, or utilized without limitation.

(1) Special provisions applying along district boundaries

In M3 Districts and within 400 feet of a #Residence District#, a #Commercial District# or an M1 District, the provisions set forth in paragraph (a) of this Section for M1 Districts shall apply. In M3 Districts and within 300 feet of the district boundary of an M2 District, no more than 200,000 gallons of Class III materials or products may be stored, except that such limitation shall not apply to storage in underground tanks or storage of finished products in #original sealed containers#.

42-476 - Regulations applying to Class IV materials or products

LAST AMENDED
6/6/2024

Class IV materials or products shall not be manufactured in any #Manufacturing District# and may be utilized in manufacturing processes or other production in any #Manufacturing District# only when authorized by a special permit granted by the Board of Standards and Appeals in accordance with the provisions of Article VII, Chapter 3. No storage of Class IV materials or products is permitted in any #Manufacturing District# except such #accessory# storage as may be authorized by such special permit for the utilization of such materials or products in manufacturing processes or other production.

42-477 - Regulations applying to oxygen manufacture, storage, or utilization

LAST AMENDED
6/6/2024

Oxygen, gaseous or liquid, shall not be manufactured in any #Manufacturing District# except when authorized by a special permit granted by the Board of Standards and Appeals in accordance with the provisions of Article VII, Chapter 3. Oxygen, gaseous or liquid, may be stored or utilized in all #Manufacturing Districts# in accordance with the provisions set forth in the Administrative Code and subject to the following limitations:

(a) In M1 Districts

In M1 Districts, the total quantity of such oxygen stored shall not exceed 150,000 cubic feet at standard temperature and pressure.

(b) In M2 Districts

In M2 Districts, the total quantity of such oxygen stored shall not exceed 500,000 cubic feet at standard temperature and pressure.

(c) In M3 Districts

In M3 Districts, the total quantity of such oxygen stored is unlimited.

42-48 - Performance Standards Regulating Humidity, Heat or Glare

LAST AMENDED
6/6/2024

42-481 - Regulation applying to M1 Districts

LAST AMENDED
6/6/2024

In M1 Districts, any activity producing excessive humidity in the form of steam or moist air, or producing intense heat or glare, shall be carried out in such a manner as not to be perceptible at or beyond any #lot line#.

42-482 - Regulation applying to M2 Districts

LAST AMENDED

6/6/2024

In M2 Districts, any activity producing excessive humidity in the form of steam or moist air, or producing intense heat or glare, shall be carried out within an enclosure and in such a manner as not to be perceptible at or beyond any #lot line#.

42-483 - Regulation applying to M3 Districts

LAST AMENDED
6/6/2024

When an M3 District adjoins any other district, any activity producing excessive humidity in the form of steam or moist air, or producing intense heat or glare, shall be carried out in such a manner as not to be perceptible at or beyond the district boundary.