2005 Street Tree Census

Data Guide and Field Definitions

NYC Parks

Overview

A detailed history of the 2005 Street Tree Census is available on the Parks website, here: http://www.nycgovparks.org/trees/tree-census/2005-2006

The data contained in this dataset has been modified from the raw data collected and entered in by volunteers in order to make it more accessible to the public. What we've done is to take the coded values in the original dataset and converted them to human-readable values. Those codes and values are fully explained for each field below, and the instructions individually given to volunteers to collect each data point are included.

Several additional fields have been added to make it easier to analyze the dataset and join it to other datasets – again, these fields will be explained later.

A note on XY Coordinates / Latitude and Longitude

Included in this dataset are two sets of coordinates to locate each tree record. It's important to note that these coordinates represent an attempt to geocode the address recorded for each tree in the census and assign it a mappable location. Geocoding like this has a lot of problems; most notably, it can't deal (or, more accurately, we haven't found a way to make it deal) with the fact that many of the trees in question aren't directly located at the address recorded – they're near to it, across the street from it, or around the corner from it. This is explained in the data in a way a human could understand on a tree-by-tree basis, but isn't adequately reflected in the automated process used to assign a physical location to each record.

The result is a dataset good for some map uses and not for others. 'Good' and 'bad' here mean that the known issues with the dataset's map accuracy will produce accurate or inaccurate conclusions. Most revolve around the fact that the geocoded inaccuracy is less of a problem when you aggregate the points in a larger area, and more of a problem the smaller the area you're looking at.

Examples of Good Uses:

- Looking for neighborhood-by-neighborhood trends
- Most/least common species in a given area
- Neighborhood change from the 1995 tree census
- Correlating tree condition with economic factors in a given census tract

Examples of Bad Uses:

- Trying to find a tree In the real world based on the coordinates in this dataset
- Correlating tree condition with site-specific spatial datasets, like building shadows
- Correlating tree condition with the building it appears to be in front of

Notes on Specific Fields

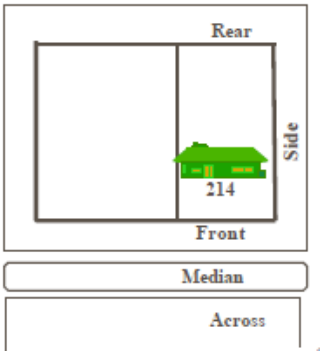
cen_year
This is the year the tree was inventoried in. Data collection for the 2005 census spanned multiple seasons. Data is in YYYY format.

Tree_dbh
The diameter of the tree in whole inches, measured at breast height. (4.5 feet from the ground.)

Address
This is the house number and street recorded for the tree.

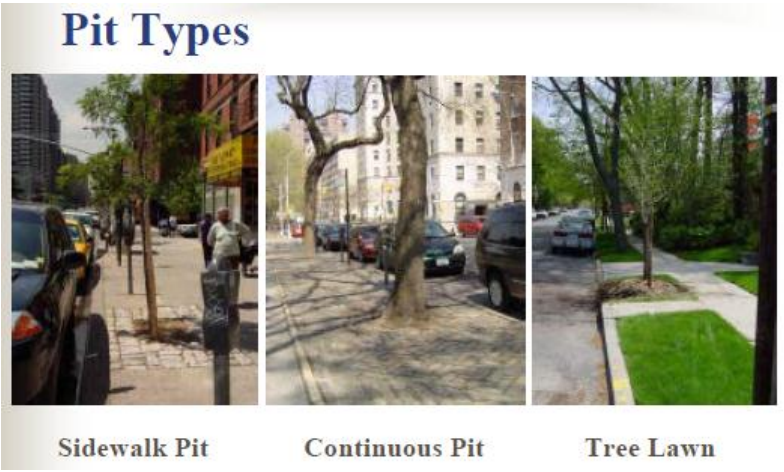
Tree_loc
Establishes the location of the tree in relation to the address provided. Values include:

Code *	Value
1	Front
2	Side
3	Rear
4	Across
5	Adjacent
6	Median
7	Side/Across
8	Side/Median
9	Assigned



pit_type
Type of Pit tree is growing in:

Code	Value *
1	Sidewalk Pit
2	Continuous Pit
3	Lawn



Soil_lvl
Soil level of the tree pit

Code *	Value
1	Above
2	Level
3	Below

status

Condition of tree. Values include:

Code *	Value
1	Excellent
2	Good
3	Poor
4	Dead
5	Shaft
6	Stump
7	Empty Pit

These are defined as:
Excellent: full, well balanced crown and limb structure; leaves

normal size color; no dead or broken branches; trunk solid; bark intact.

Good: crown uneven or misshapen; some mechanical damage to bark or trunk; some signs of insects or disease; leaves somewhat below normal size and quantity; some dead or broken branches (less than half of the tree).

Poor: large dead limbs with over one- half of the tree already dead or removed; large cavities; drastic deformities; leaves significantly below normal size and quantity; severe insect or disease damage.

Dead: dead tree; leaves absent; twigs brittle.

Shaft: all branches removed; trunk left standing; sprouts may or may not be evident.

Stump: stump shorter than breast height; leaves entirely absent or present only on stump sprouts

Empty pit: Pit contains exposed soil and no tree

Spc_latin

The scientific name of the species.

Spc_common

The common name of the species.

Vertical Treatment

In the 2005 Census, one type of tree data collected was 'vertical treatment,' referring to things such as tree guards and walls that affect the tree and are roughly parallel to the trunk. We've reformatted the data to the following fields to make it easier to identify trees that have each condition:

Vert_other: Other Vertical Treatment Present
vert_pgrd: Perimeter guard present
vert_tgrd: Tall guard present
vert_wall: Walled tree well present

The original data had the following unique values:

Value	Value_Long	Code *
Perimeter Guard	Perimeter Guard	1
Tall Guard	Tall Guard	2
Wall	Wall	3
Other	Other	4
None	None	5
	Perimeter and Tall Guards	1|2
	Perimeter and Tall Guards and Wall	1|2|3
	Perimeter and Tall Guards, Wall, and Other	1|2|3|4
	Perimeter and Tall Guards and Other	1|2|4
	Perimeter Guard and Wall	1|3
	Perimeter Guard, Wall, and Other	1|3|4
	Perimeter Guard and Other	1|4
	Perimeter and Tall Guards and Other	1|4|2
	Perimeter Guard	1|5
	Perimeter and Tall Guards	2|1
	Tall Guard and Wall	2|3
	Tall Guard, Wall, and Other	2|3|4
	Tall Guard and Wall	2|3|5
	Tall Guard and Other	2|4
	Tall Guard	2|5
	Perimeter Guard and Wall	3|1
	Tall Guard and Wall	3|2
	Wall and Other	3|4
	Wall	3|5
	Perimeter Guard and Other	4|1
	Tall Guard and Other	4|2
	Wall and Other	4|3
	Wall	4|5

Horizontal Treatment

Another type of data collected was 'Horizontal Treatment,' referring to things affecting the tree that were roughly parallel to the ground. We've reformatted these fields as well to the following:

horz_blck: Block pavers present
horz_grate: Tree grates present
horz_plnt: Plantings present
horz_other: Other horizontal treatment present

Horizontal *	Cnt_Horizontal	Value
1	119524	Blocks
1|2	256	Blocks and Grate
1|2|3	73	Blocks, Grate, and Plantings
1|2|3|4	2	Blocks, Grate, Plantings, and Other
1|2|4	7	Blocks, Grate, and Other
1|3	6853	Blocks and Plantings
1|3|4	357	Blocks, Plantings, and Other
1|3|5	17	Blocks and Plantings
1|4	2169	Blocks and Other
1|4|3	2	Blocks, Plantings, and Other
1|4|5	3	Blocks and Other
1|5	163	Blocks
2	6420	Grate
2|1	2	Blocks and Grate
2|3	260	Grate and Plantings
2|3|4	10	Grate, Plantings, and Other
2|4	156	Grate and Other
2|5	11	Grate
3	39593	Plantings
3|1	78	Blocks and Plantings
3|1|2	1	Blocks, Grate, and Plantings
3|1|4	1	Blocks, Plantings, and Other
3|2	7	Grate and Plantings
3|4	2130	Plantings and Other
3|4|1	1	Blocks, Plantings, and Other
3|5	32	Plantings
4	14402	Other
4|1	51	Blocks and Other
4|1|3	1	Blocks, Plantings, and Other
4|2	1	Grate and Other
4|2|1	2	Blocks, Grate, and Other
4|3	28	Plantings and Other
4|5	14	Other
5	399745	None

Tree Grate

Block Paving

Tree Pit With Plantings

Other?

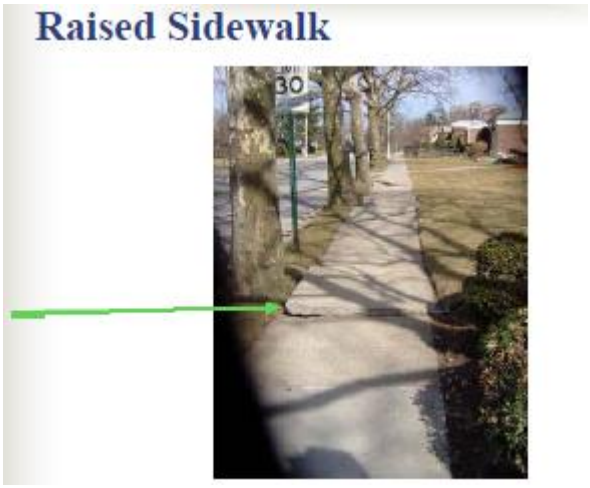
Sidewalk Condition

The condition of the sidewalk immediately adjacent to the tree was also collected, and split out similarly to the horizontal and vertical treatments. Fields include:

sidw_crack: Cracked sidewalk present
sidw_raise: Raised sidewalk present

Since a 'good sidewalk' is basically one lacking the problems mentioned, we did not include a field specifically indicating 'good' to avoid confusion where both 'good' and a problem were mentioned.

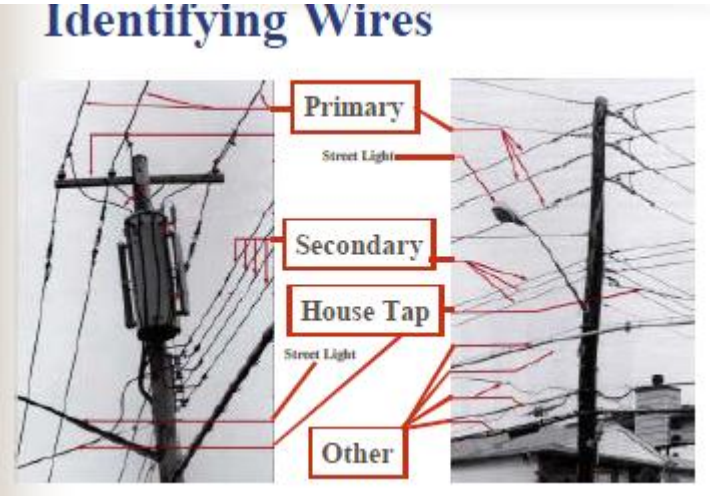
Sidewalk *	Cnt_Sidewalk	Value
	1	None
|	2	None
1	390150	Good
1|2	1082	Good, Cracked
1|2|3	60	Good, Cracked, and Raised
1|3	1363	Good and Raised
1|3|4	2	Good and Raised
1|4	199	Good
2	59758	Cracked
2|	1	Cracked
2|1	7	Good and Cracked
2|3	47031	Cracked and Raised
2|3|4	25	Cracked and Raised
2|4	37	Cracked
3	49408	Raised
3|1	3	Good and Raised
3|2	205	Cracked and Raised
3|3	1	Raised
3|4	30	Raised
4	43007	None



Overhead Wires

This field indicates the presence of wires over the tree. Note that no indication is provided about whether the wires are simply above the tree or in among the branches. Fields include:

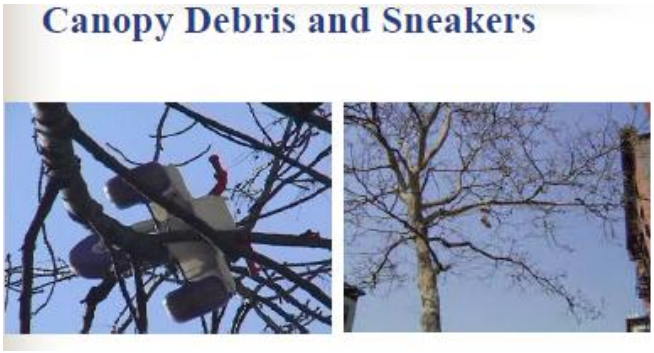
Wire_htap: Indicates the presence of house tap wires
Wire_prime: Indicates the presence of primary wires
wire_2nd: indicates the presence of secondary wires
wire_other: Indicates the presence of other wires

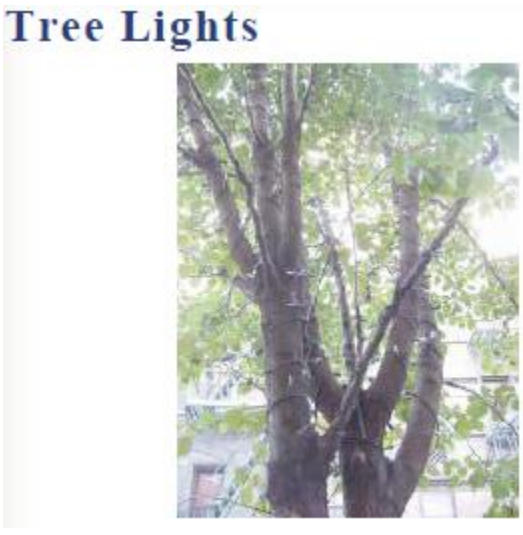


Infrastructure Conflicts

Refers to problems or conflicts the problem may have in its branches or in the tree bed. Up to four could be included on any one tree. These were also separated into separate fields, including:

Inf_canopy: Canopy debris present
inf_guard: Choking guard or grate present
inf_wires: Choking wires present
inf_paving: Close paving present
inf_outlet: Electrical outlet present
inf_shoes: Sneakers present
inf_lights: Tree lights present
inf_other: Other infrastructure conflicts present





Trnk_dmg

Describes specific damage or wounds found on the trunk. Values include:

Code *	Value
1	Torn Bark
2	Trunk Wound
3	Cavity
4	None

Zipcode

2015 Zipcode that the tree falls in. This value was added later by using the geocoded location, and uses zipcodes as they appear in 2015.

Zip_city

City, as derived from the zipcode.

Cb_num

Community Board that the tree falls in. This value was added later using geocoded location, using community boards from 2015.

Borocode

Borough tree is in, using a one-digit borough code:
1 – Manhattan, 2 – Bronx, 3 – Brooklyn, 4 – Queens, 5 – Staten Island

boroname

Borough tree is in, full text

Cncldist

New York City Council District tree point is in. This value was added later using geocoded location.

St_assem

State Assembly District tree point is in. This value was added later using geocoded location.

St_senate

State Senate District tree point is in. This value was added later using geocoded location.

nta

nta code for the neighborhood tabulation area the tree point is in, from the 2010 census. This value was added later using geocoded location, and is based on NTA polygons from the Department of City Planning.

Nta_name

Nta name for the neighborhood tabulation area the tree point is in, from the 2010 census. This value was added later using geocoded location, and is based on NTA polygons from the Department of City Planning. These are similar to colloquial neighborhood names, though there is no exact official boundary for neighborhoods.

Boro_ct

Boro_ct for the census tract from the 2010 US Census that the tree point is in. This value was added later using geocoded location.

State

US State tree point is in. Value is 'New York' for all records.

X / Y

X field: x_sp
y field: y_sp

The coordinates of the geocoded tree location, using the projected coordinate system NAD_1983_StatePlane_New_York_Long_Island_FIPS_3104_Feet. This coordinate system corresponds to the majority of data layers availabe on NYC open data.

Latitude / Longitude

The coordinates of the point in decimal degrees.