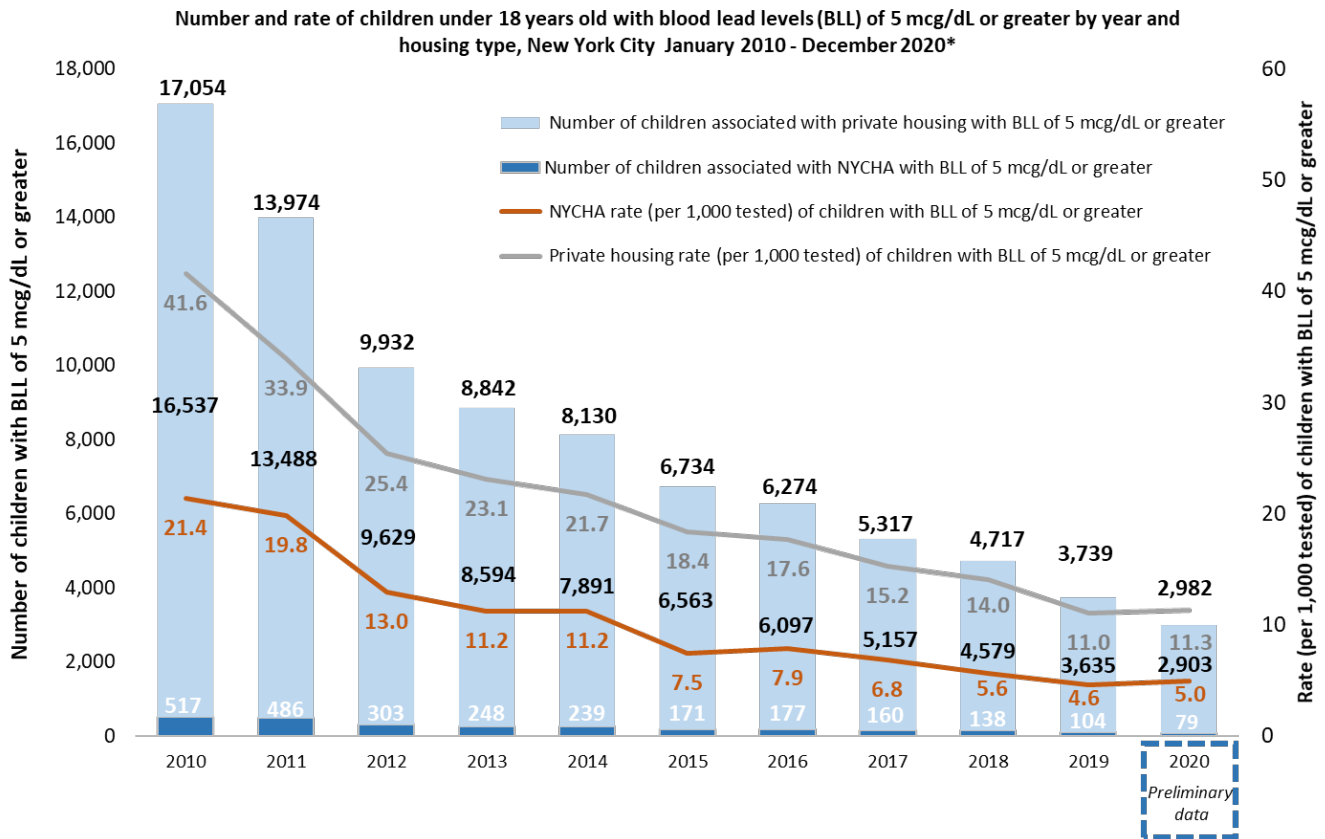


Childhood Blood Lead Level Surveillance
Quarters 1-4 2020, New York City
June 2021

This report details trends in childhood blood lead surveillance data in New York City, and has been updated to include data through the fourth quarter of 2020. The number and rate of children with elevated blood lead levels in New York City are at a historic low and continue to decline. Between 2005 and 2020 we have seen a 93% decrease in the number of children with blood lead levels of 5 mcg/dL or greater among children under 6 years of age and a 93% decrease among children under 18 years of age.

While the decline in lead exposure has been observed in children associated with both public and private housing, children associated with public housing typically have lower rates of elevated blood lead levels than children associated with private housing. In 2020, the elevated blood lead level rate among children associated with private housing was 11.3 per 1,000 children tested, and among children associated with NYCHA housing, the rate was 5.0 per 1,000 children tested. Children associated with private housing are more than twice as likely to be exposed to lead in their environment as children associated with NYCHA housing.

The COVID-19 public health emergency has led to significant changes in health care utilization – including a drop in blood lead testing among children. For this reason, 2020 surveillance data should be interpreted with caution.

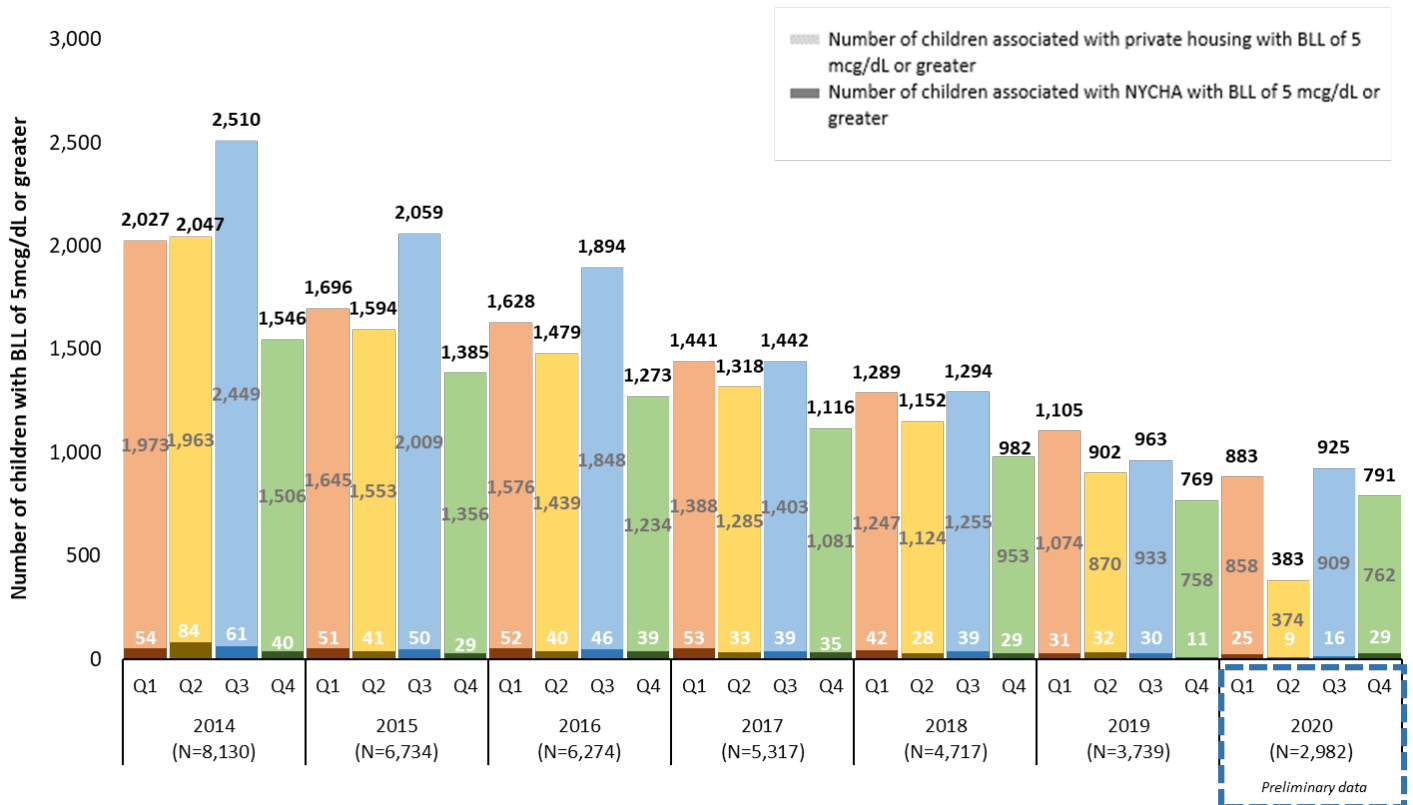


*2020 data are preliminary. The COVID-19 public health emergency has led to significant changes in health care utilization – including a drop in blood lead testing among children. For this reason, 2020 surveillance data should be interpreted with caution.

Note: The data above represents unique children per year. Adding across years will result in duplicate counts of individual children over time. Between January 2010 and December 2020 there were 69,592 children under the age of 18 who had a blood lead level of 5 mcg/dL or greater; 2,209 (3%) of these children were associated with NYCHA.



Number of children under 18 years old with blood lead levels (BLL) of 5 mcg/dL or greater by quarter and housing type, New York City January 2014 - December 2020*



*2020 data are preliminary. The COVID-19 public health emergency has led to significant changes in health care utilization – including a drop in blood lead testing among children. For this reason, 2020 surveillance data should be interpreted with caution.

Note 1: Each color represents a quarter (Q) in the respective years (Orange = Q1, Yellow = Q2, Blue = Q3, Green = Q4).

Note 2: The data above represent unique children per year. Adding across years will result in duplicate counts of individual children over time. Between January 2014 and December 2020 there were 30,138 unique children under the age 18 who had a blood lead level of 5 mcg/dL or greater; 877 (3%) of these children were associated with NYCHA.

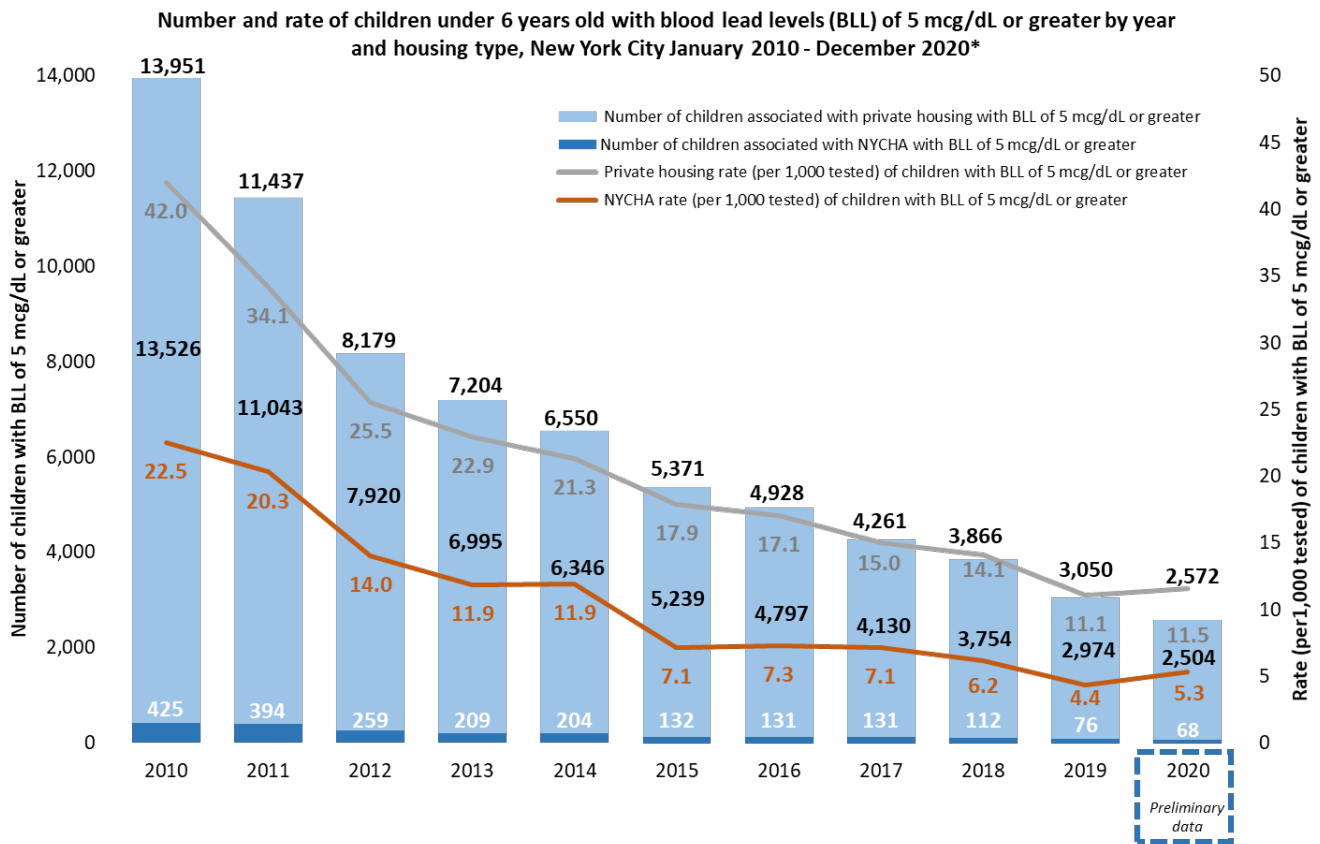
Comparison of each quarter in a given year to the corresponding quarter in each previous year shows a declining trend in the number of children with elevated blood lead levels from 2014 through the third quarter of 2020. The exception is the fourth quarter of 2020, where there was a small increase. This increase should be interpreted with caution due to COVID-19 disruptions in testing.

From January to March 2020, there were 883 children under age 18 with blood lead levels of 5 mcg/dL or greater, a 20% reduction compared to 1,105 children during the same time period in 2019.

From April to June 2020, there were 383 children under age 18 with blood lead levels of 5 mcg/dL or greater, a 58% reduction compared to 902 children during the same time period in 2019. This decline is largely due to a drop in childhood testing for lead exposure during the early months of the COVID-19 public health emergency.

From July to September 2020, there were 925 children under age 18 with blood lead levels of 5 mcg/dL or greater, a 4% reduction compared to 963 children during the same time period in 2019.

From October to December 2020, there were 791 children under age 18 with blood lead levels of 5 mcg/dL or greater, a 3% increase compared to 769 children during the same time period in 2019.



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Note: The data above represents unique children per year. Adding across years will result in duplicate counts of individual children over time. Between January 2010 and December 2020 there were 57,913 children under the age of 6 who had a blood lead level of 5 mcg/dL or greater; 1,843 (3%) of these children were associated with NYCHA.

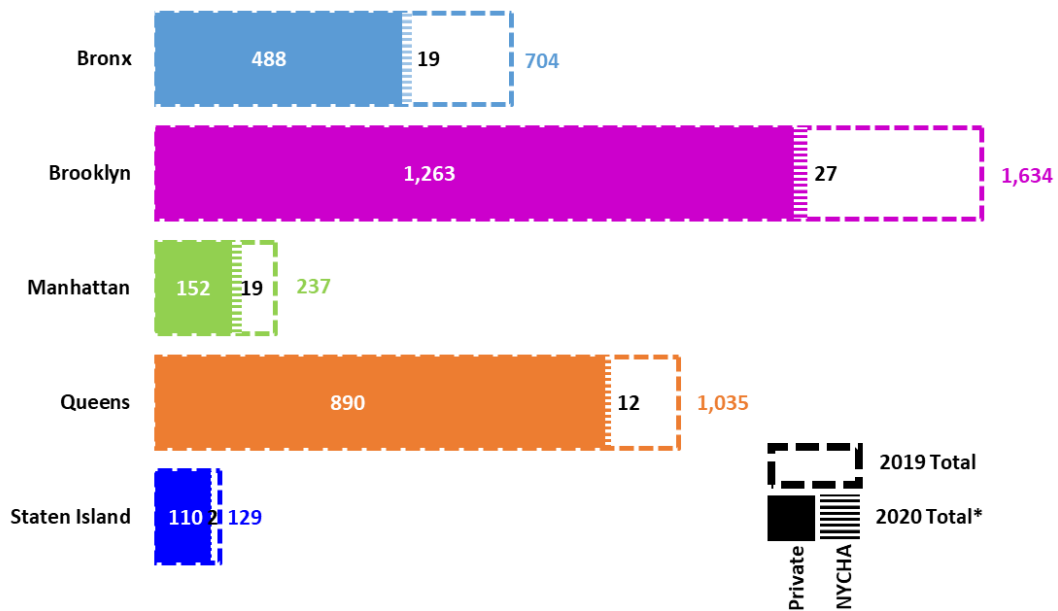
Exposure to lead presents the greatest risk to children under 6 years of age because they are growing rapidly and because they explore the world with hand-to-mouth activity.

In 2020, 2,572 children younger than 6 years old had a blood lead level of 5 mcg/dL or greater; 68 were associated with public housing. This represents a decline of 16% citywide compared to 2019 when there were 3,050 children under age 6 with blood lead levels of 5 mcg/dL or greater and 76 children associated with NYCHA.

The rate of elevated blood lead levels is more than twice as high for children associated with private housing as for children associated with NYCHA housing. In 2020, the rate of children with elevated blood lead levels associated with private housing was 11.5 per 1,000 tested and for children associated with public housing the rate was 5.3 per 1,000 tested. This represents an increase compared to 2019 of 4% and 22%, respectively. This increase is likely because fewer children were tested for elevated blood lead levels in 2020, and those tested were likely a higher risk for lead exposure.

These 2020 trends should be interpreted with caution. The COVID-19 public health emergency has caused dramatic changes in health care utilization which may be driving these changes.

Number of children under 18 years old with blood lead levels of 5 mcg/dL or greater by borough of residence and type of housing, New York City 2020* data compared to 2019 total



*2020 data are preliminary. The COVID-19 public health emergency has led to significant changes in health care utilization – including a drop in blood lead testing among children. For this reason, 2020 surveillance data should be interpreted with caution.

Number of children tested for lead poisoning by age, blood lead level (BLL), and residence type, New York City, January 2014 - December 2020*

Housing Type	BLL (mcg/dL)	2014		2015		2016		2017		2018		2019		2020*	
		0-5 years	6-17 years	0-5 years	6-17 years	0-5 years	6-17 years	0-5 years	6-17 years	0-5 years	6-17 years	0-5 years	6-17 years	0-5 years	6-17 years
Private housing	5-9	5,410	1,316	4,351	1,134	3,992	1,099	3,354	871	3,057	713	2,352	549	1,966	328
	10-14	599	162	580	126	515	128	483	99	423	69	367	72	336	37
	15-44	327	65	302	60	278	68	281	56	259	43	242	37	192	32
	45+	10	2	6	4	12	5	12	1	15	0	13	3	10	2
	Total children tested	297,418	65,565	292,810	64,063	281,074	64,407	274,928	63,669	266,051	60,924	268,320	61,638	216,887	40,985
NYCHA housing	5-9	181	31	112	34	114	39	108	22	89	18	68	17	53	8
	10-14	19	3	10	5	7	5	19	3	13	5	4	3	10	0
	15-44	4	1	10	0	9	1	4	3	10	3	4	7	5	3
	45+	0	0	0	0	1	1	0	1	0	0	0	1	0	0
	Total children tested	17,087	4,242	18,489	4,456	17,906	4,534	18,402	5,120	18,153	6,358	17,433	5,176	12,826	3,096
Citywide Total	5-9	5,591	1,347	4,463	1,168	4,106	1,138	3,462	893	3,146	731	2,420	566	2,019	336
	10-14	618	165	590	131	522	133	502	102	436	74	371	75	346	37
	15-44	331	66	312	60	287	69	285	59	269	46	246	44	197	35
	45+	10	2	6	4	13	6	12	2	15	0	13	4	10	2
	Total children tested	314,505	69,807	311,299	68,519	298,980	68,941	293,330	68,789	284,204	67,282	285,753	66,814	229,713	44,081

*Preliminary data. The COVID-19 public health emergency has led to significant changes in health care utilization – including a drop in blood lead testing among children. For this reason, 2020 surveillance data should be interpreted with caution.

Note: The data above represents unique children per year. Adding across years will result in duplicate counts of individual children over time.

Between 2014 and 2019, there was a declining trend in the number of children exposed to lead across all blood lead level groups. This trend continued in 2020. However, due to changes in health care utilization associated with the COVID-19 public health emergency, it is difficult to compare 2020 surveillance data to similar periods in past years.

**Concerned about lead poisoning?
Here's what you can do:**

Lead poisoning is preventable. Avoid exposure.

- Report peeling or damaged paint to your building owner. Building owners are required to safely fix peeling paint. If they do not fix peeling paint, or if work is being done in an unsafe manner (for example, creating dust that is not being contained), you should [report them online](#) or by calling 311.
 - NYCHA residents concerned about their home or their children can call 718-707-7771.
- Keep children away from peeling paint and home renovations.
- Wash floors and windowsills often. Wash children's hands and toys, too.
- Remove shoes before entering your home.
- Wash work clothes separately from the family laundry if someone in your household works in construction.
- Learn more about avoiding products that may contain lead, such as imported pottery, food and cosmetics, and traditional medicines. Visit nyc.gov/health.

Get tested.

- A blood test is the only way to find out if you or your child have an elevated blood lead level.
- In New York State, children must be tested for lead poisoning at ages 1 and 2, and screened for risk up to age 6.
- Ask your doctor about testing older children if you think they may have been exposed to lead.
- Pregnant women should be assessed for lead exposure at their first prenatal visit.
- Call 311 for help finding a doctor or clinic.

Data Notes and Definitions

- Data in this report were collected during routine childhood lead surveillance by the New York City Department of Health and Mental Hygiene between January 2010 and December 2020.
- Data for 2020 are preliminary. Numbers and categorization of children by blood lead level, borough and type of housing can change for a variety of reasons, including address change, misreported addresses and invalid blood tests. The COVID-19 public health emergency has led to significant changes in health care utilization; 2020 surveillance data should be interpreted with caution.
- Each child is counted only once per year, but the data do not represent unique children if added over multiple years. NYCHA housing is categorized based on the address listed on the laboratory report of the child's highest blood lead level in a given period. The child's highest venous test is used first, and if not available, the finger-stick test or unknown test type is used.