

# Shifting the Discourse:

## Tackling Childhood Obesity Or Is Poverty Causing Us to Gain Weight?

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# The Crux of the Problem?

\$ The cost of HEALTHY EATING \$



312 CALORIES

\$3.00 =



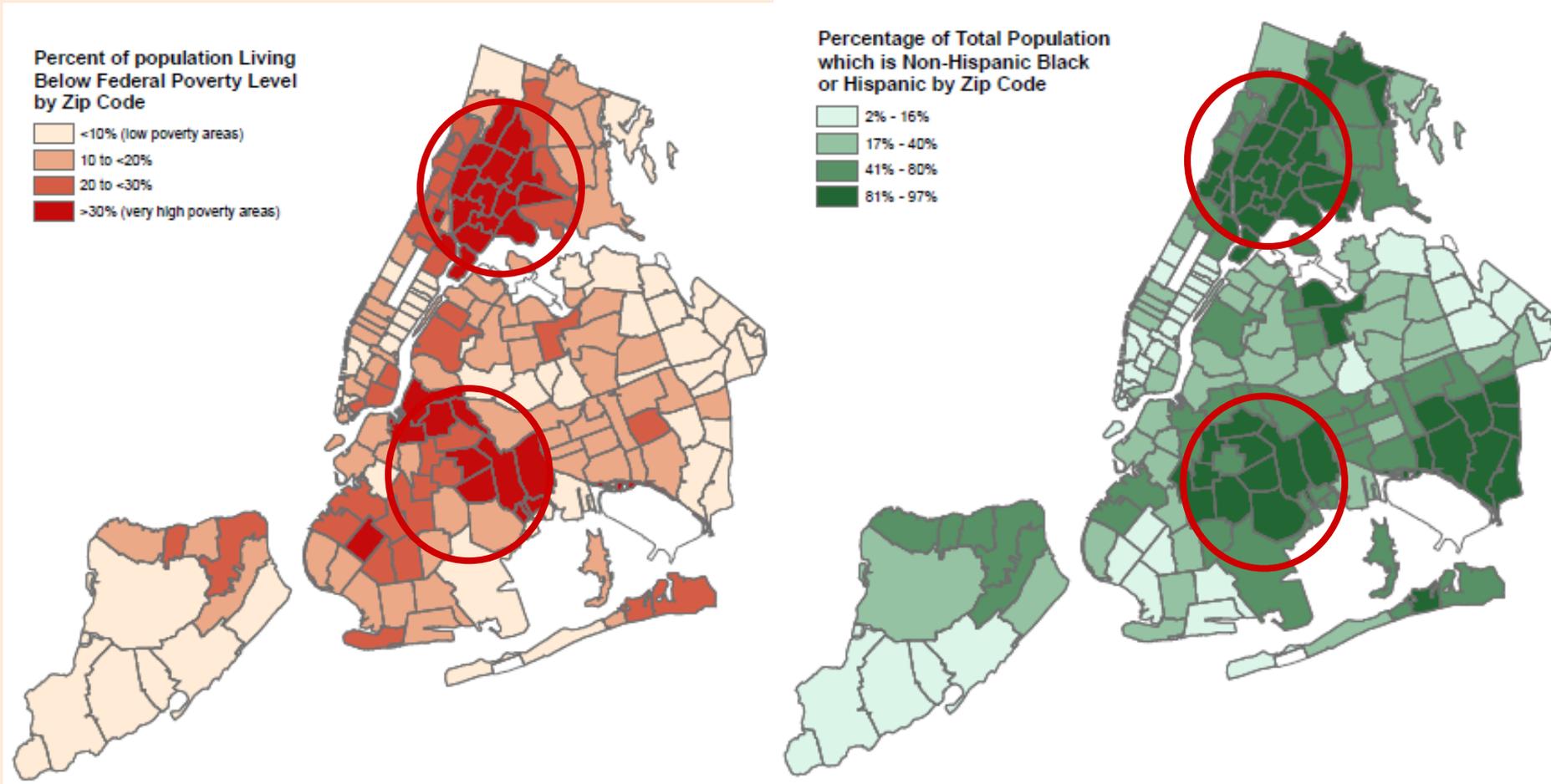
3,767 CALORIES

# 2016 POVERTY GUIDELINES FOR THE 48 CONTIGUOUS STATES AND THE DISTRICT OF COLUMBIA

Persons in family	Poverty Guideline
1	\$11,880
2	\$16,020
3	\$20,160
4	\$24,300
5	\$28,440

Head Start, SNAP, the National School Lunch Program, the Low-Income Home Energy Assistance Program, and the Children's Health Insurance Program use poverty guidelines

# Poverty & Race in New York City

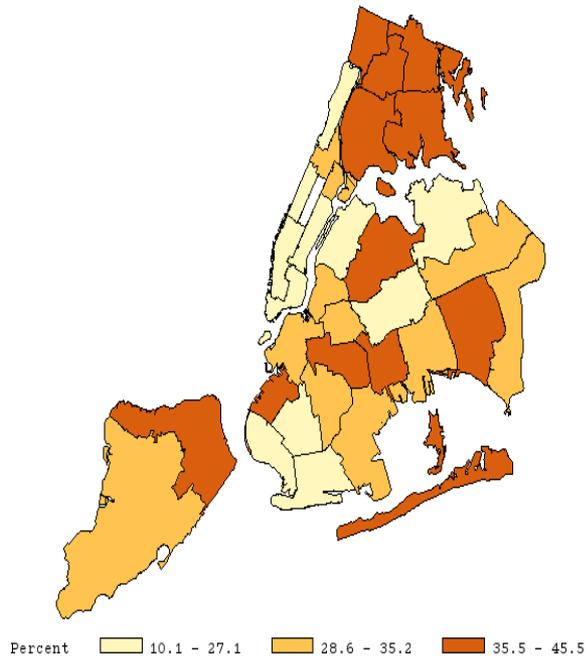


Sources: Neighborhood poverty (based on zip code) defined as percent of residents with incomes below 100% of the Federal Poverty Level, per American Community Survey 2007-2011. Population (based on zip code) defined as percent of non-Hispanic black and Hispanic residents, per 2010 Census.

# High Risk Neighborhoods

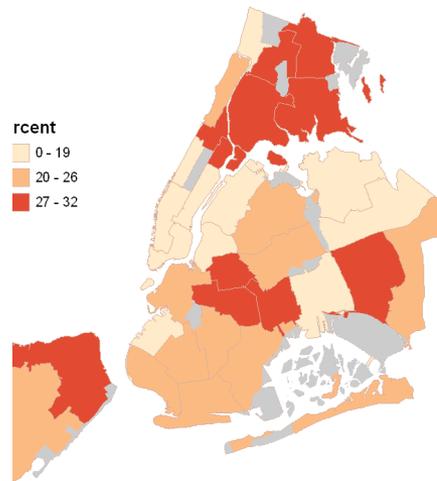
## NYC Community Health Survey 2010

Percentage who drink one or more sugar-sweetened beverages per day by neighborhood



Bureau of Epidemiology Services, NYC DOHMH

## Percent Obese



## Percent with Diabetes

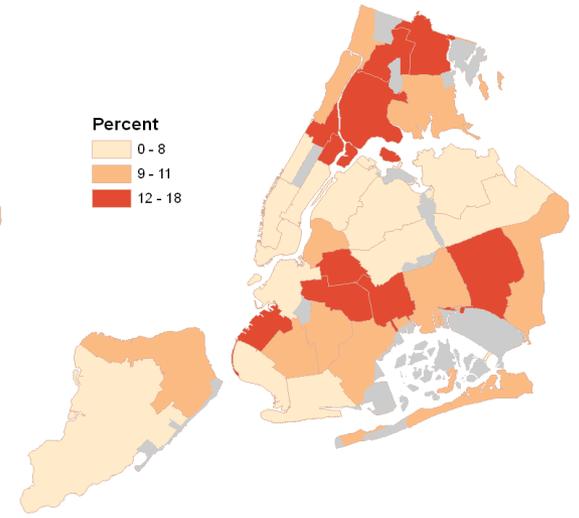
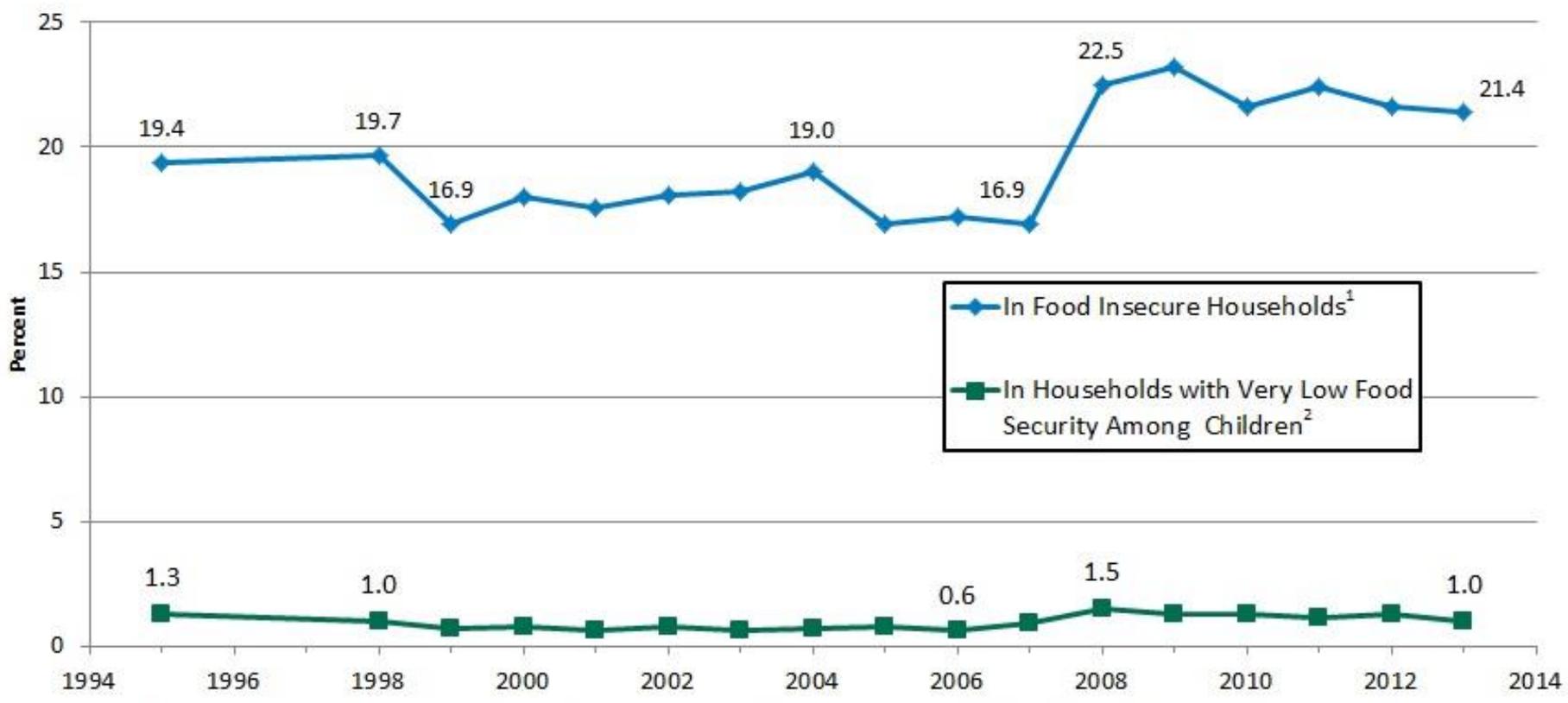


Figure 1

# Percentage of Children (0-17) in Food-Insecure Households: Selected Years, 1995-2013



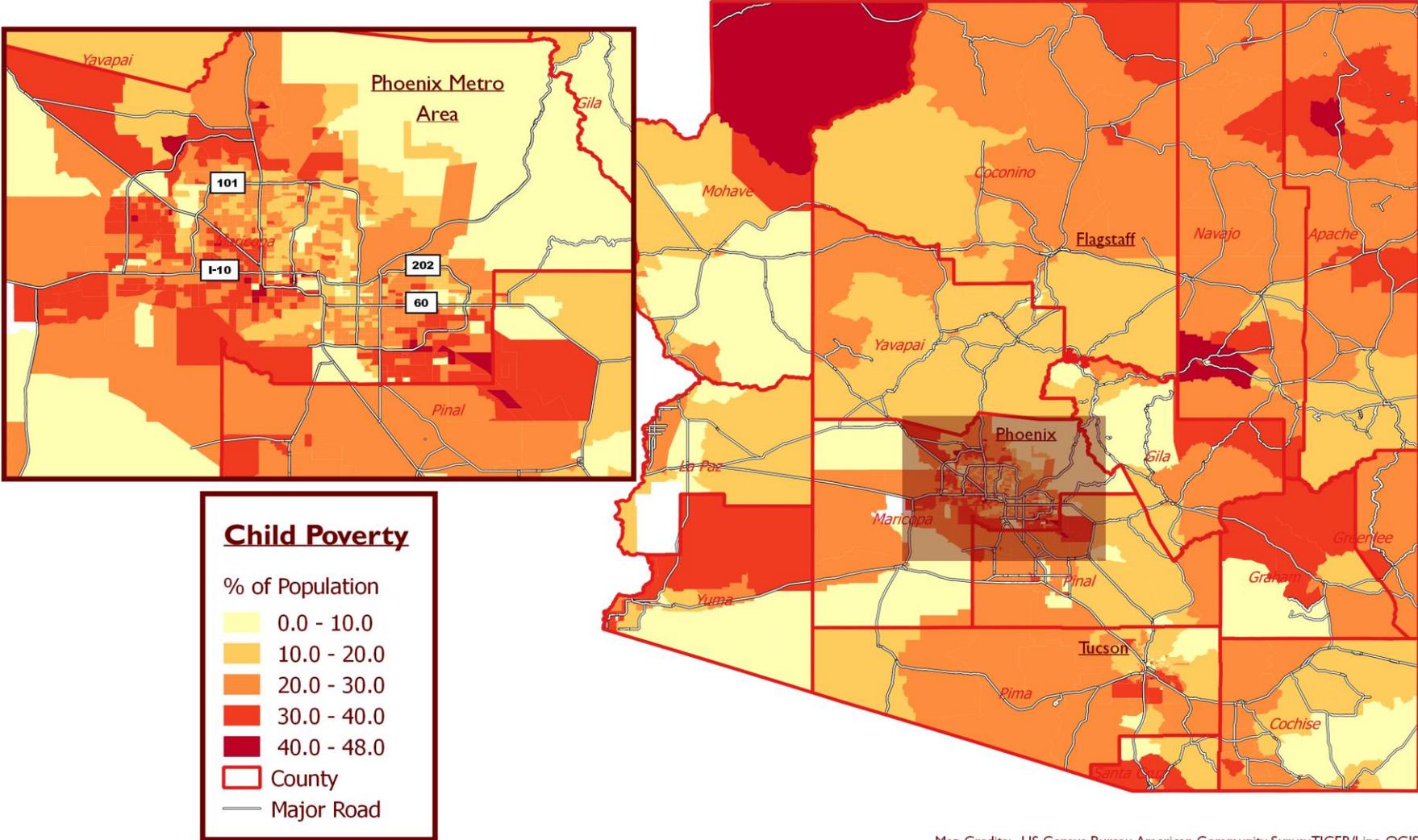
<sup>1</sup>Either adults or children or both were food insecure. At times they were unable to acquire adequate food for active, healthy living for all household members because they had insufficient money and other resources for food.

<sup>2</sup>In these households, eating patterns of one or more children were disrupted and their food intake was reduced below a level considered adequate by their caregiver. Prior to 2006, the category "with very low food security among children" was labeled "food insecure with hunger among children." USDA introduced the new label based on recommendations by the Committee on National Statistics. Sources: Data for 1995, 1999, 2001-2012 Federal Interagency Forum on Child and Family Statistics. (2012). *America's children in brief: Key national indicators of well-being, 2012*. Washington, DC: U.S. Government Printing Office. Table ECON 3. Data for 1998 and 2000: Coleman-Jensen, A., Nord, M., Andrews, M., and Carlson, S. (2012). *Household food security in the United States*

in 2011. United States Department of Agriculture. Economic Research Service. Tables: 1B and S-3. Data for 2013: Coleman-Jensen, A., Gregory, C., and Singh, A. (2014). *Household food security in the United States in 2013: Statistical supplement*. United States Department of Agriculture. Economic Research Service. Table S-3. Available at: <http://www.ers.usda.gov/publications/ap-administrative-publication/ap066.aspx>



# Child Poverty in Arizona



Map Credits: US Census Bureau, American Community Survey, TIGER/Line, QGIS

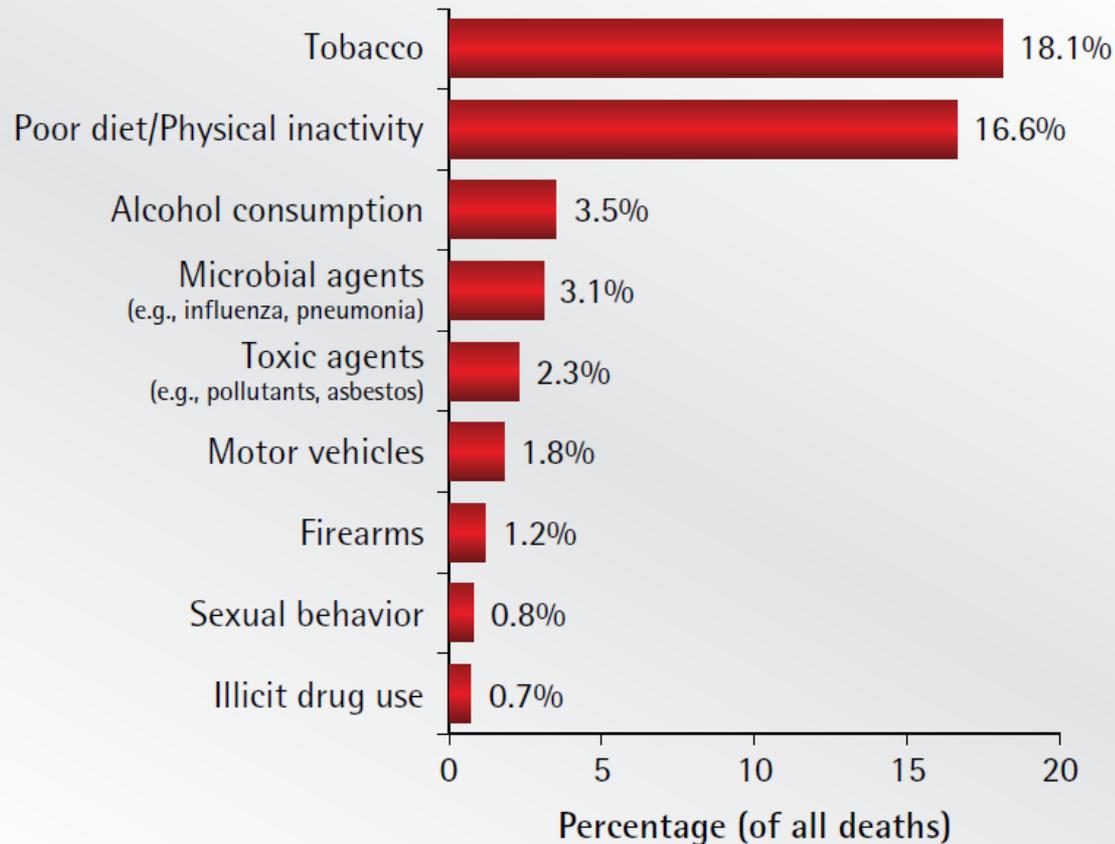
# Self-Sufficiency Standard Arizona 2012

Counties	Adult	Adult + Pre-Schooler	Adult + PreSchooler School-Age	2 Adults + Preschooler School-Age
COCHISE	\$8.44	\$15.35	\$18.82	\$11.12
COCONINO	\$10.60	\$18.37	\$21.55	\$12.48
MARICOPA	\$10.19	\$19.99	\$24.20	\$12.48
MOHAVE	\$9.61	\$16.61	\$20.15	\$11.82
NAVAJO	\$8.43	\$16.42	\$19.74	\$11.60
PIMA	\$9.41	\$18.32	\$22.17	\$12.77
PINAL	\$9.92	\$19.94	\$23.60	\$13.58
YAVAPAI	\$9.19	\$17.34	\$20.44	\$11.86
YUMA	\$9.21	\$15.84	\$19.48	\$11.57

# How does it compare...

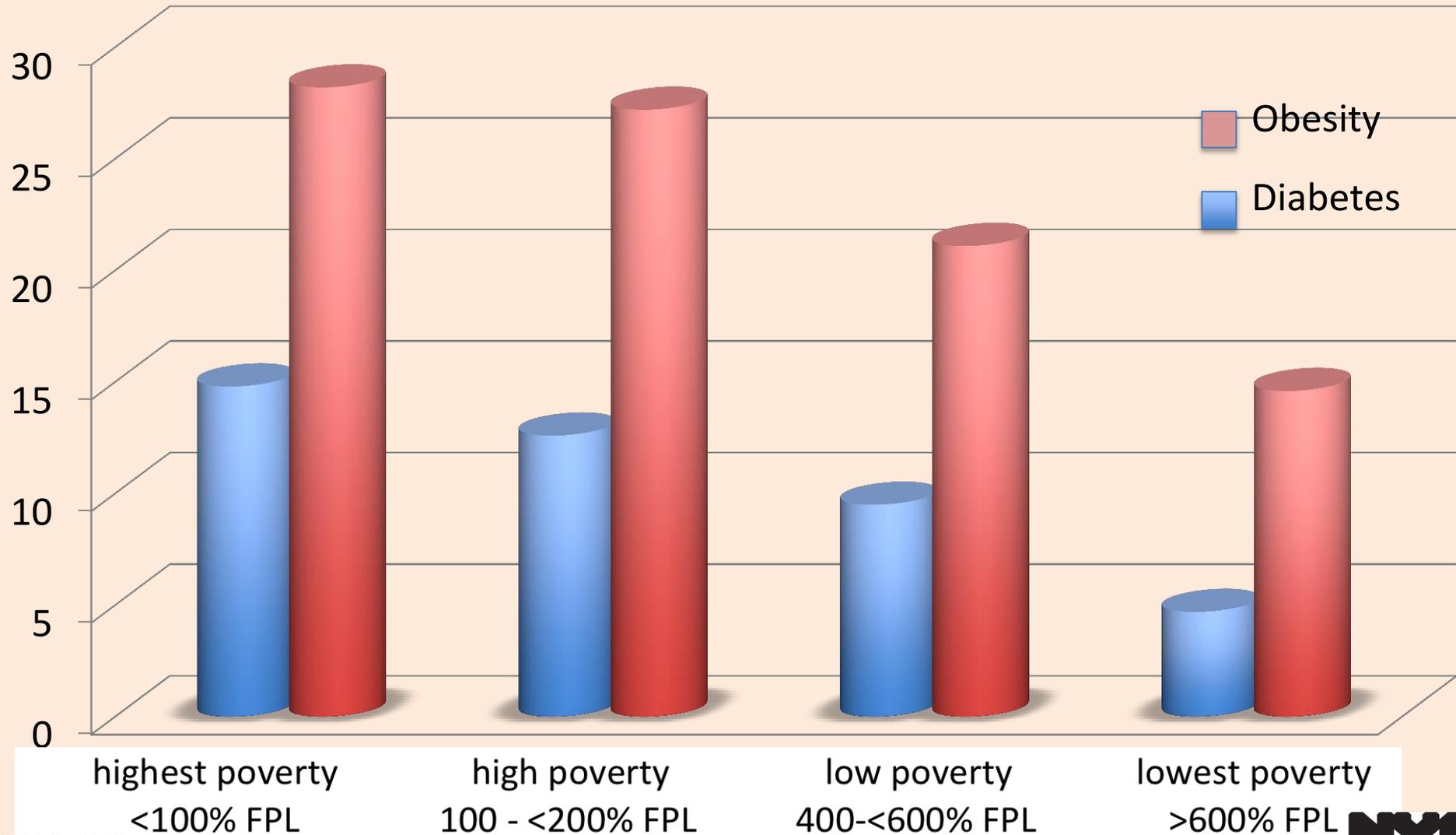
## Actual causes of death

United States, 2000

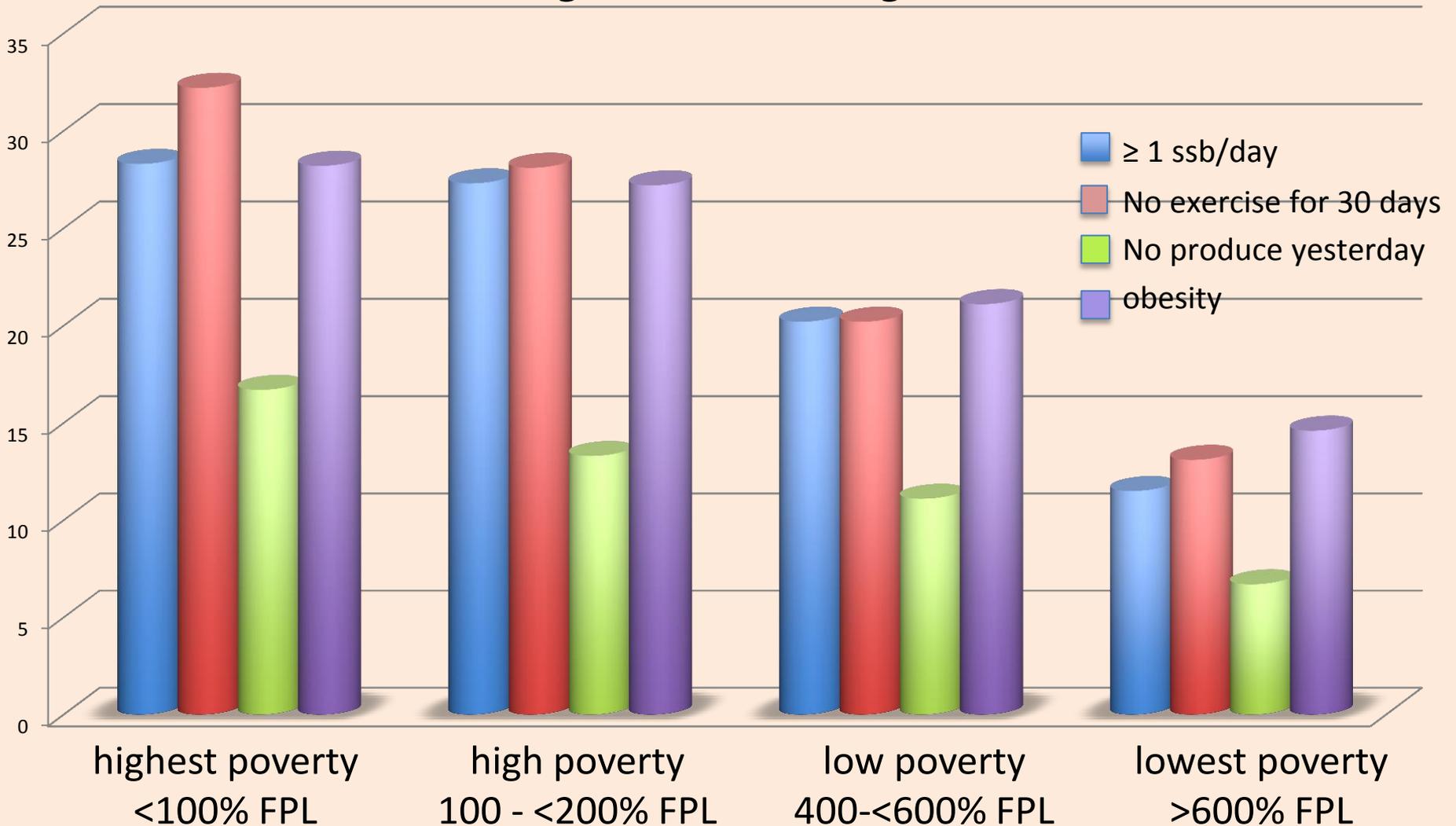


		PAF, %
<b>Low Education</b>	25-64 years	<b>16%</b>
	Over 65 years	<b>9%</b>
<b>Poverty</b>	25-64 years	<b>11%</b>
	Over 65 years	<b>9%</b>
<b>Area-level poverty</b>	Over 25 years	<b>8%</b>
<b>Racial segregation</b>	Over 25 years	<b>19%</b>

# %age of NYC Adults with Obesity or Diabetes by Income



# %age of NYC Adults Eating and Activity Habits by Income



# Feast/Famine Cycle

“March I ran out of stamps on the 23rd. So I had a whole week (left), but I go to my reserve in my pantry, all my stuff that I store.

I like frozen vegetables but I will keep canned goods. That’s when you make spaghetti. I keep stuff you can survive on, beans and rice, I actually make those from scratch. But in a can I like Bush beans, something like that. I keep a couple of cans of chili, for chili dogs or nachos, things like that.

That’s why a camel has a hump, for reserve. You just reserve [so] you won’t die.”

Very Low Food Security, Hispanic, Female, Age 53, 4-person household (IDI)

After a visit to the supermarket at the beginning of the month, the refrigerator overflows with food.



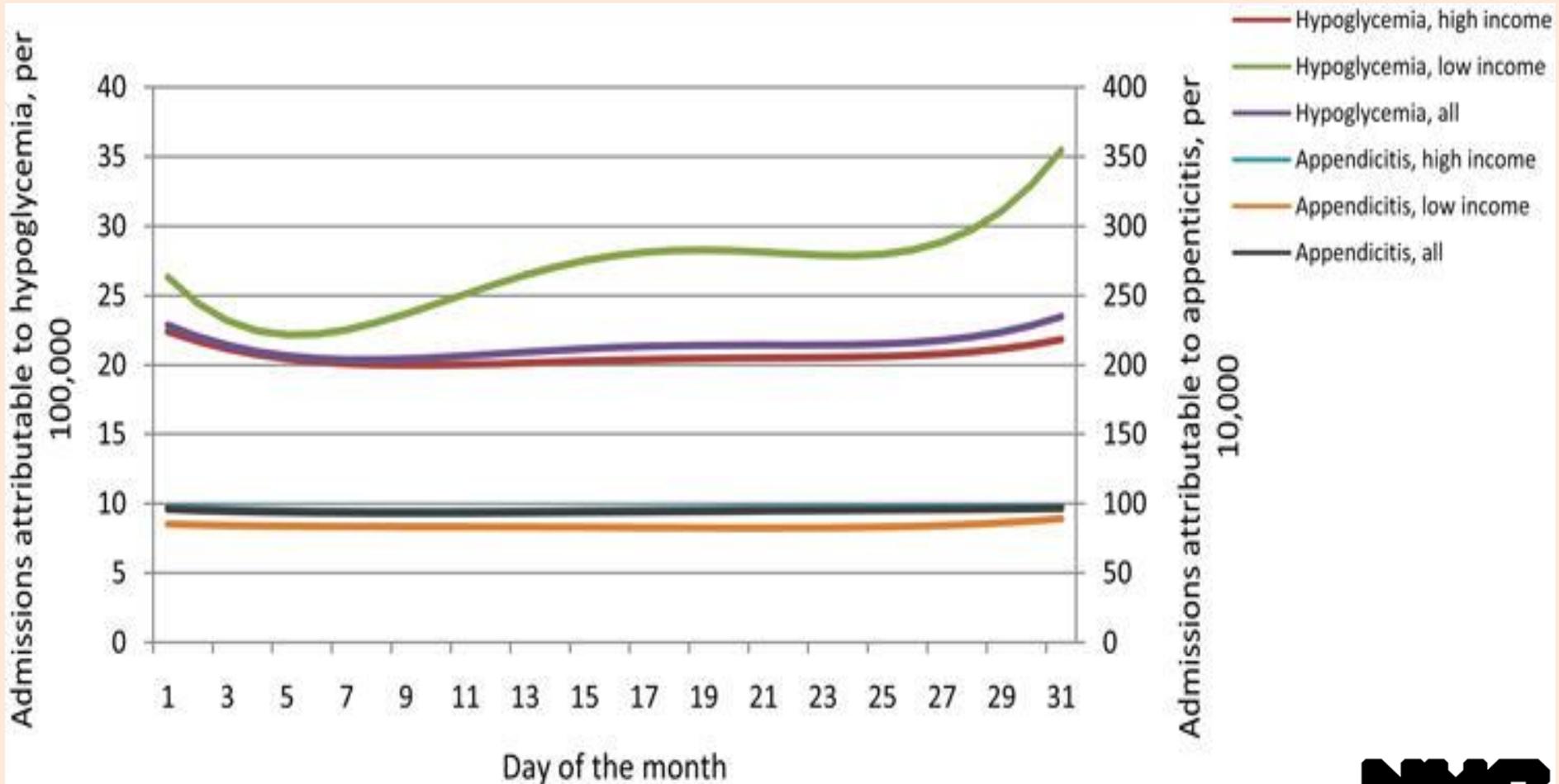
Lots of meat, eggs, milk, and some fast food.

Three weeks later, there's much less available.



Rice and beans (in the pot), cheese doodles, breakfast cereal, and condiments.

# Food INsecurity: Admissions for Hypoglycemia at the End of the Month



# Clinicians can ask Food Insecurity Questions

1. “We worried whether our food would run out before we got money to buy more.” Was that often true, sometimes true, or never true for your household in the last 12 months?
2. “The food that we bought just didn’t last and we didn’t have money to get more.” Was that often, sometimes, or never true for your household in the last 12 months?

A response of “often true” or “sometimes true” to either question = positive



- 1. Food Bank Referral Line & website
- 2. Food Pantries in the area
- 3. Soup Kitchens in the area
- 4. Local SNAP referral information
- 5. Local WIC referral information
- 6. Single Stop

# Childhood Obesity Declines, NYC

Figure 1: Timeline of Identified Strategies in New York, 2004–2010\*

## Pre-Study Period

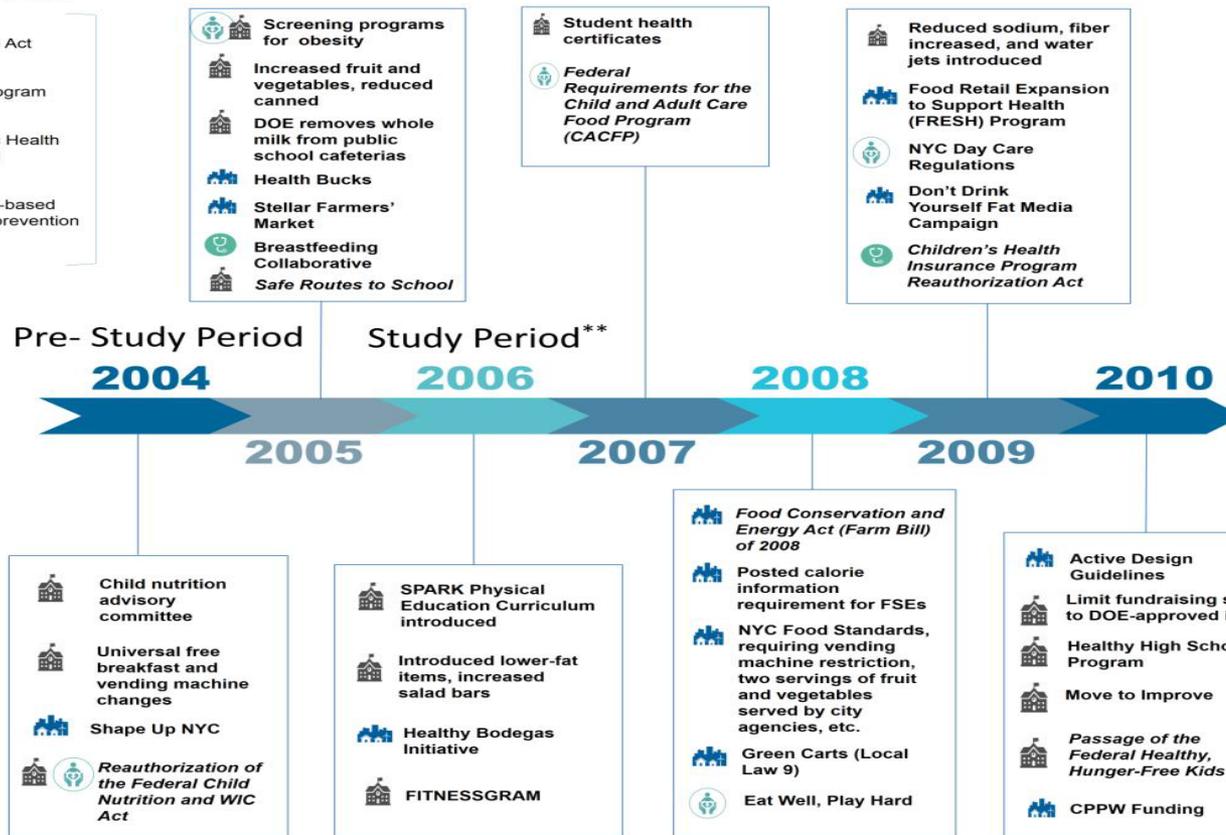
Interventions Implemented up to 5 Years Prior to Baseline

- 2001**  
Obesity Prevention Act
- 2002**  
Farm-to-School program
- 2002**  
NYC District Public Health Offices established
- 2003**  
Established school-based childhood obesity prevention programs

## Post-Study Period

Interventions Implemented up to 5 Years After Follow-Up Data Collection

- 2011**  
Make NYC Your Gym media campaign
- 2011**  
Active Design Guidelines for new city construction
- 2011**  
Prohibited caffeine and artificial flavors, colors, and sweeteners
- 2011**  
Sugary Drink Campaign
- 2012**  
Recess Enhancement Program (50 NYC public schools at the time of the study = 20,000 students)
- 2015**  
Posted sodium information requirement for FSEs



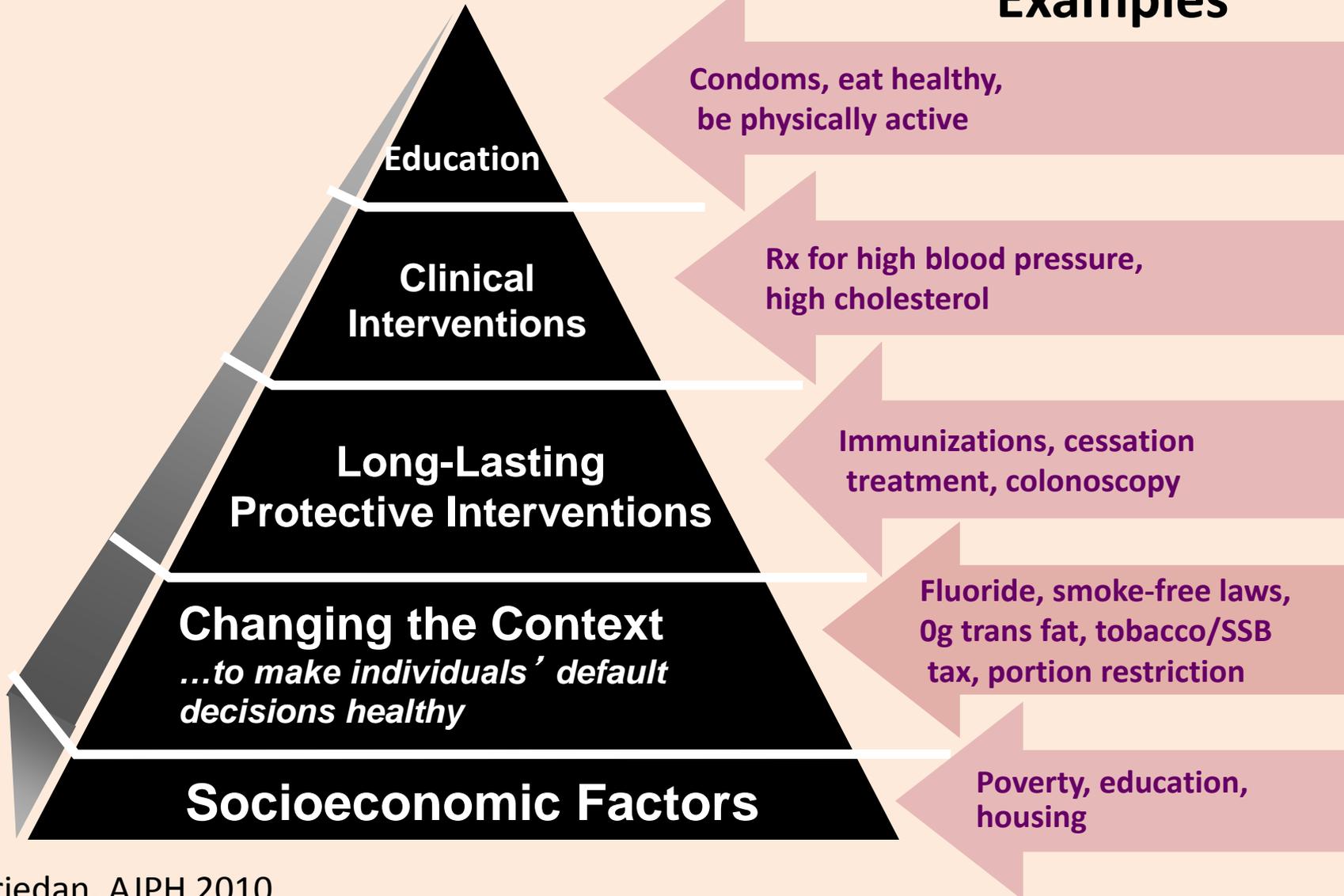
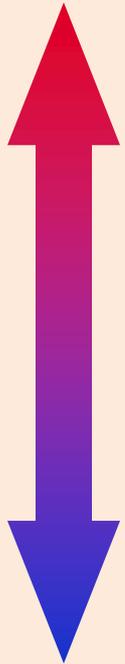
### Settings:

- Schools
- Early Childhood Education
- Community
- Health Care

# Does Policy Have A Bigger Bang For Your Buck?

## Examples

*Smallest Impact*



*Largest Impact*

# Social Norms

People make decisions based on resources and time

People adapt to their environment

high calorie and junk food is very accessible

Therefore, a calorie imbalance and weight gain can be expected as a natural consequence of our society.

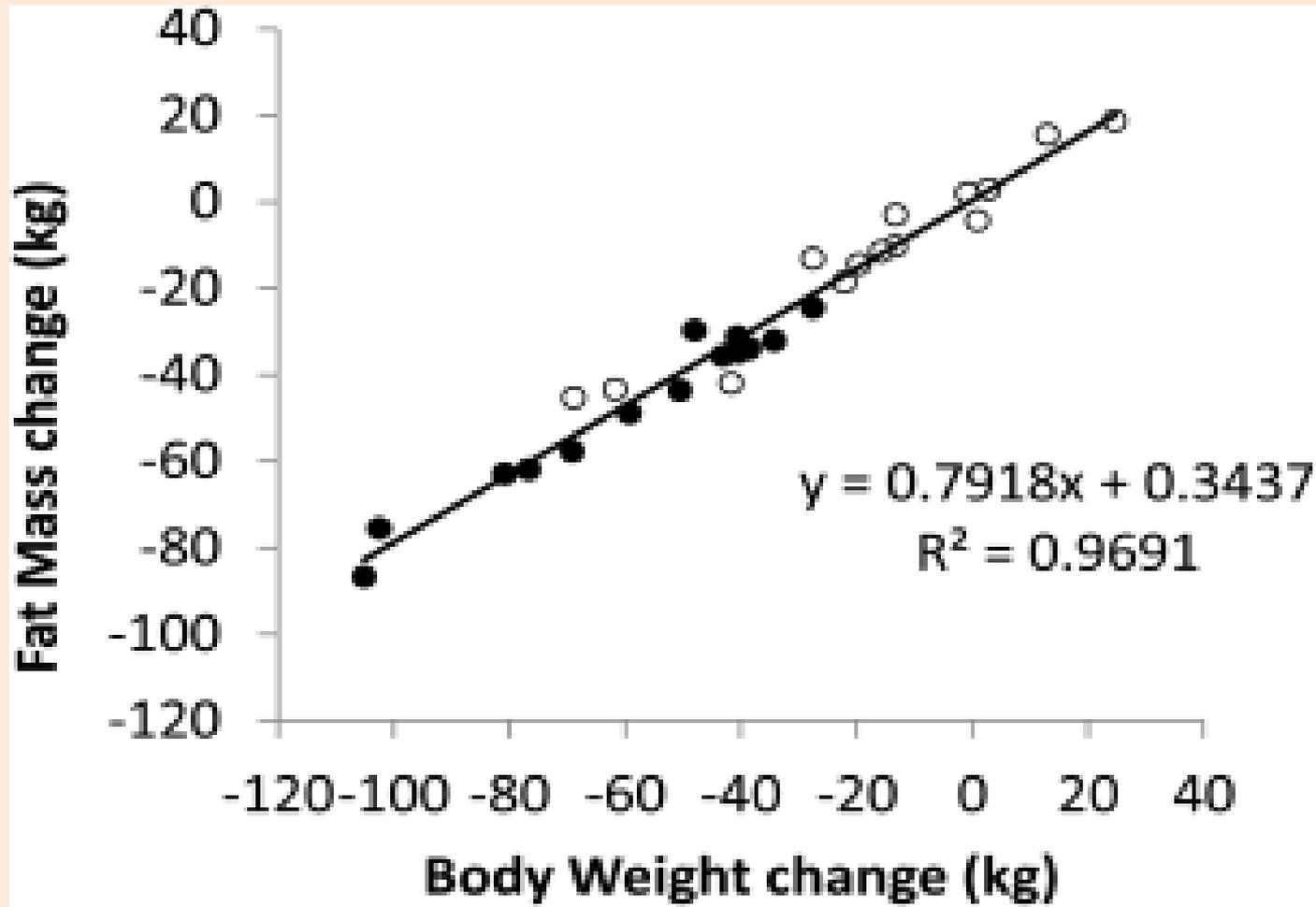


*" Don't step on it... It makes you cry "*

# Potential Steps to Reducing Obesity among Adults

- **Ensure that**
  - **Fresh, healthy food is accessible**
  - **Fresh, healthy food is affordable**
  - **Culturally appropriate food**
  - **Cooking and tasting opportunities increase**
  - **Everybody has a place to cook**
  - **Everybody has time to cook**
  - **There is a waiting time of 20-30 years**

# Persistent metabolic adaptation 6 years after “The Biggest Loser” competition



# The Health Impact for an Overweight/Obese Child

- **The risk of non-alcoholic fatty liver has increased significantly**
- **12.6 times more likely to have ↑ levels of fasting insulin**
- **One of every three U.S. children born in 2000 will have type 2 diabetes**



Bogalusa Heart Study;  
Foster et al, Health Study, NEJM 2010;  
Murtagh & Ludwig, JAMA 2011;  
Olshansky et al, NEJM 2005

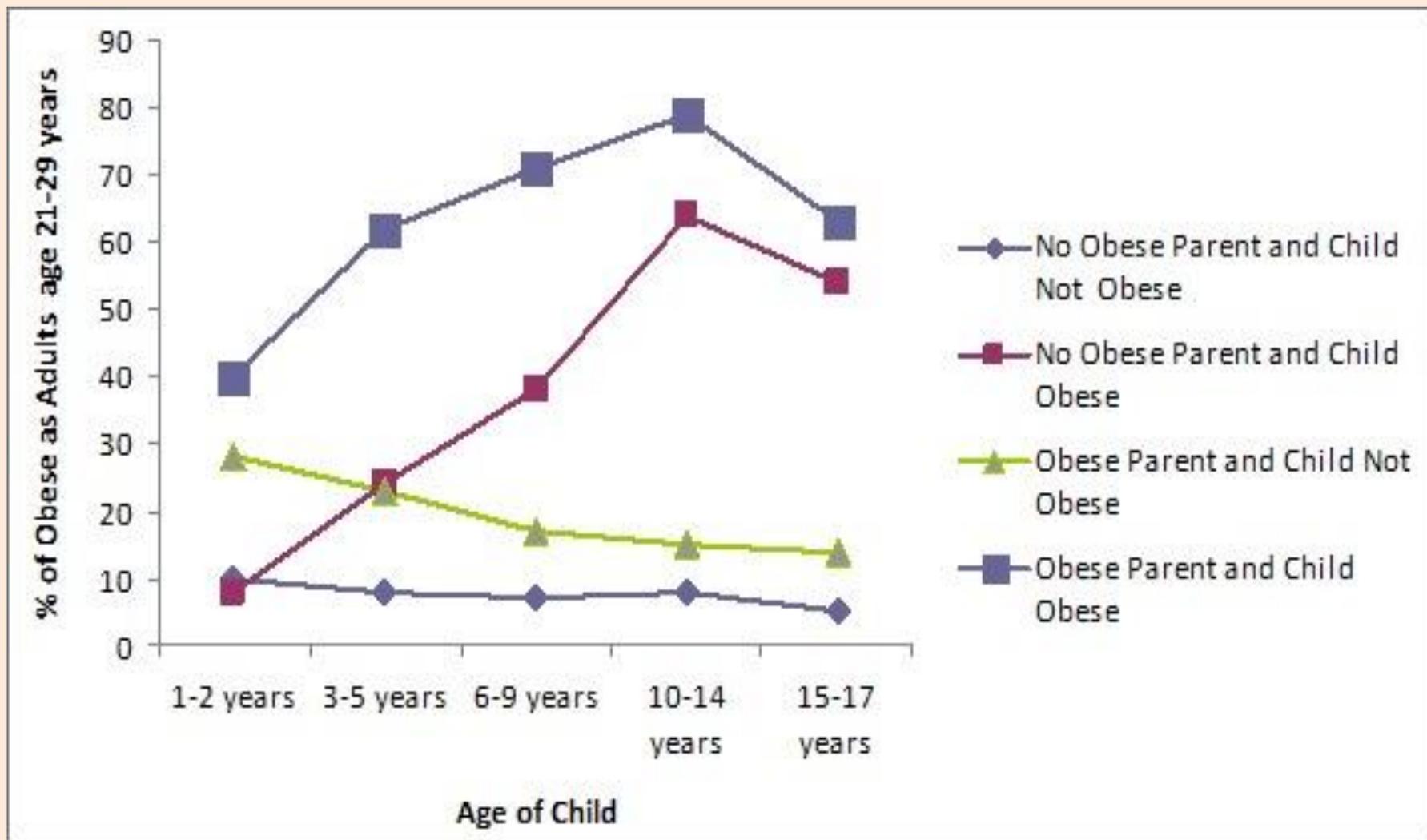
# The Health Impact

Obese children generally have higher risks of high blood pressure, high total cholesterol and 60% have at least one CVD risk factor

The risk for lean children is 10%



# % Young Adults with Obesity at age 21-29 years based on Child and Family Weight History



**5** Eat 5 servings a day of fruits and veggies



read more

**2** Spend less than 2 hours a day in front of a screen



read more

**1** Spend at least 1 hour every day doing something active

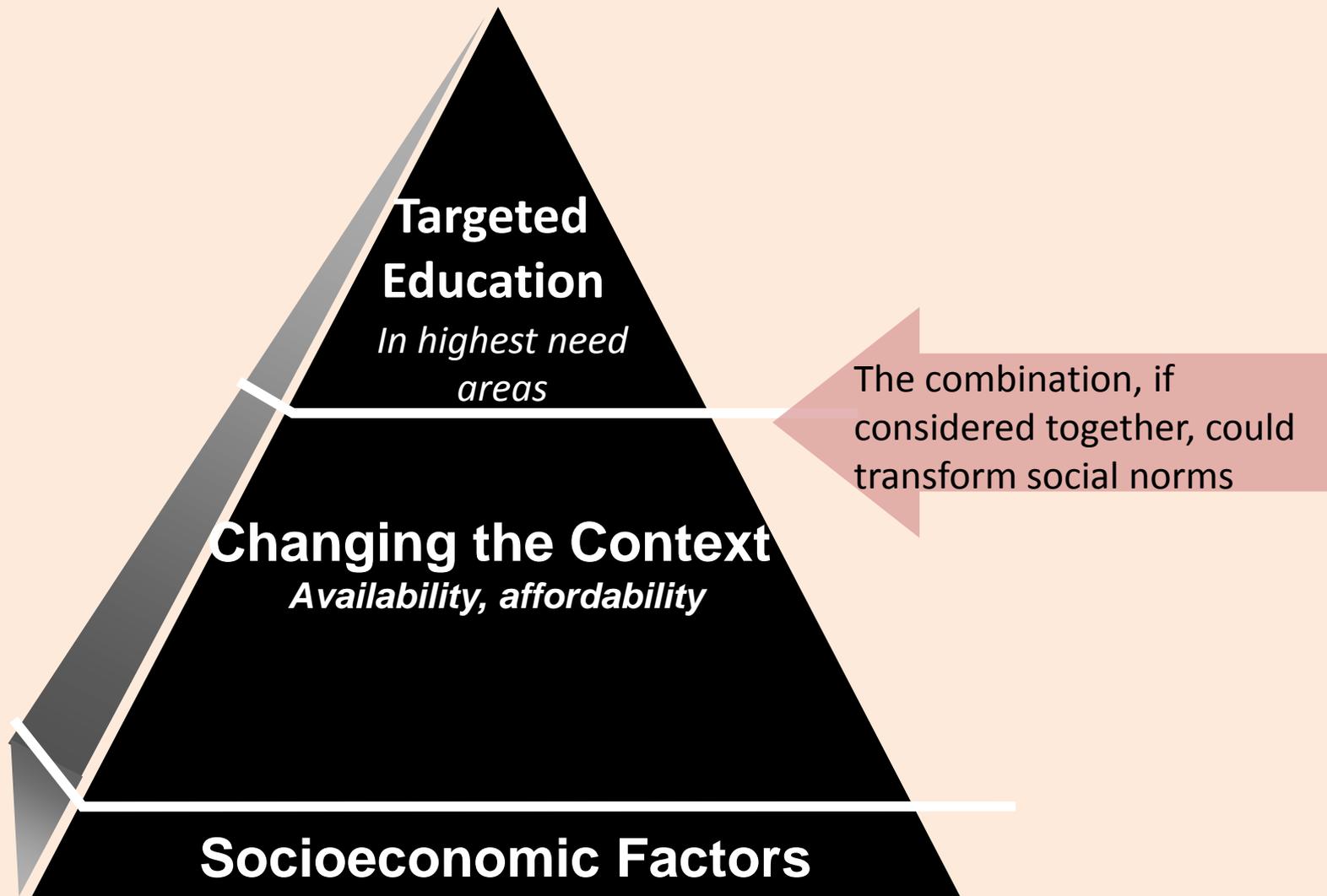


**0** Limit sweetened drinks to near 0 a day



read more

# Policy Often Needs Education for Implementation



# Early childcare regulations and the NYC Health Code: A Bit of History

- 1854: First day nursery in US opened in NYC
- 1910: Centers were regulated within a Sanitary Code

- 1943: Compliance with these regulations became mandatory.
- *As a side note:* regulations required 2 hours of outdoor play and a hot meal at noon and a "daily allowance of at least a pint of milk a day".

# Overall Early Childcare Population in NYC

<b>Childcare Facility Type</b>	<b>Total Facilities*</b>	<b>Setting</b>	<b>Law/ Regulation</b>	<b>Approx. Capacity**</b>
<b>Group Childcare</b>	2,300	Non-residential	NYC Health Code (Article 47)	130,000
<b>Group Family Childcare</b>	2,232	Home of an unrelated family	18 NYCRR (part 416)	30,742
<b>Family Childcare</b>	3,775	Home of an unrelated family	18 NYCRR (part 417)	103,942
<b>School Age</b>	1,192	Non-residential	18 NYCRR (part 414)	121,966
<b>TOTAL, all facility types</b>	<b>9,271</b>			<b>355,346</b>



## **Modification of NYC Health Code for Early Childcare Centers: 2007**

### **– Daily Physical Activity**

- 60 minutes daily;
- At least 30 minutes must be structured  $\geq$  3 years old

### **– Limits on TV**

- No TV for children  $<2$  years old
- No more than 60 min/day of educational programming

### **– Beverage Standards**

- No sugary drinks
- 1% milk for children  $>2$  years
- No more than 6 oz juice per day
- Water must be available and easily accessible

# NYC Health Code: Article 47 on Physical Activity

## ARTICLE 47 CHILD CARE SERVICES

§47.01 Definitions.  
§47.03 Permit required.  
§47.05 Program capacity.  
§47.07 Permit: required approvals and clearances.  
§47.09 Applications for permits.  
§47.11 Written safety plan.  
§47.13 Teaching staff qualifications in child care services for children ages two to six.  
§47.15 Teaching staff qualifications for infant-toddler child care services.  
§47.17 Teaching staff qualifications for night child care services.  
§47.19 Criminal justice and child abuse screening of current and prospective personnel; reports to the Department.  
§ 47.21 Corrective action plan.  
§47.23 Supervision; staff to child ratios and group size.  
§47.25 Health; children's examinations and immunizations.  
§47.27 Health; daily requirements; communicable diseases.  
§47.29 Health; emergencies.  
§47.31 Health; medication administration.  
§47.33 Health; staff.  
§47.35 Personal hygiene practices; staff and child.  
§47.37 Training.  
§47.39 Space allowance; reservation for children's use.  
§47.41 Indoor physical facilities.  
§47.43 Plumbing; toilets, hand wash, and diaper changing facilities.  
§47.45 Ventilation and lighting.  
§47.47 Outdoor play areas and facilities.  
§47.49 General sanitation and maintenance.  
§47.51 Rodents, insects and other pests prohibited; pesticide application notice.  
§47.53 Pet animals.  
§47.55 Equipment and furnishings.  
§47.57 Safety; general requirements.  
§47.59 Fire Safety.  
§47.61 Food and food safety.  
§47.63 Lead-based paint restricted.  
§47.65 Transportation.  
§47.67 Child development policies, program, rest periods and clothing.  
§47.69 Night care.  
§47.71 Physical activity and limits on television viewing.  
§47.73 Required postings.  
§47.75 Modification of provisions.  
§47.77 Closing and enforcement.  
§47.79 Construction and severability.

- **Previous Language:**  
Indoor and outdoor play areas shall be available for the use of children...”
- **New Language**  
Establishes a required minimum number of physical activity minutes daily:

# NYC Health Code: Article 47 on Physical Activity

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§47.79 Construction and severability.

- **Previous Language:**  
Adequate periods of outdoor play shall be provided daily for all children, except during inclement weather.
- **New Language**  
In inclement weather, safe, active indoor play shall be substituted for outdoor play

# Getting the Word Out



- Center Directors were invited to meetings organized in each of the 5 boroughs of New York City.
- Health Department letters were sent to all Centers about the new regulations.
- Sanitarians and Early Childhood Education Consultants attended trainings about the regulations.

# Teacher Trainings on Physical Activity

- **Goal:** Offer all Center teachers a training to help increase physical activity in small spaces, indoors and outdoors, particularly in high poverty neighborhoods.
- Initially used SPARK EC adapted for small spaces; then created Move-To-Improve Early Childcare
- Provided a 1-day training with equipment
- Training and equipment reached over 14,000 early childcare staff from 1400 centers

# Evaluation: Sample Selection

234 Centers were randomly chosen from areas with at least 40% of residents  $\leq$  200% of the federal poverty level



176 agreed to participate in the Center Component



110/176 Centers agreed to participate in the classroom component

# Research & Evaluation



- **Phase 1 (fall 2009):**
  - 176 Centers to assess their knowledge & implementation of the regulations
  - Interviews with Center Directors, Teachers, Food Service Staff
  - Site Inventory
- **Phase II (spring 2010):**
  - 110 Centers to examine compliance
  - Direct Observation of 3-4 year old classrooms
  - 1465 children

# Success: It's harder than you think...



- Dedicated outdoor space
- Extra indoor space
- CACFP and Head Start
- Classroom size
- Teacher/student ratio
- Number of staff trained in PA
- Less turnover of Center director and staff
- Daily operating hours

# Most Center directors were knowledgeable about the health code changes

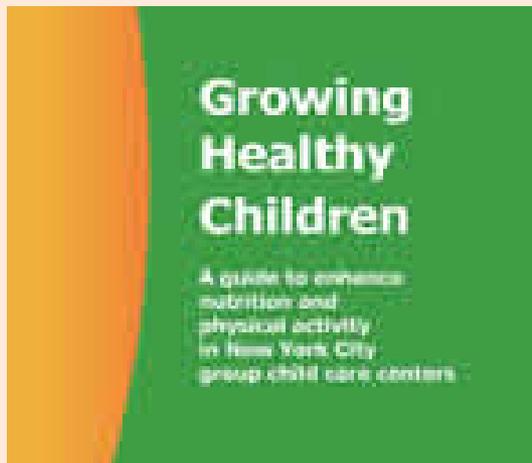
- 78.5% knew about required 30 minutes of structured physical activity time
- 87.2% knew about requirement for 60 minutes or more of physical activity time



However, in the Observation component it was not as good ....

## Study Observation

- Only 30.0% of Centers were compliant with 30 minutes structured PA
- Only 34.9% with total amount of PA



## Real World Success

- 70% taught approximately 15/30 minutes of structured PA
- 65% taught approximately 40/60 minutes of total PA required
- Centers that were compliant did more physical activity than required.

# NYC Modification of the Health Code for Early Group Child Care Centers: 2015

## – Daily Physical Activity

- 60 minutes daily; at least 30 minutes must be structured for those 3 years old and over
- Decrease sedentary time to no more than 30 minutes at a time

## – Limits on TV

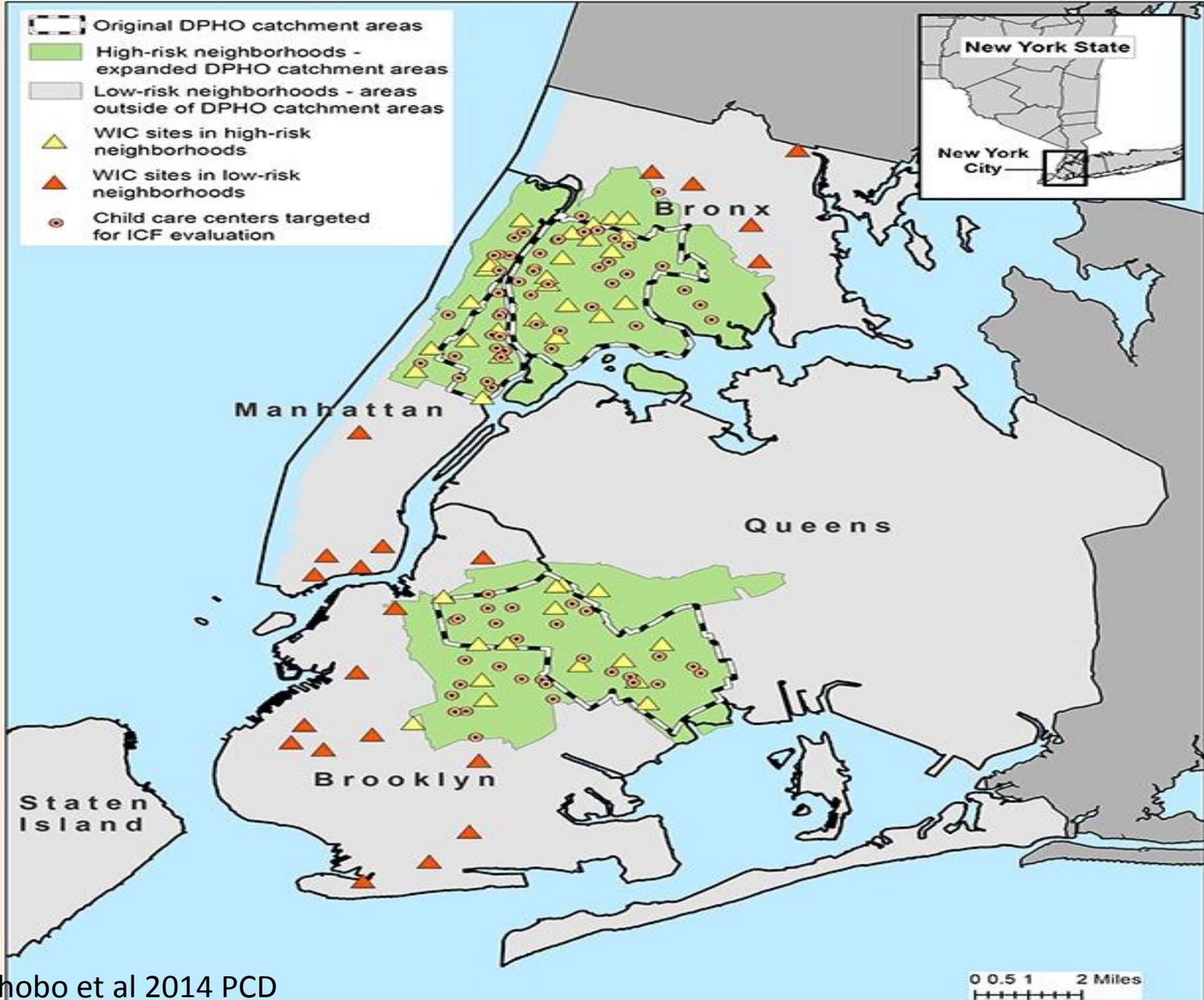
- No TV for children <2 years old
- No more than 30 min/day of educational programming

## – Beverage Standards

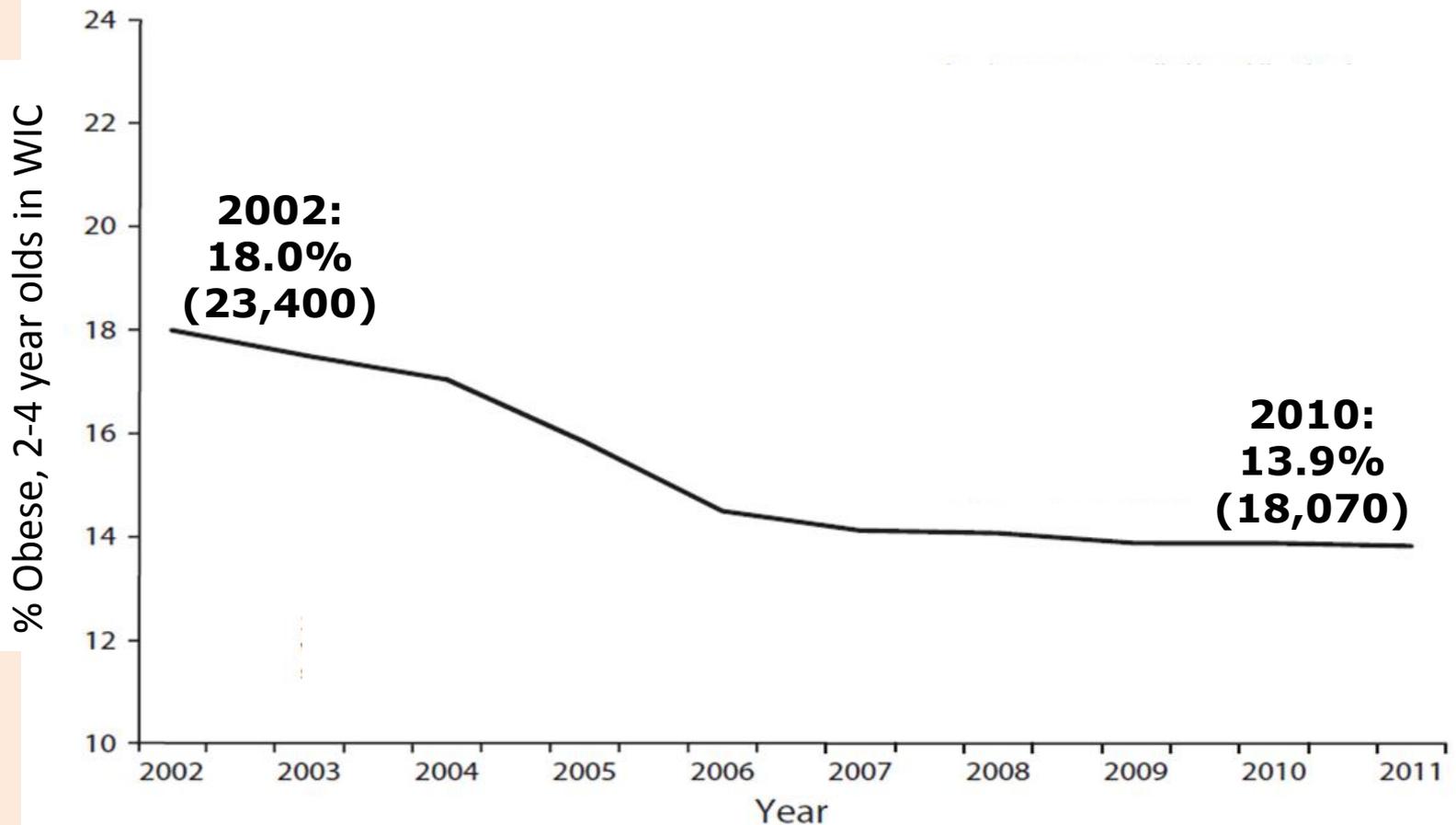
- No sugary drinks
- 1% milk for children >2 years
- Juice only for children > 2 yrs
- No more than 4 oz juice per day
- Water must be available and easily accessible



- Enacting a policy that sets a new 'floor' will likely lead to some change.
- If there is money for training programs, that may improve the outcome in some places.
- Either way, raising the 'floor' moves the needle to change norms and improve the health of our children that much more.



# Obesity prevalence among NYC children (2-4 years) enrolled in WIC



Data source: NYS WIC, restricted to NYC children. BMI calculated from measured height and weight. Adapted from: Farley TA, Dowell D. Preventing Childhood Obesity: What Are We Doing Right? Am J Public Health. 2014;104(9):1579-83.

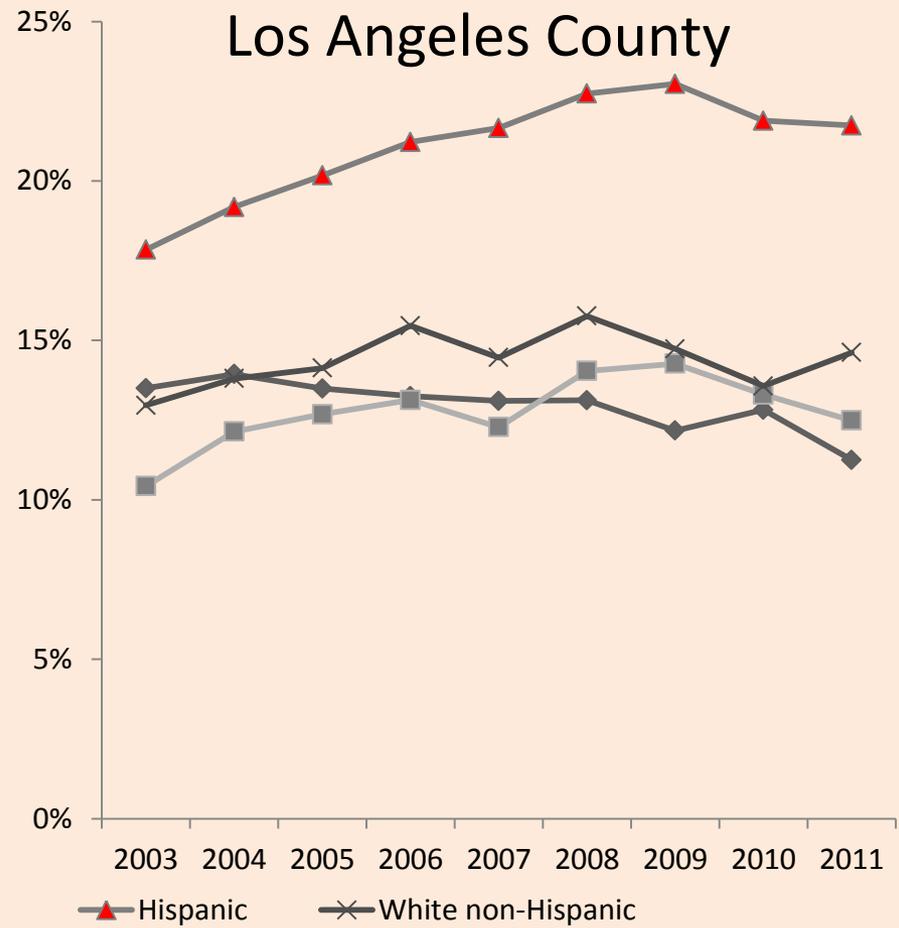
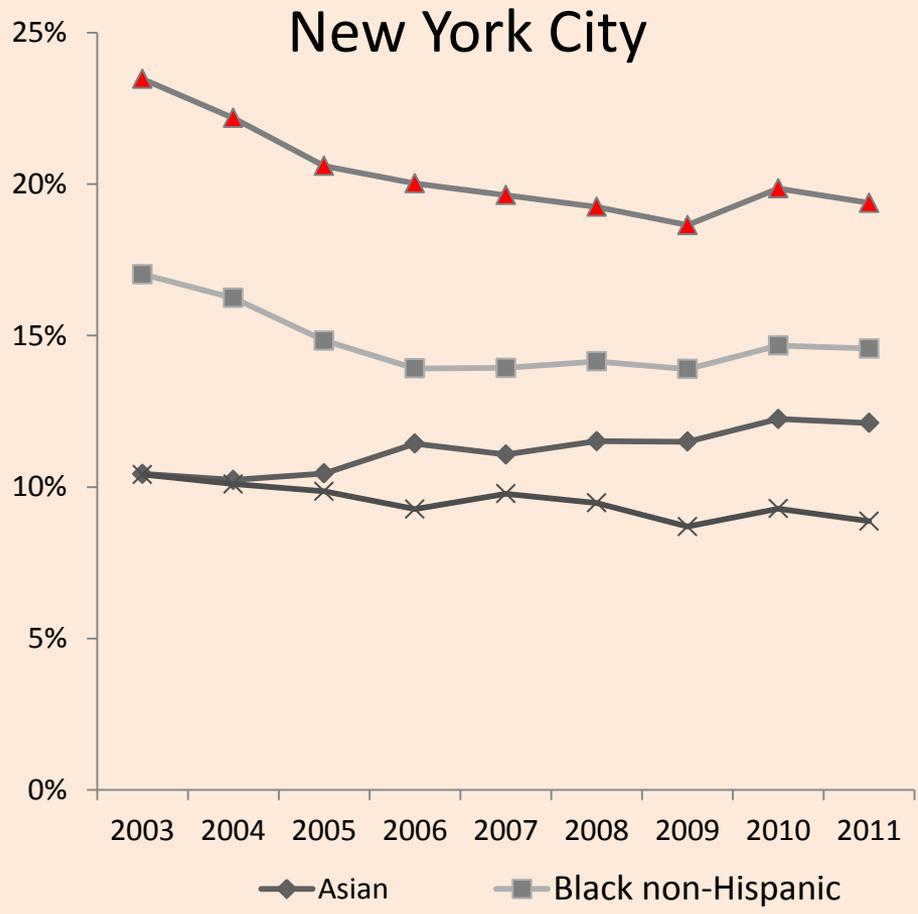
# Prevalence of Obesity Among 3- and 4-Year-Old Children Enrolled in WIC in High-Risk Versus Low-Risk Study Neighborhoods Before and After Implementation of New York City Day Care Policies.

## High-Risk Neighborhoods

## Low-Risk Neighborhoods

	2004-2006	2008-2010	Change	P Value	2004-2006	2008-2010	Change	P Value
Bronx	19.1	17.1	-2.0	<.001	17.4	16.1	-1.3	.008
Bklyn	15.7	14.8	-0.9	<.001	13.6	12.8	-0.8	.004
Man	18.6	15.3	-3.3	<.001	12.0	11.5	-0.5	.302

# Nine year trends in obesity prevalence, by race/ethnicity, among 3 and 4 year old children participating in WIC



# Changing the Social Context Around Food

Health Bucks/EBT

Affordability

Farm to pre-school: Grow NYC/Corbin Hill

Accessibility

Cooking at farmers markets, schools, CBOs

Familiarity

Eat well play hard/ CMOM/City Harvest

Education

Growing Healthy Children

Sustainable

**Early childhood Regulations: DOHMH/CACFP/WIC**

# SCHOOLS



Moving from whole milk to low-fat white milk and skim chocolate milk saved **4.5 Billion calories** in 2008

# District Public Health Offices

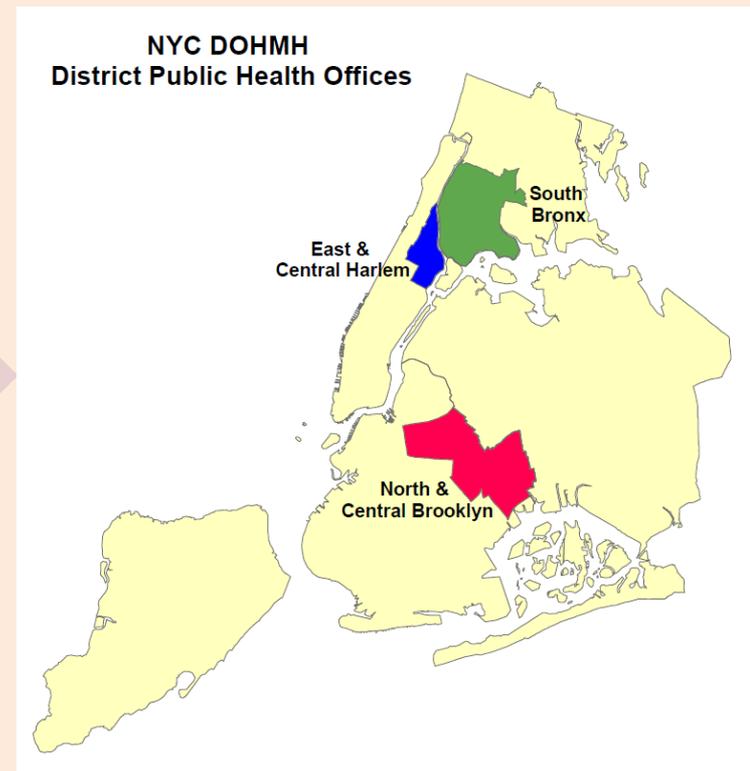
School Wellness Campaign with 4 focus areas:

Establish  
School  
Wellness  
Councils

Create  
comprehensive  
school-level  
wellness  
policies

Serving  
plain milk  
at school  
meals

30 minutes of  
physical  
activity daily  
for all  
students



# District Public Health Offices

- Public Health Detailing to elementary schools
  - ✓ Meet with principals 2x year
  - ✓ 320 schools in the DPHO catchment areas (144,010 students)
  - ✓ 233 principals completed needs assessment
  - ✓ 77% of schools requested assistance



Creating Healthy Schools  
and Communities



## 2003-2004

**School meals:** Set limits on sodium and cholesterol; Initiated Universal Free Breakfast Program

**Vending:** Eliminated all soda; Permitted only water, milk, 100% juice, and low-fat snacks



## 2005-2006

**School meals:** Offered only 1% white milk and skim white and chocolate



## 2008-2009

**School meals:** Reduced sodium and increased fiber (per City Agency Food Standards); Introduced water jets



## 2010-2011

**School meals:** By 2010, removed all deep fryers

**Competitive foods and fund-raising:** Established nutrition standards similar to IOM

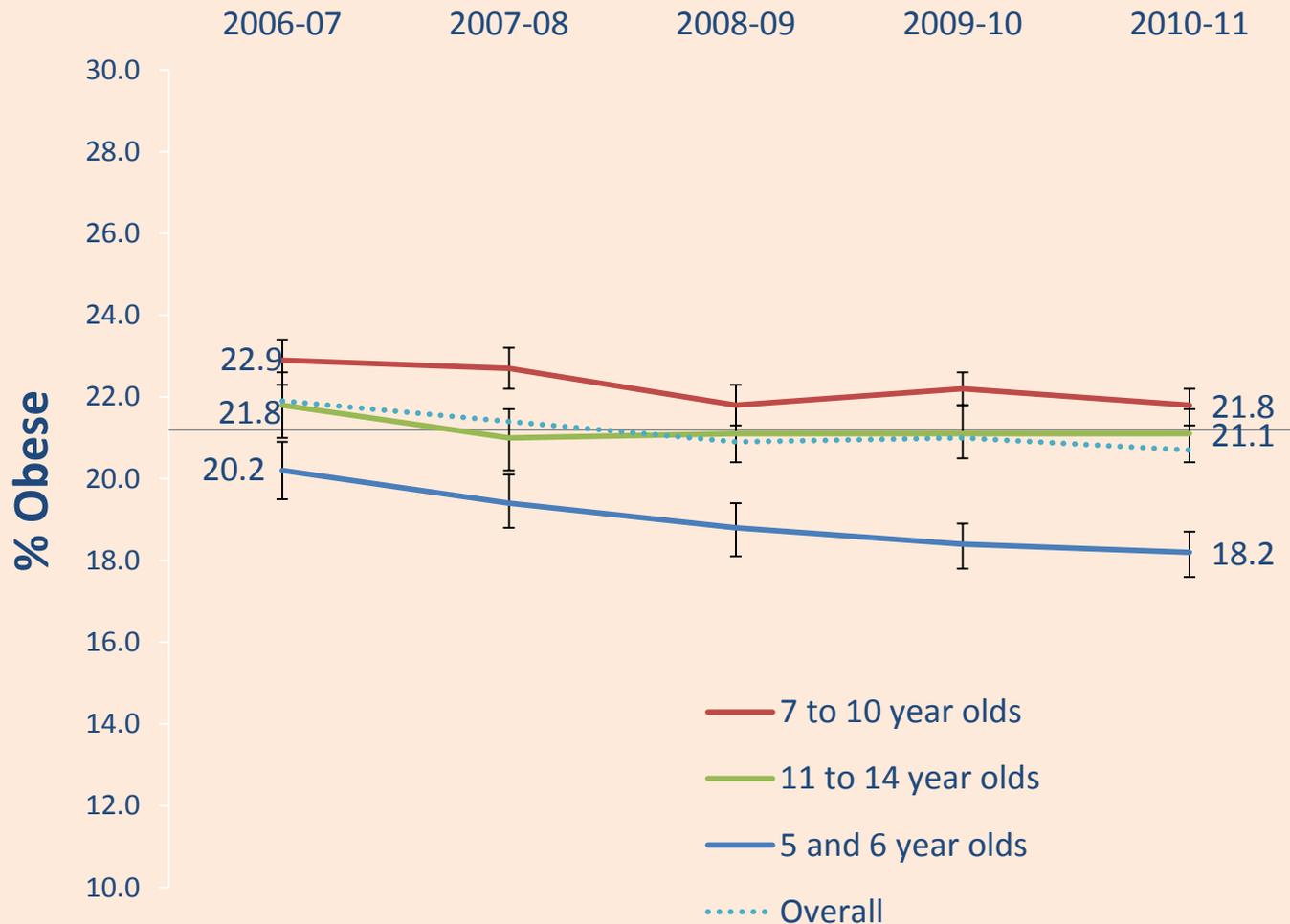
**Vending (beverages):** Prohibited caffeine and artificial flavors, colors, or sweeteners;

Elementary/Middle schools: Limited to  $\leq 10$  calories/8 oz; High schools: Limited to  $\leq 25$  calories/8 oz

# Goal: Water Jets and Salad Bars in every school cafeteria



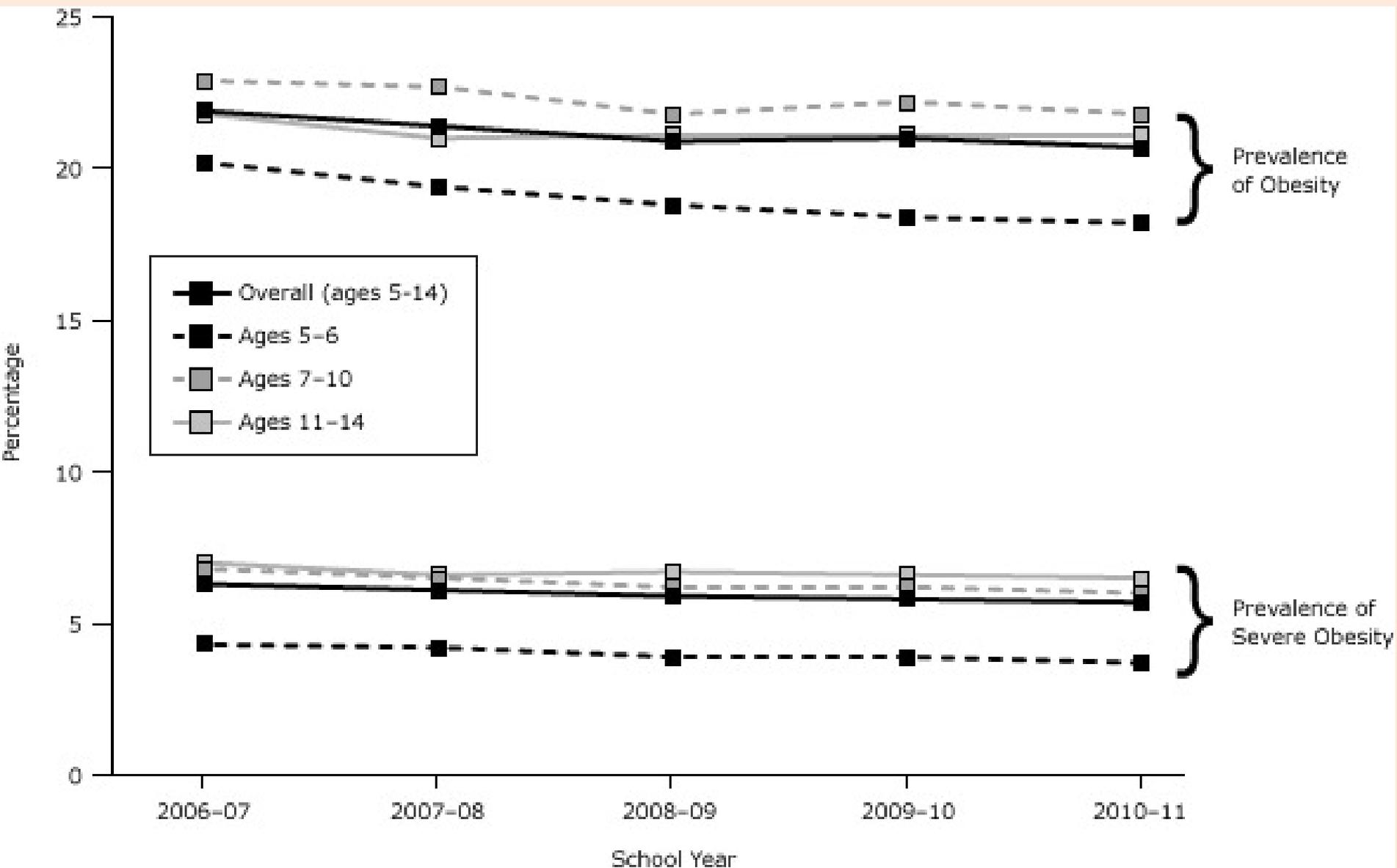
# Obesity Rates in NYC Children High But Declining Slowly



# Prevalence of Obesity Among NYC Public School Children Aged 5–14 Years (K-8th Grade)

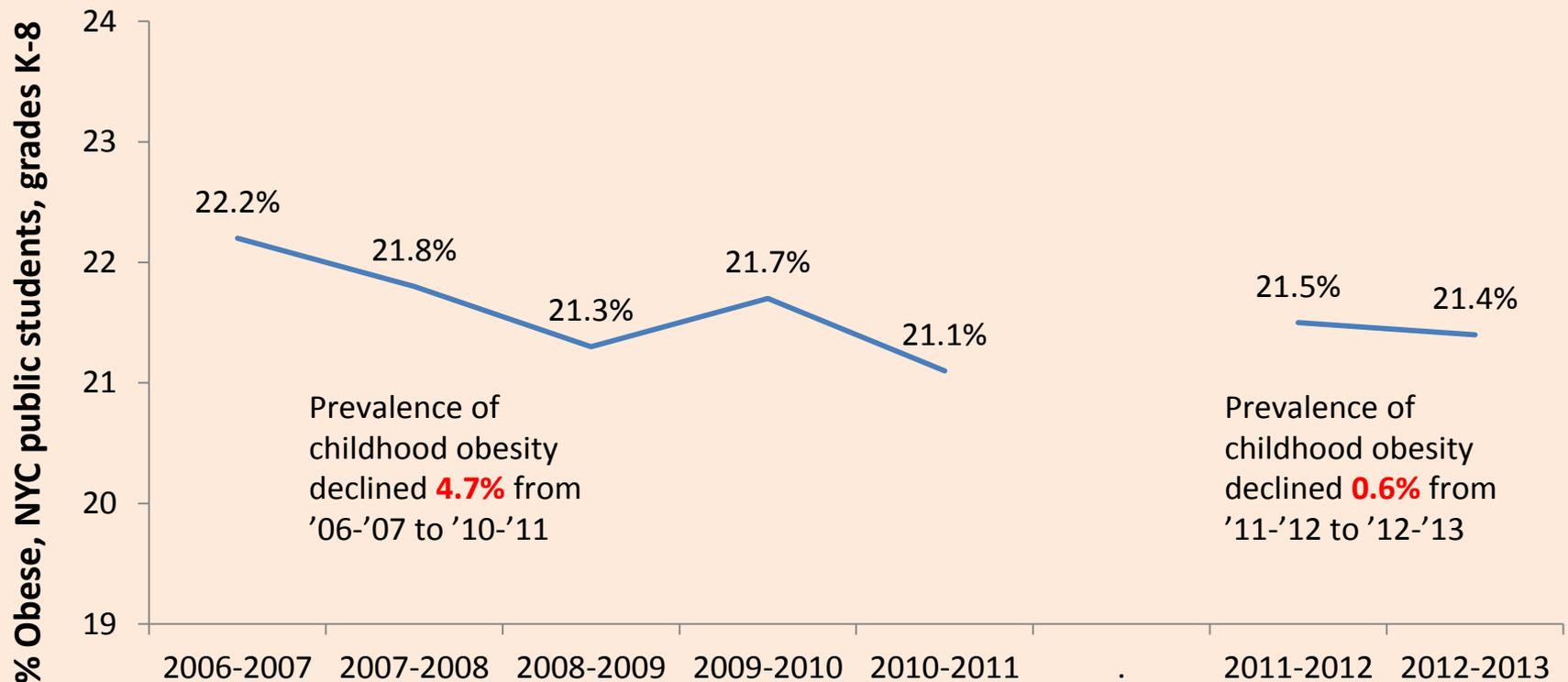
	2006-7	2008-08	2008-09	2009-10	2010-11	Relative decrease %
<b>Female</b>	19.5	19.1	18.7	18.9	18.6	4.6
<b>Male</b>	24.2	23.6	23.0	23.1	22.8	5.8
Asian	14.5	13.7	13.2	13.5	13.4	7.6
Hispanic	26.5	26.0	25.4	25.7	25.6	3.4
N-H Black	21.3	21.1	21.2	21.1	20.9	1.9
N-H White	17.6	16.9	16.1	16.1	15.4	12.5
Very Wealthy	18.0	17.6	16.7	16.8	16.6	7.8
Wealthy	20.9	20.5	19.9	20.2	20.0	4.3
Poor	22.5	22.2	22.1	21.5	20.9	7.1
Very Poor	24.4	23.6	23.4	23.8	23.7	2.9

# Trends of Obesity by Age Among NYC Public School Children



# Tracking trends in childhood obesity

## Prevalence of obesity among NYC public school students, grades K-8



Source: Fitnessgram, BMI calculated from measured height and weight.



# The 'Layering' Effect for Children:

2007:

Healthcode for Early Childcare

2009:

Food Standards for City Agencies

2010:

Vending/Competitive Food

2012:

Day Camp Regulations

**Child Nutrition  
Reauthorization  
Act 2010**

# Every change raises the floor for the next change

**2005 all milk 1% or skim**

**2008 City Wide Food Standards**

**2010 Removed all deep fryers**

**2011 competitive food and vending rules**

**2011 Bake Sale Restrictions**

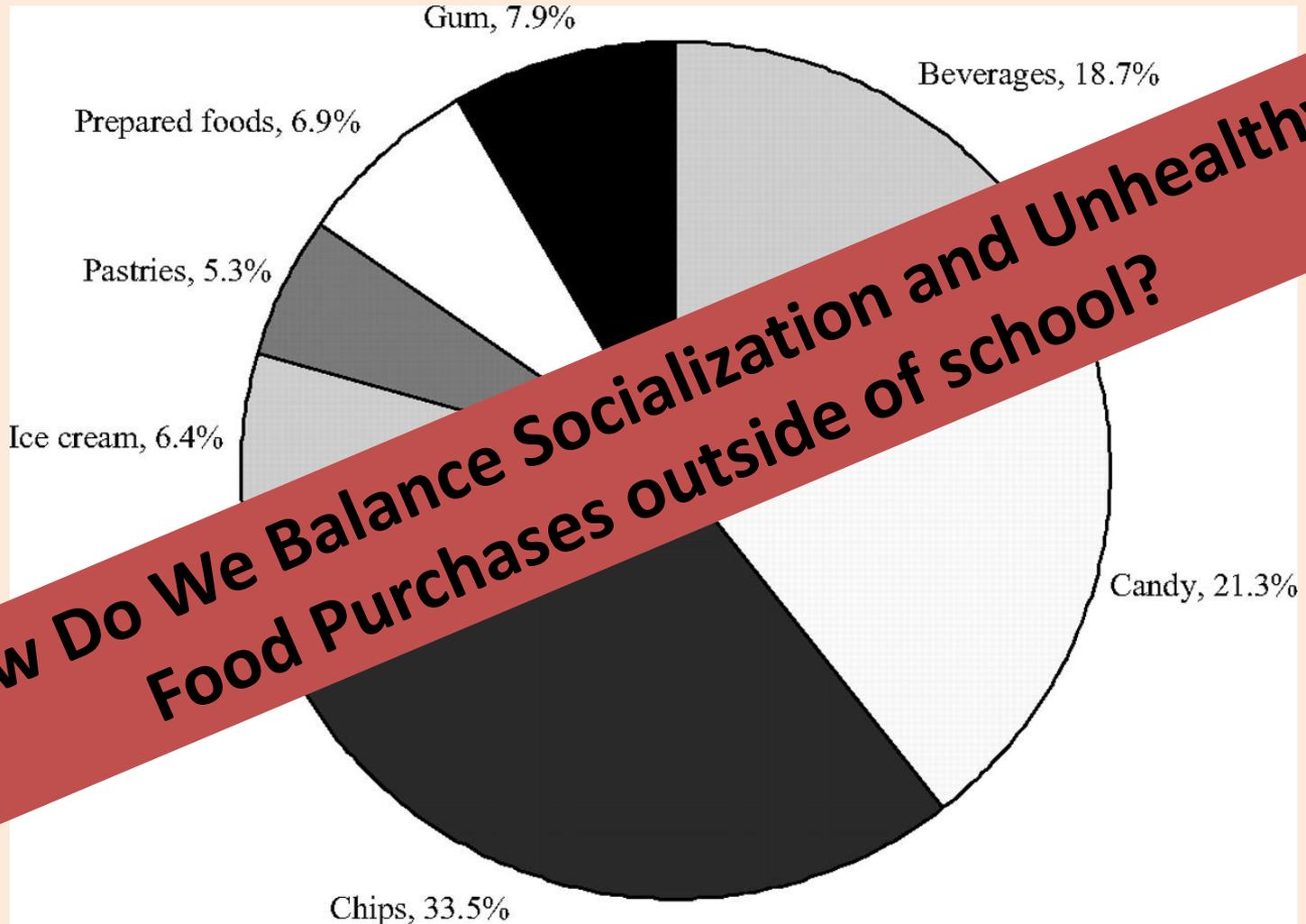
**2012-2015 salad bars and water jets in every school**

# Food Security

Access by all people at all times to enough food for an active, healthy life. Food security includes at a minimum:

- (1) the ready availability of nutritionally adequate and safe foods, and
- (2) an assured ability to acquire acceptable foods in socially acceptable ways (e.g., without resorting to emergency food supplies, scavenging, stealing, or other coping strategies).

# Items purchased by elementary school children at bodegas.



Borradaile K E et al. Pediatrics 2009;124:1293-1298

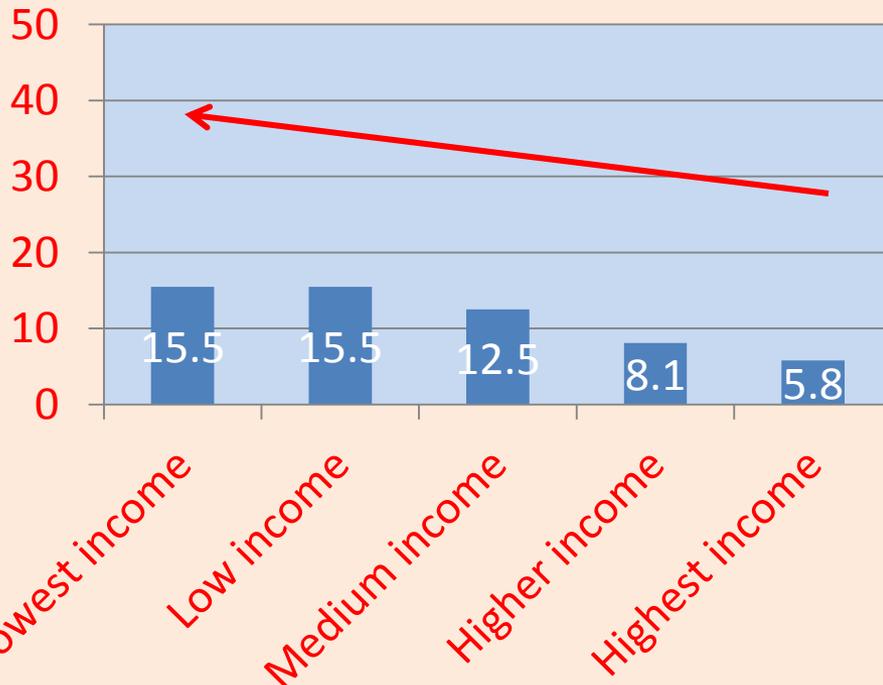
# Fruit and Vegetable Access

- **Green Carts**
- **Supermarkets**
- **Health Bucks/Farmers Markets**
- **Shop Healthy/bodegas**
- **Food Standards**
- **School salad bars**



# Fruit and Vegetable Consumption by Household Income in NYC 2012

Percentage of respondents reporting no servings of F/V the previous day



Percentage of respondents reporting  $\geq 5$  servings of F/V the previous day



Source: NYC DOHMH, Community Health Survey, 2012.

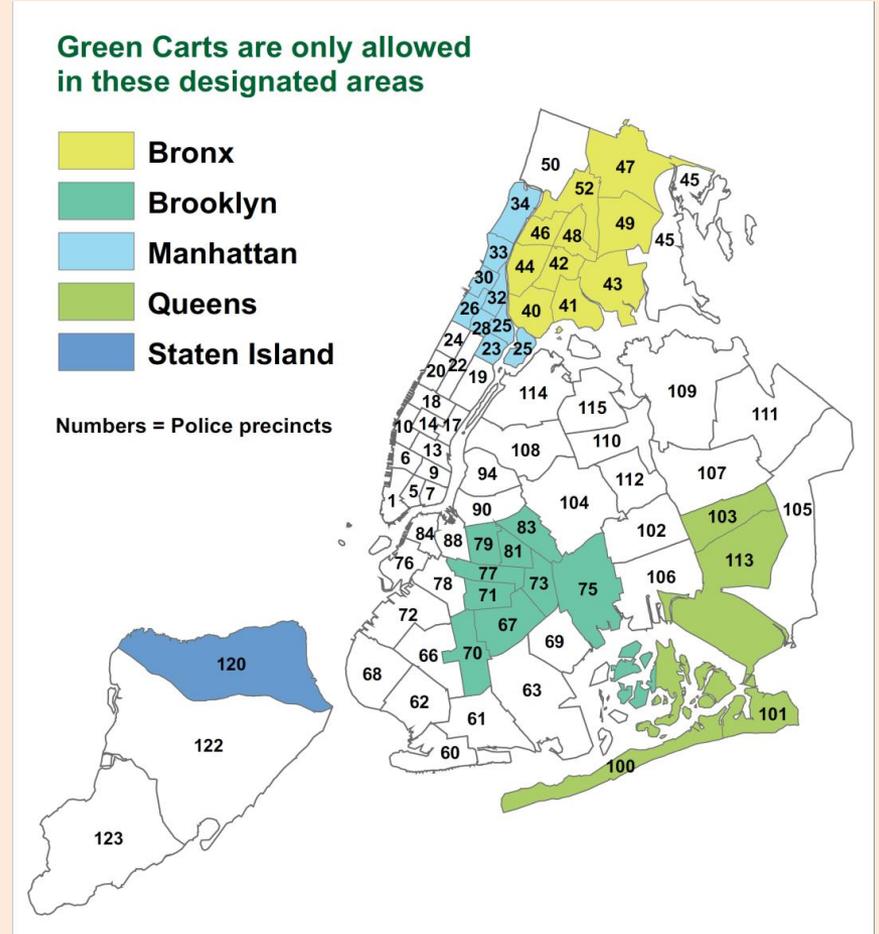
# Green Carts

In 2008 City Council established a new type of pushcart called a “green cart,” which is defined as a “pushcart used exclusively by those issued fresh fruits and vegetables full-term permits”



# Green Carts

Each of the city's 5 boroughs is allotted carts that can move freely but only within specified areas where the consumption of fruits and vegetables is lowest; these are also neighborhoods where the prevalence of diet related diseases is high

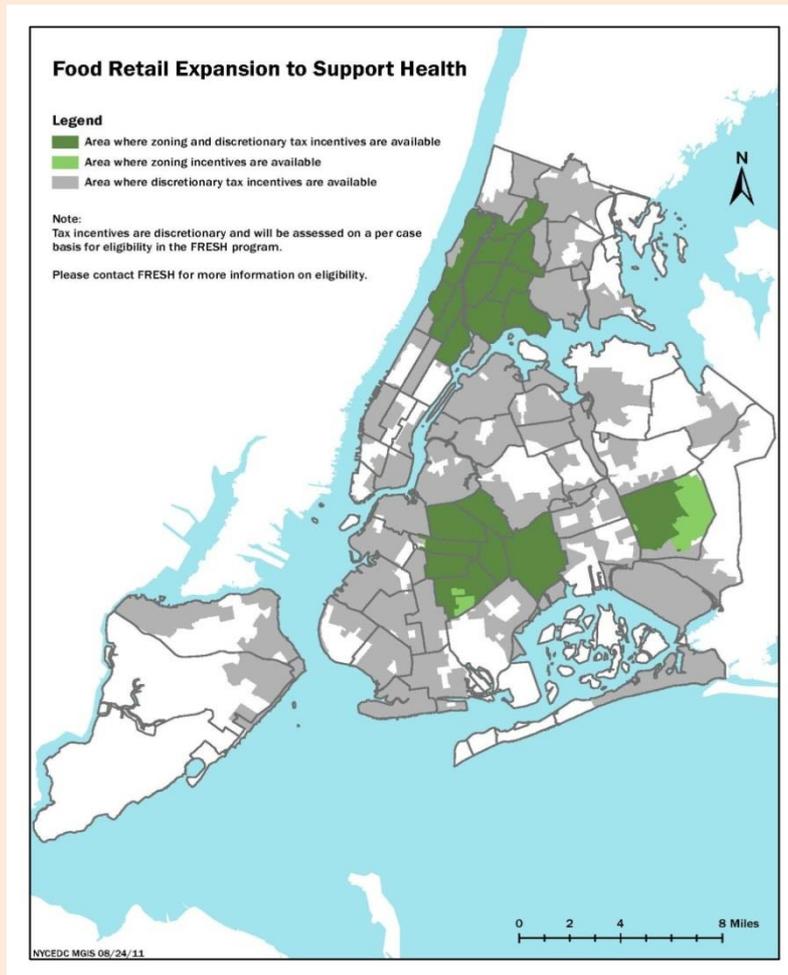


# Food Retail Expansion to Support Health

Since 2009, provides financial and zoning incentives to build or expand stores in underserved communities

Eligible supermarkets must have at least

- 6,000 sq. ft. of retail space overall
- 500 sq. ft. of retail space for fresh produce
- 30% of total retail space used for perishable foods



# Health Bucks

Since 2005, Health Bucks has provided coupons redeemable for fresh fruits and vegetables in New York City becoming the largest city farmers market incentive program in the United States.



# Health Bucks at Farmers Markets

- In 2015, more than 300,000 Health Bucks (or \$600,000) were distributed in all 5 boroughs
- SNAP sales at NYC markets showed more than 1000% increase over the last 7 years.
- Health Bucks are redeemable at all 140 farmers markets



# Healthy Bodegas Initiative 2007-2010

- Worked with 1000 re low-fat milk
- 500 to sell fresh fruits and vegetables
- Intensive: 20 in three neighborhoods every 6 months



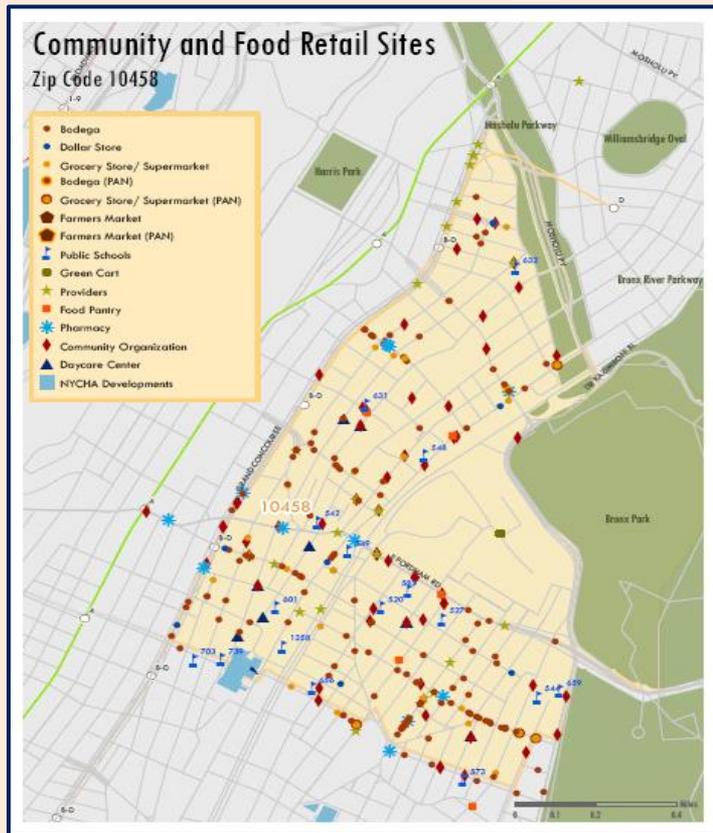
# Shop Healthy NYC

## A Program Overview



# Shop Healthy

## Fordham - 10458



136,800 people

70% adults overweight and obese

42% children overweight and obese

65% Hispanic

## West Farms - 10460



**Shop Healthy NYC** is a neighborhood-based approach that simultaneously addresses supply and demand



**Increased neighborhood access to healthy food**

# Community Work

## Support

- Post Shop Healthy Bronx support decal and maps
- Disseminate “I buy” cards
- Distribute newsletter

## Promote

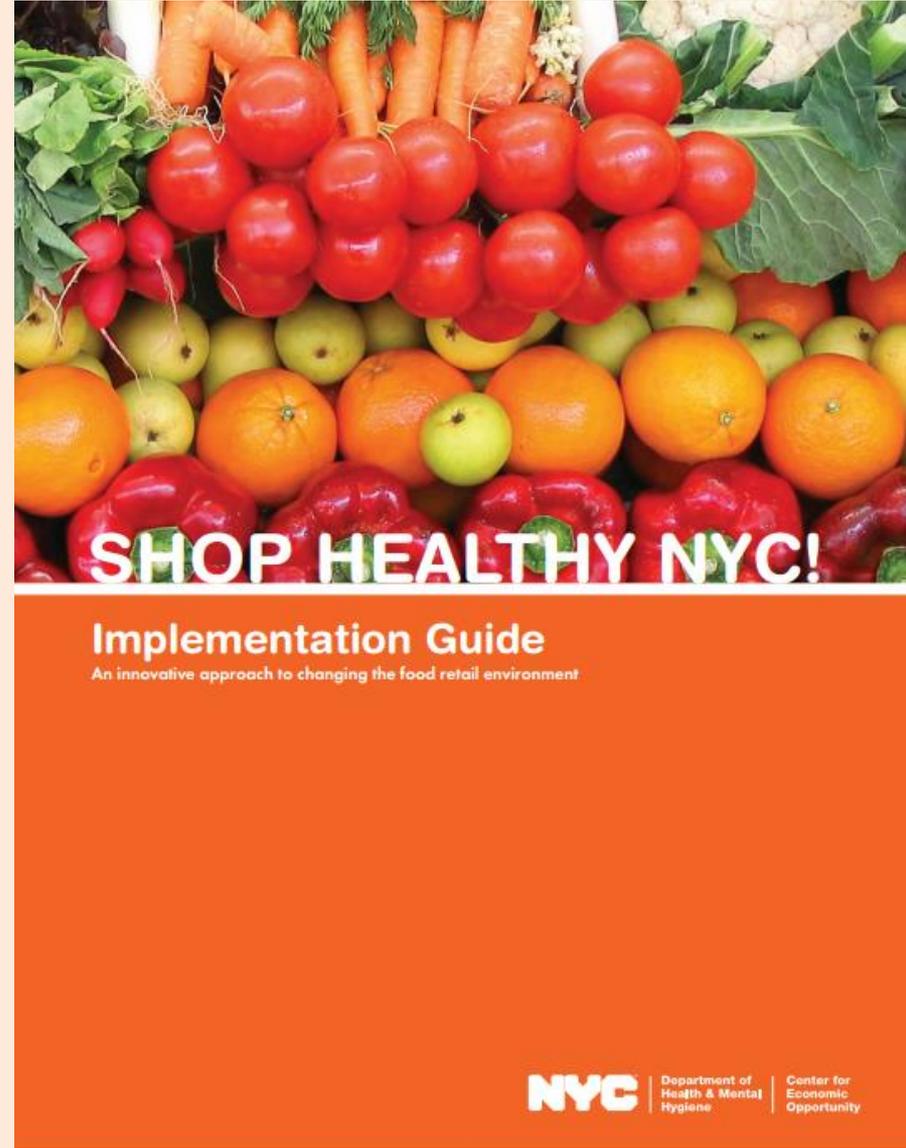
- Post store specific promotional materials
- Promote healthy foods & beverages
- Promote Green Carts and Farmers’ Markets

## Adopt a Shop

- Attend an Adopt a Shop or Nutrition Training
- Provide Technical Assistance to the store
- Conduct Cooking Demonstrations

# Resources

1. [Shop Healthy Implementation Guide](#)
2. [How to Adopt a Shop Toolkit](#)
3. Go to [NYC.GOV](#) and search Shop Healthy



# The 'Layering' Effect of Increasing Healthier Food



# Changing Social Norms for Healthier Food

Health Bucks

Supermarkets/Farmers Markets/Bodegas

Cooking at farmers markets, schools, CBOs

City Agencies/Hospitals

Affordability

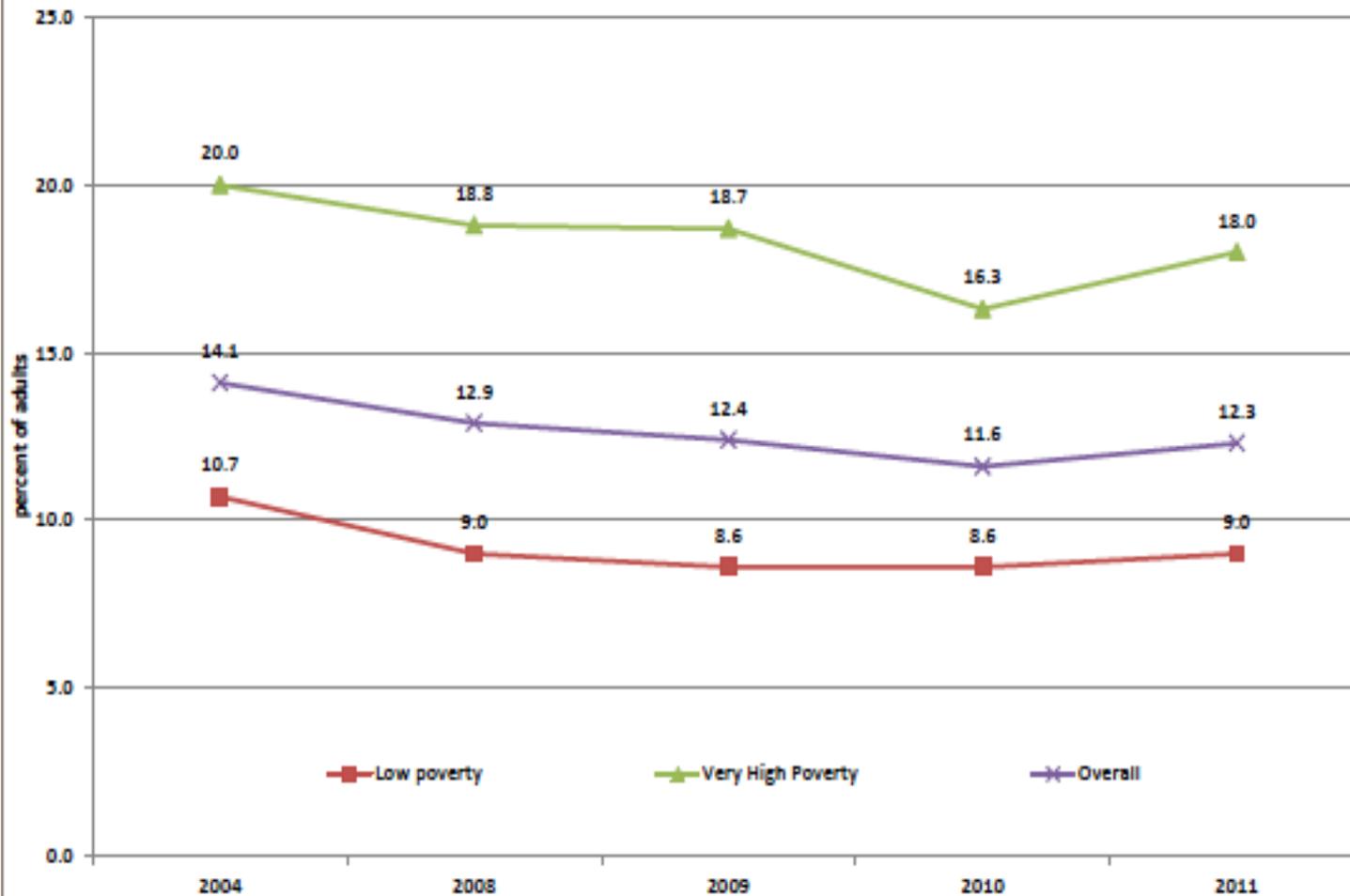
Accessibility

Familiarity

Sustainable

**FRESH, Green Carts, Mayoral Exec Order**

## Prevalence of no fruit/vegetable consumption yesterday: NYC adults by neighborhood poverty area, 2004-2011



Source: NYC Community Health Survey, 2004-2011. Data are age-adjusted to the US 2000 Standard Population. Neighborhood poverty defined as zip code residents below 100% of the Federal Poverty Level per Census 2000 (2004 data) and 2007-2011 American Community Survey data (2008-2011). Low poverty defined as <10%; very high poverty defined as >=30%.

# What has been done through the Campaign to reduce childhood obesity

*Create opportunities with partners that promote healthy eating and active living opportunities:*

- Partnership with the NY Junior Tennis League.
- Worked with Casita Maria Center for the Arts
  - Created the first ever Bronx Teens Master Chef Challenge.
- Identify partners for Bronx Active Living Week.
- Develop a Healthy Beverage Zone campaign with Borough President
- Increase Shop Healthy with Montefiore Hospital

# Goals for #Not62 in the Bronx

*A call to action*  
*by* **2020**



To build a foundation  
and infrastructure that  
engages multiple  
sectors in the Bronx to...

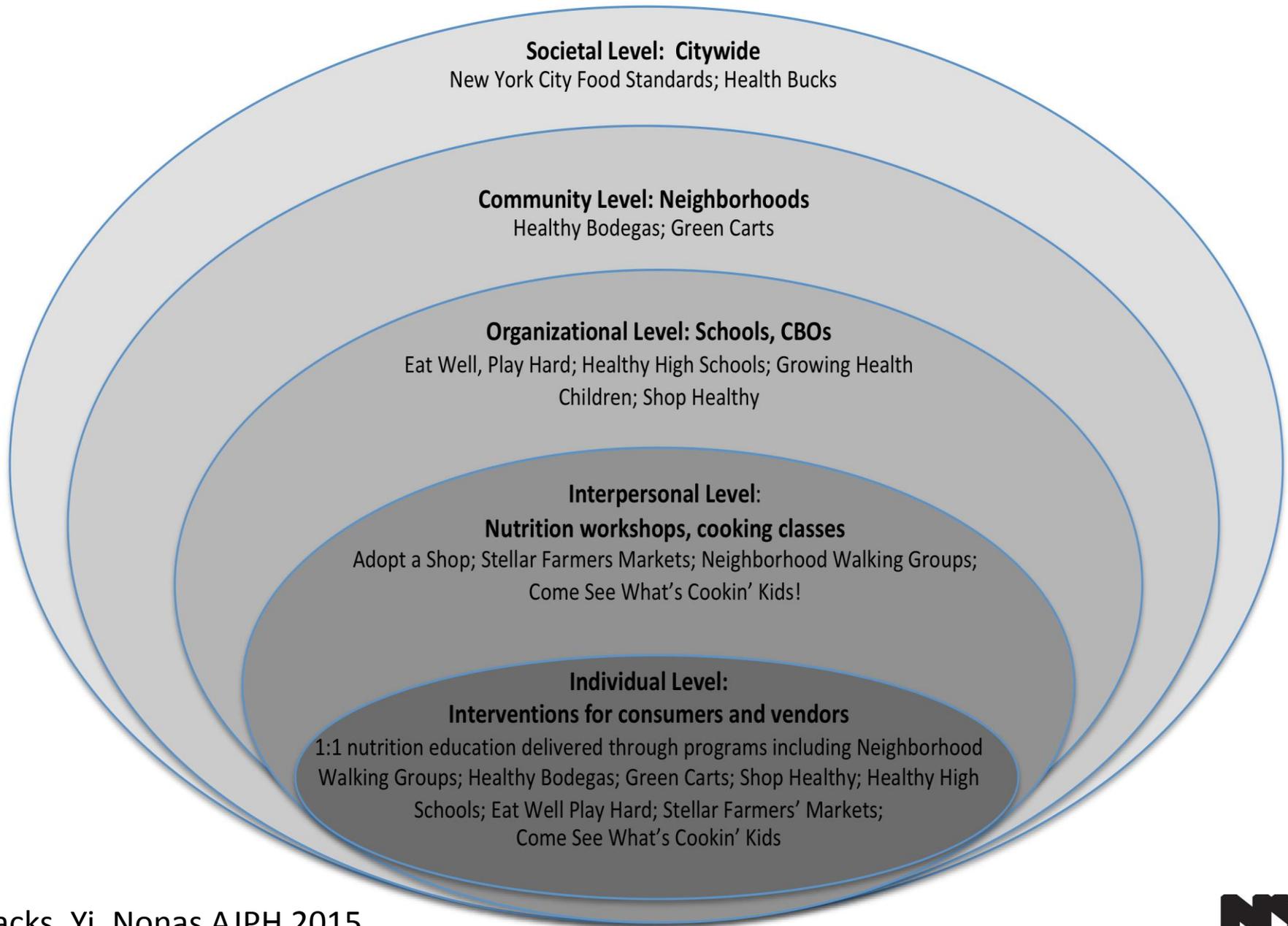
Improve social and  
economic factors

Educate and  
support healthy  
behaviors

Address issues in  
Clinical Care

Reshape our  
physical  
environment

# INCREASING FRUITS AND VEGETABLES ACCESS



- Launched in 2012
- Comprehensively promote healthy options in hospitals to help prevent chronic diseases

## Standards address:

- 1) Cafeterias
- 2) Beverage Vending Machines
- 3) Food Vending Machines
- 4) Patient Meals (Regular Diet)

New York City |  
HEALTHY HOSPITAL FOOD INITIATIVE

### New York City | HEALTHY HOSPITAL FOOD INITIATIVE

The Healthy Hospital Food Initiative aims to create a healthier food environment in New York City hospitals. This effort, led by the New York City Health Department, aligns with the mission of hospitals to promote health and wellness.

Hospitals participate by adopting the New York City Food Standards, evidence-based nutrition criteria that ensure that employees, visitors, and patients have better access to healthy food. By implementing all four of the New York City Food Standards, hospitals can comprehensively improve the nutritional content of food and beverages offered in their cafeterias, vending machines and patient meals.

#### New York City Food Standards

##### Cafeterias

These standards use a variety of techniques to make the healthy choice the easy choice. Includes standards that increase the availability of fresh fruits and vegetables and whole grains; promote healthy value meals; decrease the availability of high calorie beverages; and eliminate fried foods.

##### Beverage Vending Machines

These standards decrease the availability and portion size of high calorie beverages. Includes standards that address the placement of high calorie beverages and ensure that marketing images on machines are conveying healthy messages.

##### Food Vending Machines

These standards include nutrition requirements for calories, saturated fat, sodium, sugar, fiber and other nutrients in stocked products. Standards also address portion size by making requirements per package, rather than per serving.

##### Patient Meals

These standards, which apply to regular diet patient meals, provide nutrition requirements for individual foods purchased, such as sodium limits for bread and cereal, and for meals served, such as two fruit or vegetable servings at lunch and dinner.

#### What the Health Department Offers

- Individualized approach for each hospital with tailored action plans
- Free resources to support the implementation process, including assistance from a registered dietitian for menu and product review and staff education
- Public recognition of hospital accomplishments

Be a model  
of health and  
wellness.

As centers of healing,  
hospitals can model healthy  
eating to support the health  
of their employees and the  
communities they serve.

For more information, please contact: [myfoodstandards@health.nyc.gov](mailto:myfoodstandards@health.nyc.gov)

Made possible by funding from the Centers for Disease Control and Prevention and the Department of Health and Human Services.



# New York City | **HEALTHY HOSPITAL FOOD INITIATIVE**

- Health Department and Hospital Collaboration
- Adopt the NYC Food Standards to give employees, visitors and patients better access to healthy food
- Complements current work and furthers hospital's mission of wellness
- Provides framework and technical assistance to set and carry out ambitious goals
- Working with 40 hospitals



- NYC Health Department provides individualized, technical assistance such as menu and product review
- Hospitals implementing the Standards are:
  - Reducing sodium in recipes
  - Decreasing availability of high-calorie beverages
  - Increasing availability of fruits and vegetables
  - Making healthier options more prominent

**Our cafeteria meals  
and snacks are  
healthier than ever.**

Look for More:

- ✓ Fresh fruit and vegetables
- ✓ Whole grains: bread, brown rice, whole wheat pasta, quinoa, barley, oats
- ✓ Baked, grilled, steamed, and sauteed food
- ✓ Right-sized portions of bagels, muffins, cookies, and pastries
- ✓ Desserts and snacks under 200 calories
- ✓ Water and other low calorie beverages

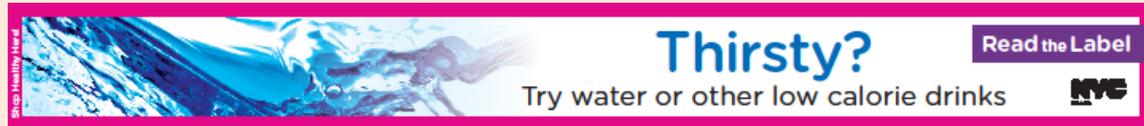
This hospital is a proud participant in New York City's  
Healthy Hospital Food Initiative.



# New York City | HEALTHY HOSPITAL FOOD INITIATIVE



Vending Machine Decals



Cafeteria Shelf Talkers

**Our cafeteria meals and snacks are healthier than ever.**

Look for More:

- ✓ Fresh fruit and vegetables
- ✓ Whole grains: bread, brown rice, whole wheat pasta, quinoa, barley, oats
- ✓ Baked, grilled, steamed, and sauteed food
- ✓ Right-sized portions of bagels, muffins, cookies, and pastries
- ✓ Desserts and snacks under 200 calories
- ✓ Water and other low calorie beverages

This hospital is a proud participant in New York City's Healthy Hospital Food Initiative.

**Our cafeteria meals and snacks are healthier than ever.**

Eating healthy meals can help prevent weight gain, and lowers your risk of heart disease and diabetes.

Healthy Value Meal Signs

**Special!**

**Lunch Combo**

TURKEY SANDWICH on Whole Wheat Bread  
+ Piece of Fruit + Bottled Water

(Or substitute ham, chicken or roast beef for turkey.)

\$ \_\_\_\_\_

**Special!**

**Breakfast Combo**

EGG on Whole Wheat Toast  
+ Piece of Fruit + Coffee or Tea

\$ \_\_\_\_\_

Cafeteria Table Tents & Posters

# Keys to Success

- Outreach
  - Building off existing relationships
  - Targeting organizations with similar interests
- Tailoring to the needs of the target population
- Technical assistance
- “Friendly” Competition

- Applies to foods served on the default, regular diet patient menu
- Therapeutic diets are exempt
- Includes standards for individual foods purchased:
  - ✓ Limit added sugar
  - ✓ Decrease sodium in processed foods
  - ✓ Increase fiber intake
- Includes standards for meals served:
  - ✓ Food and nutrient-based



- Promotes:
  - ✓ Fresh fruits, vegetables, and whole grains
  - ✓ Water
  - ✓ Calorie labeling
- Limits:
  - ✓ Portion sizes
  - ✓ Sodium
  - ✓ Fried foods and sugary drinks
- Integrates promotion, placement, and product mix to make the healthy choice the easy choice



## Levels of Recognition

Join the initiative and start implementing the NYC Food Standards.



**Clear**

Implement one of the NYC Food Standards.



**Bronze**

Implement two of the NYC Food Standards.



**Silver**

Highest level of recognition; implement all four of the NYC Food Standards.



**Gold**

# New York City | HEALTHY HOSPITAL FOOD INITIATIVE

The Healthy Hospital Food Initiative works with NYC hospitals to create healthier food environments using the NYC Food Standards. The Standards include working on patient meals, food and beverage vending machines, and cafeterias. Each participating hospital is recognized for their level of accomplishment on this map.

- ★ Highest level of recognition; implement all four NYC Food Standards.
- ★ Implement two NYC Food Standards.
- ★ Implement one NYC Food Standard.
- ☆ Join the initiative and start implementing the NYC Food Standards.

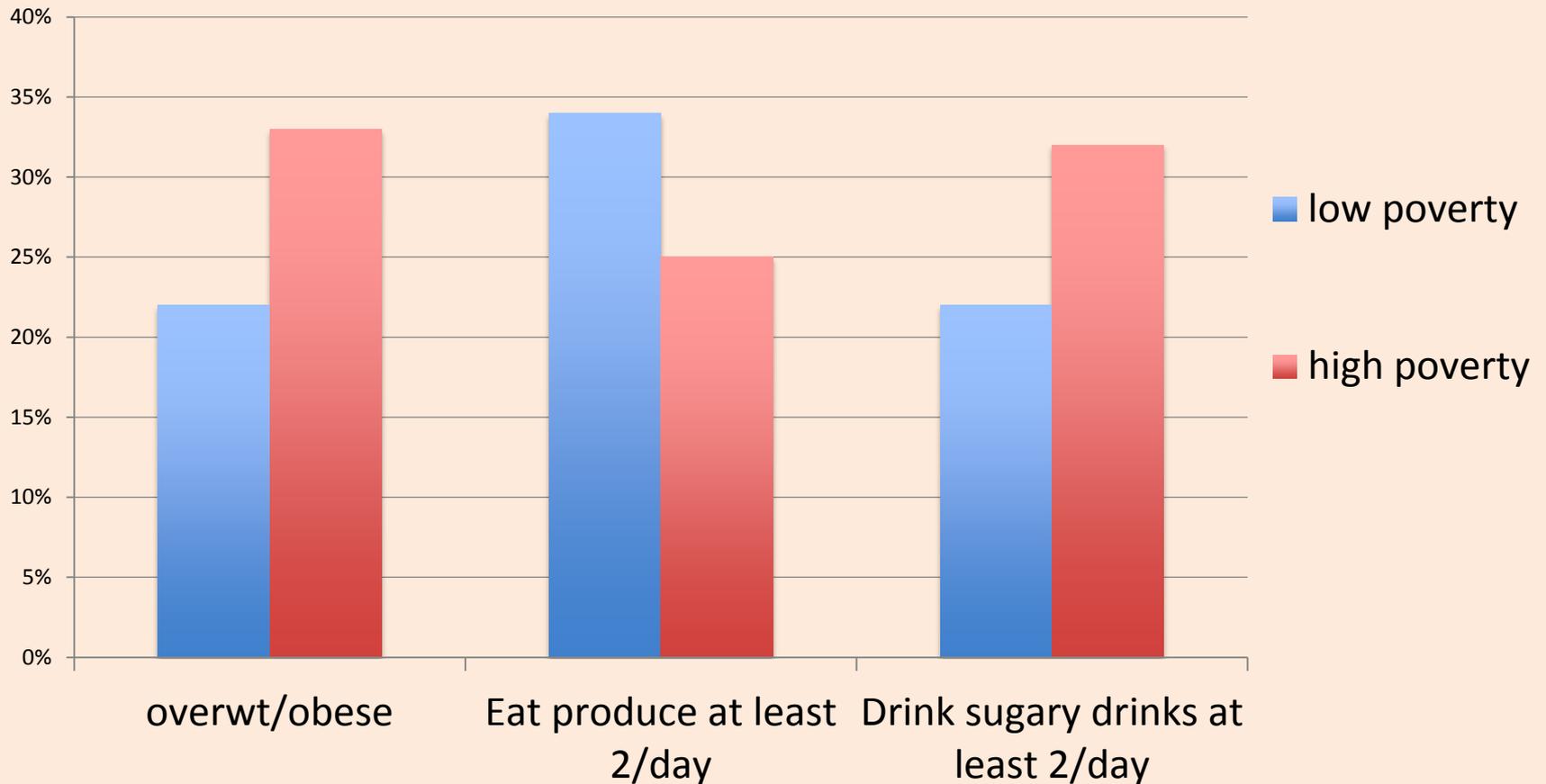


**“Food insecurity in the United States is not the result of a shortage of food or of resources; it is the result of poverty and of policies and programs that fail to prioritize the needs of low-income Americans.”**



The International Human Rights Clinic at NYU School of Law

# NYC Youth Risk Behavior Survey 2013



# Policies and Programs to Reduce Sugary Drinks



**ARE YOU POURING ON THE POUNDS?**

**You're drinking 68 PACKETS OF SUGAR in just 4 sugary drinks a day.**

23oz. Sweetened Tea + 20oz. Sports Drink + 40oz. Large Lemonade + 20oz. Soda

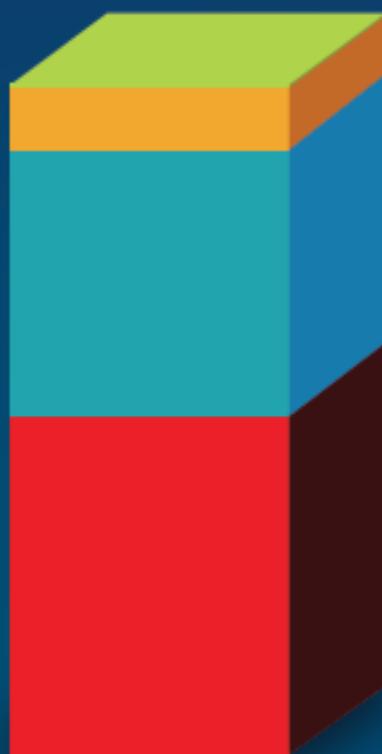
All those extra calories can bring on obesity, type 2 diabetes and heart disease. To learn more, call 311.

**NYC** Health

Michael R. Bloomberg, Mayor  
Thomas Farley, M.D., M.P.H., Commissioner

# The truth about food marketing

**\$1.8 billion**  
Spent per year on  
marketing aimed  
at children & teens



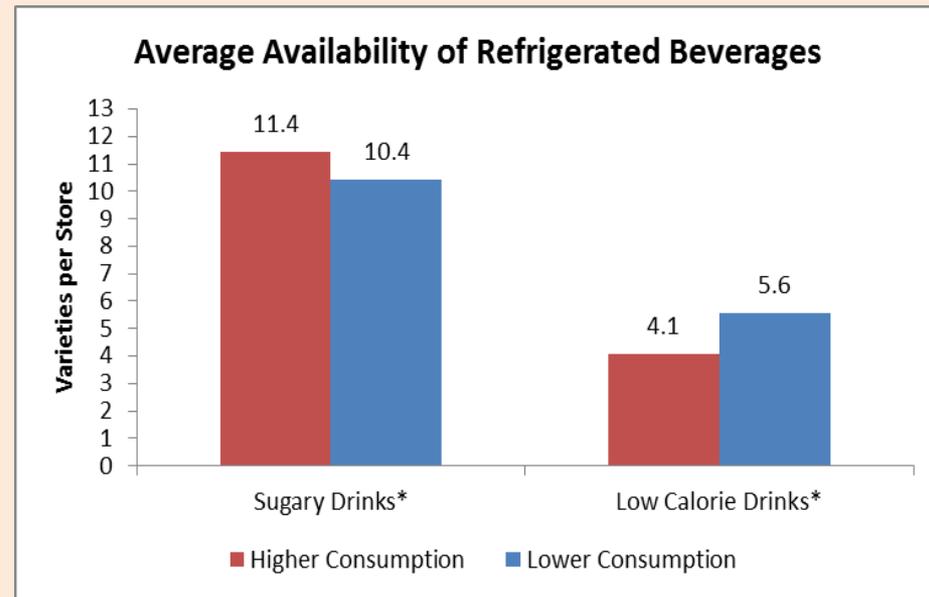
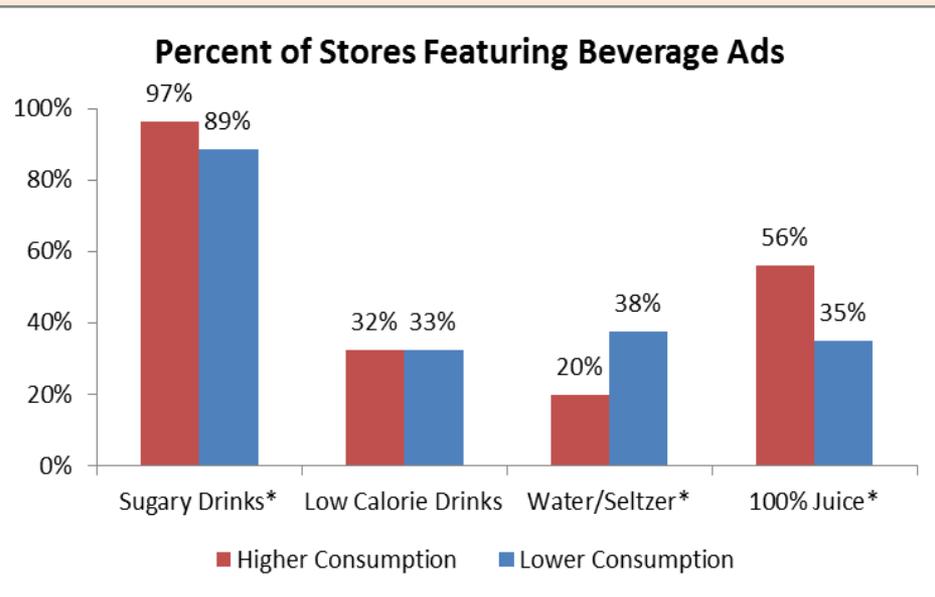
-  <1% fruits & vegetables
-  9% other foods
-  40% fast food
-  51% sugary drinks, sugary cereals, sweets & snacks

# Sugary Drinks In the Retail Environment

- “3 Lower” consumption neighborhoods: 11 - 27% of residents reported drinking  $\geq 1$  sugary drinks/day
- “3 Higher” consumption neighborhoods: 35 - 46% of residents reported drinking  $\geq 1$  sugary drinks/day



# Retail Audit Results from 883 Stores



\*Difference is significant at .001 level

# Retail Audit Results

Soda Brands and Sizes	Higher Consumption Neighborhoods (518 stores)	Lower Consumption Neighborhoods (365 stores)	Price Difference
Coke™/Pepsi™ 20 ounces*	\$1.38 (65 stores)	\$1.60 (110 stores)	\$0.22
Coke™/Pepsi™ 2 liters*	\$2.01 (76 stores)	\$2.18 (85 stores)	\$0.17

\*Difference between neighborhoods is significant at .001 level

# Can You Make The Message Go Viral?

<http://www.youtube.com/drinkingsugar#p/a/06E5CD687A191987/2/0mt-i2aypew>



# We Now Accept EBT

*2 Liters*  
**2 FOR \$3.00**



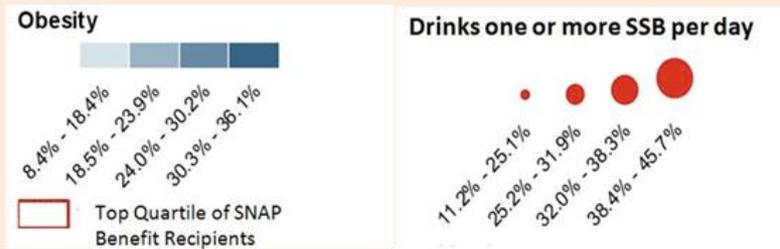
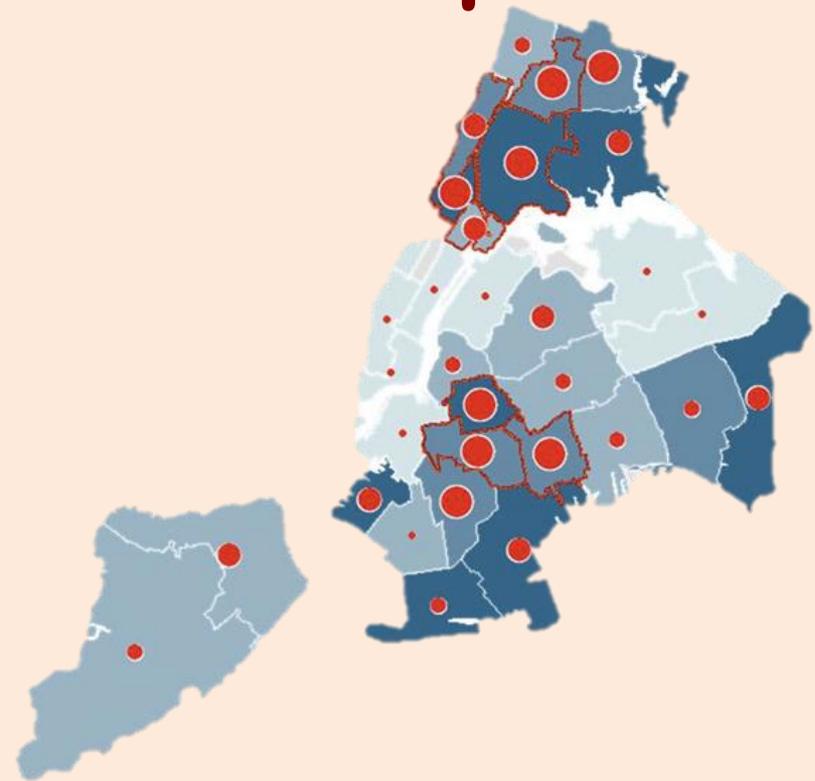
*Coca-Cola*

# Both sides of the Policy Coin

- Anti-hunger advocates are more likely to support measures that increase access to healthier foods, limit damaging food universally (regardless of income), and improved consumer information.
- They are more likely to oppose policies that seem to “scapegoat” low-income people for their health problems – stigmatize benefits, restrict or seem patronizing, or regressive taxes – addressing consumer, not industry

# Obesity, Sugar-Sweetened Beverage Consumption and SNAP Recipients

- Each year, an estimated \$75-135 million of SNAP benefits is spent on SSBs in NYC



# Developing & Deploying a Youth Social Media Campaign



**#OurVoiceNYC**  
**#SodaKills**



# Soda Taxes

## Failed

- Maine
- New York City
- Philadelphia
- San Francisco
- Richmond, Calif
- California
- Colorado



## Passed

- Berkley
- *Philadelphia*
- *Oakland*
- *San Francisco*

**SERVES 3**

**OVER ICE - NICE!**



**BIG 16 OZ. SIZE**



# Novel Policy Provokes Media

<https://www.youtube.com/watch?v=lsh8NBunrQU>

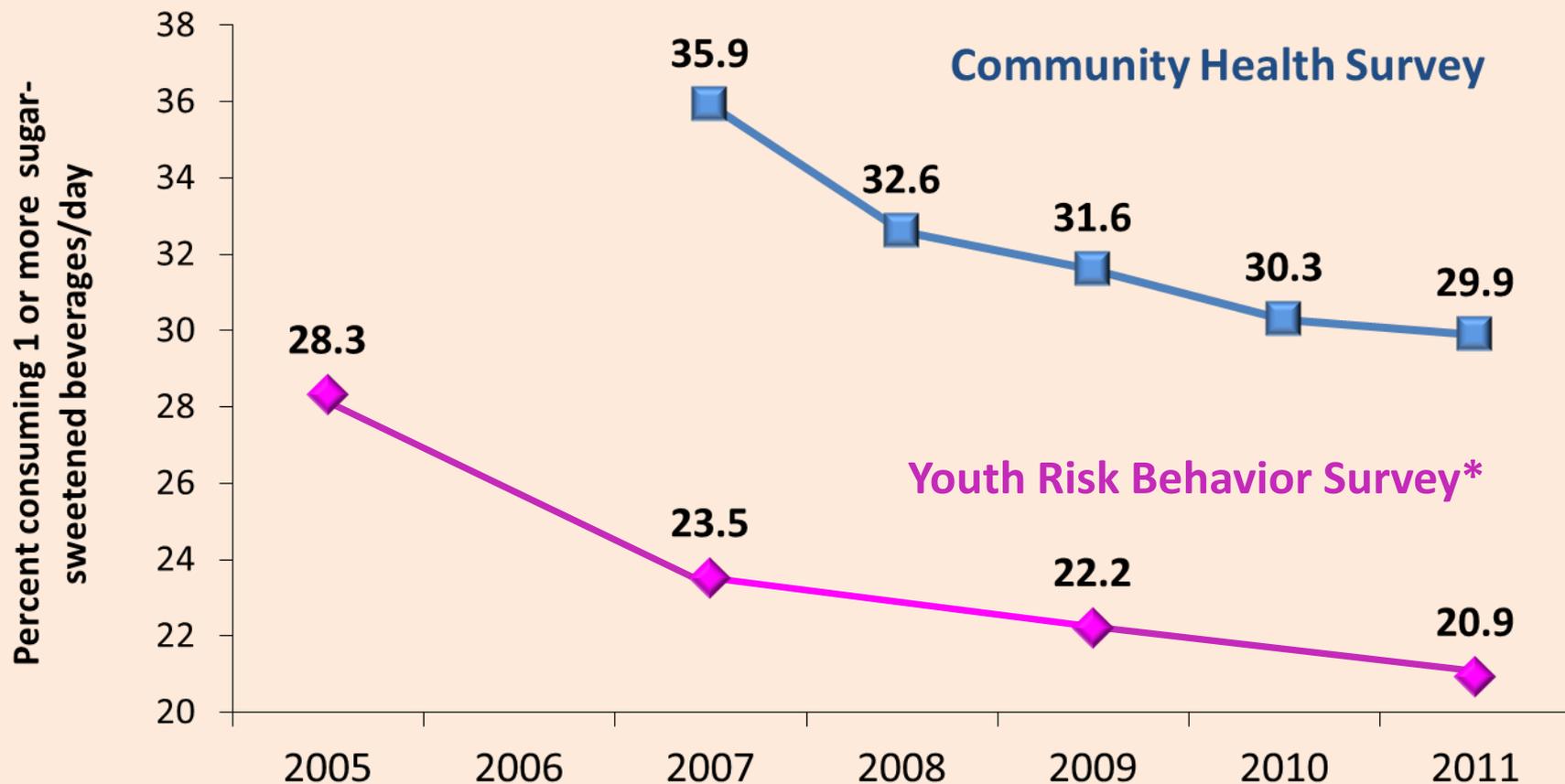


# Sugary Drink Regulatory Proposals

- **Excise tax** of 1cent/ounce
  - **Rejected** in NY State legislature
- **Waiver** to restrict use of Supplemental Nutrition Assistance Program benefits (“food stamps”) to purchase sugary drinks
  - **Rejected** by US Department of Agriculture
- **Portion cap** in restaurants
  - Passed by Board of Health
  - March 11<sup>th</sup> Judge **Rejected**

# Some Success :

## Drop in Sugar-Sweetened Beverage Consumption in NYC



^Sugar sweetened beverage includes soda and other sweetened drinks like iced tea, sports drinks, fruit punch/other fruit –flavored drinks.

\*Youth Risk Behavior Survey (YRBS) data includes soda only.

NYC Community Health Survey included adults with landline phones since 2002 and, starting in 2009, also has included adults who can be reached only by cell-phone. 2007 is baseline for Take Care New York 2012.



- Children do not eat calories, they eat food. Let's ensure they eat healthy foods.
- Children do not burn calories, they play and move around. Let's give them a greater chance to do so.