



Childhood Obesity Intervention
Cost-Effectiveness Study

The CHOICES Project: Projecting Impact of a Sugary Drink Excise Tax in New York City on Health and Health Equity

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Disclaimer & Funding

- » The CHOICES Project engages in research and education. The information presented in this discussion today is for educational purposes only and does not necessarily represent the position of any CHOICES Project funders.
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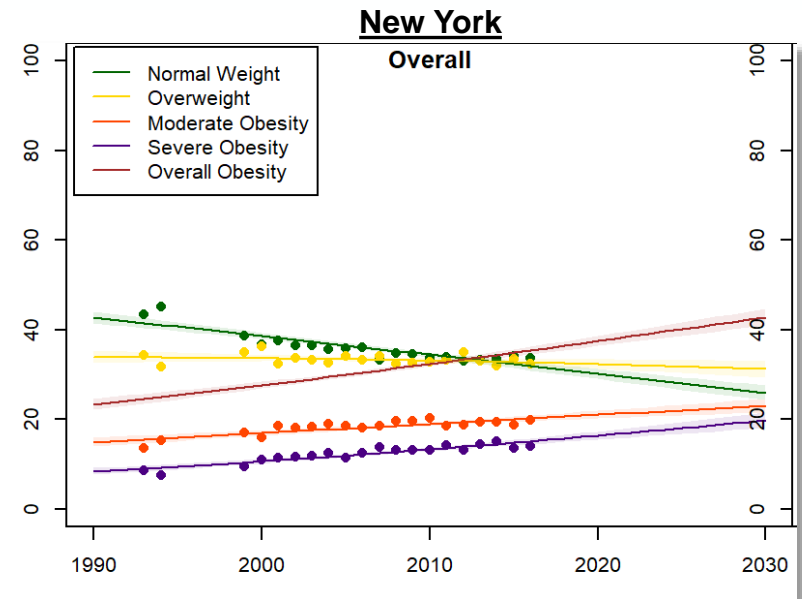
What is the CHOICES Project?



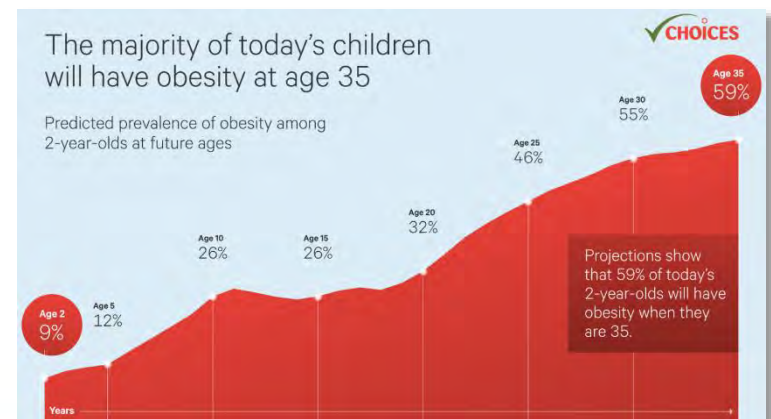
The Childhood Obesity Intervention Cost-Effectiveness Study (CHOICES) Project researches prevention policies and programs that will help more kids have a healthy weight and deliver the best results for the dollars invested.

The Challenge

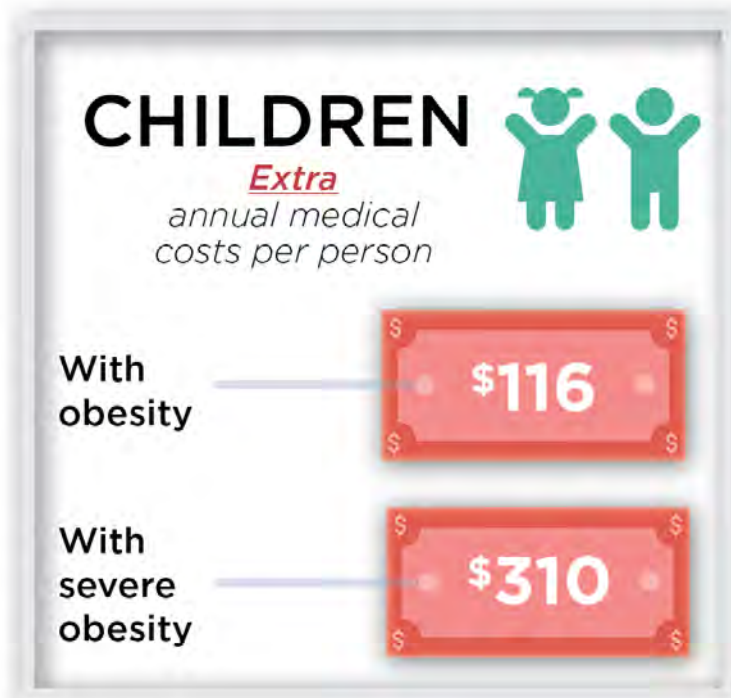
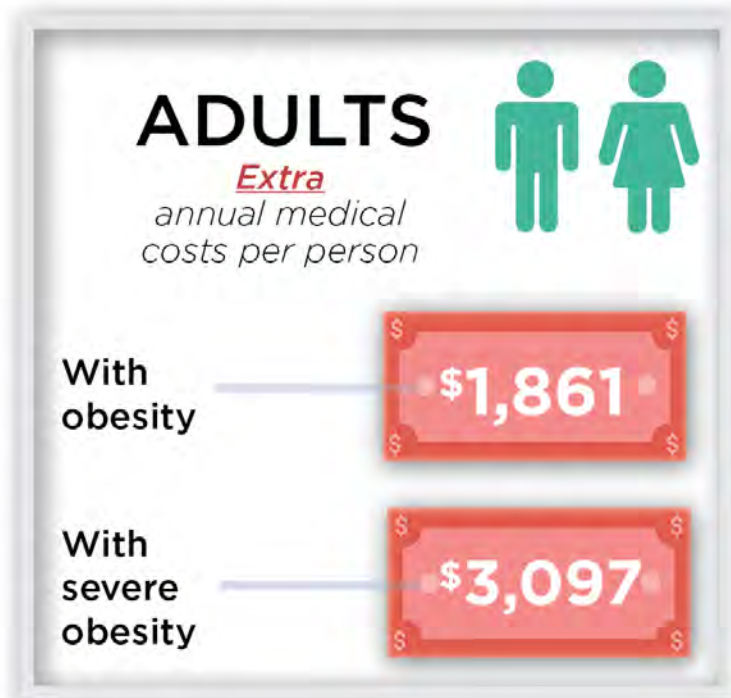
- » About **half of the adult U.S. population is projected to have obesity** & about a quarter to have severe obesity by 2030¹
- » Nearly **half (43%) of the adult New York state population is projected to have obesity** & about 20% to have severe obesity by 2030¹
- » Racial/ethnic & economic disparities are projected to persist
- » The **majority of today's children will have obesity at age 35**²



<https://choicesproject.org/new-york-adult-obesity-severe-obesity-projections>



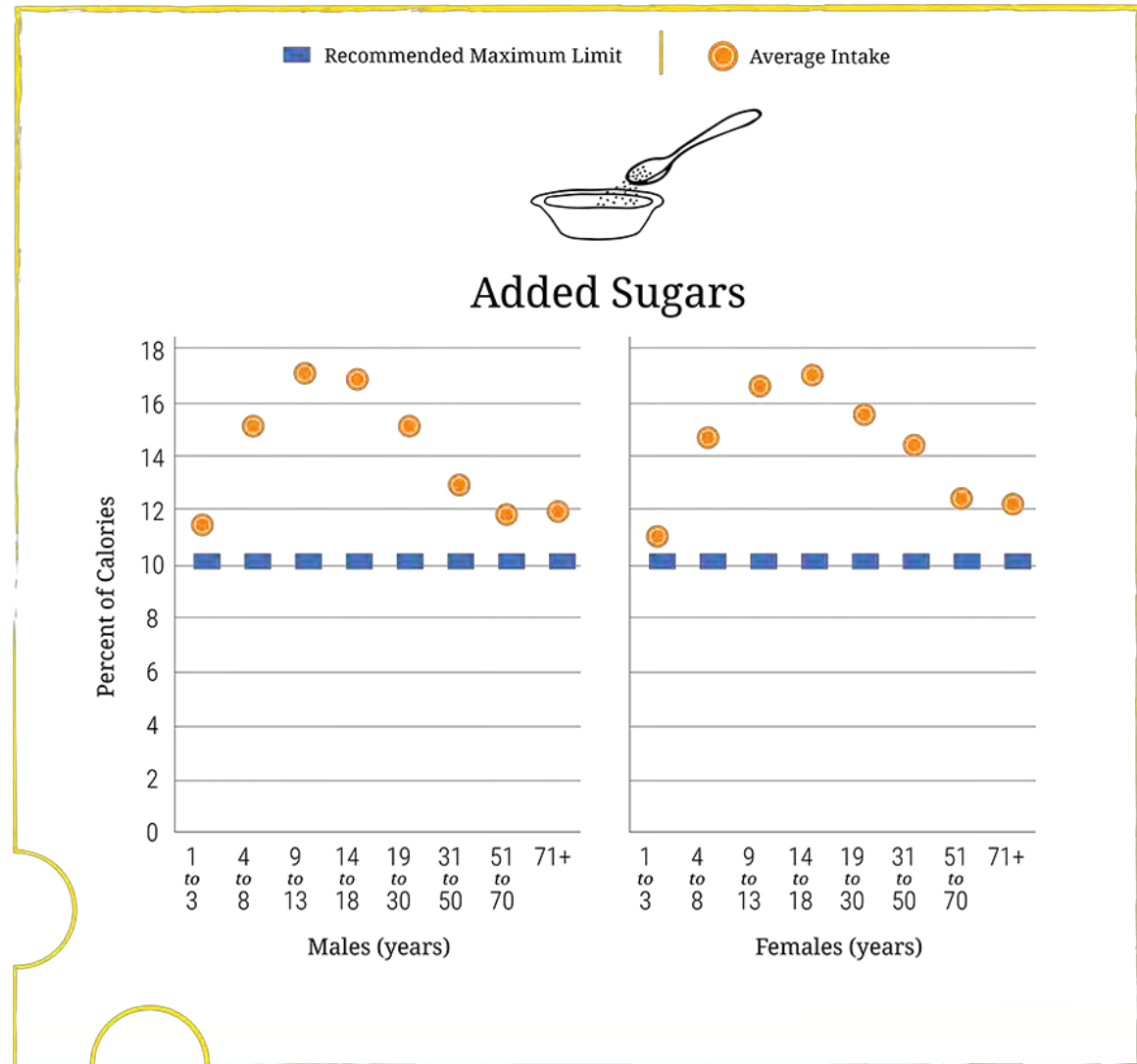
Higher Annual Medical Costs



Why Reduce Sugar Drink Intake?

U.S. Dietary Guidelines 2015-2020

Figure 2-9. **Average Intakes of Added Sugars as a Percent of Calories per Day by Age-Sex Group, in Comparison to the *Dietary Guidelines* Maximum Limit of Less Than 10 Percent of Calories**

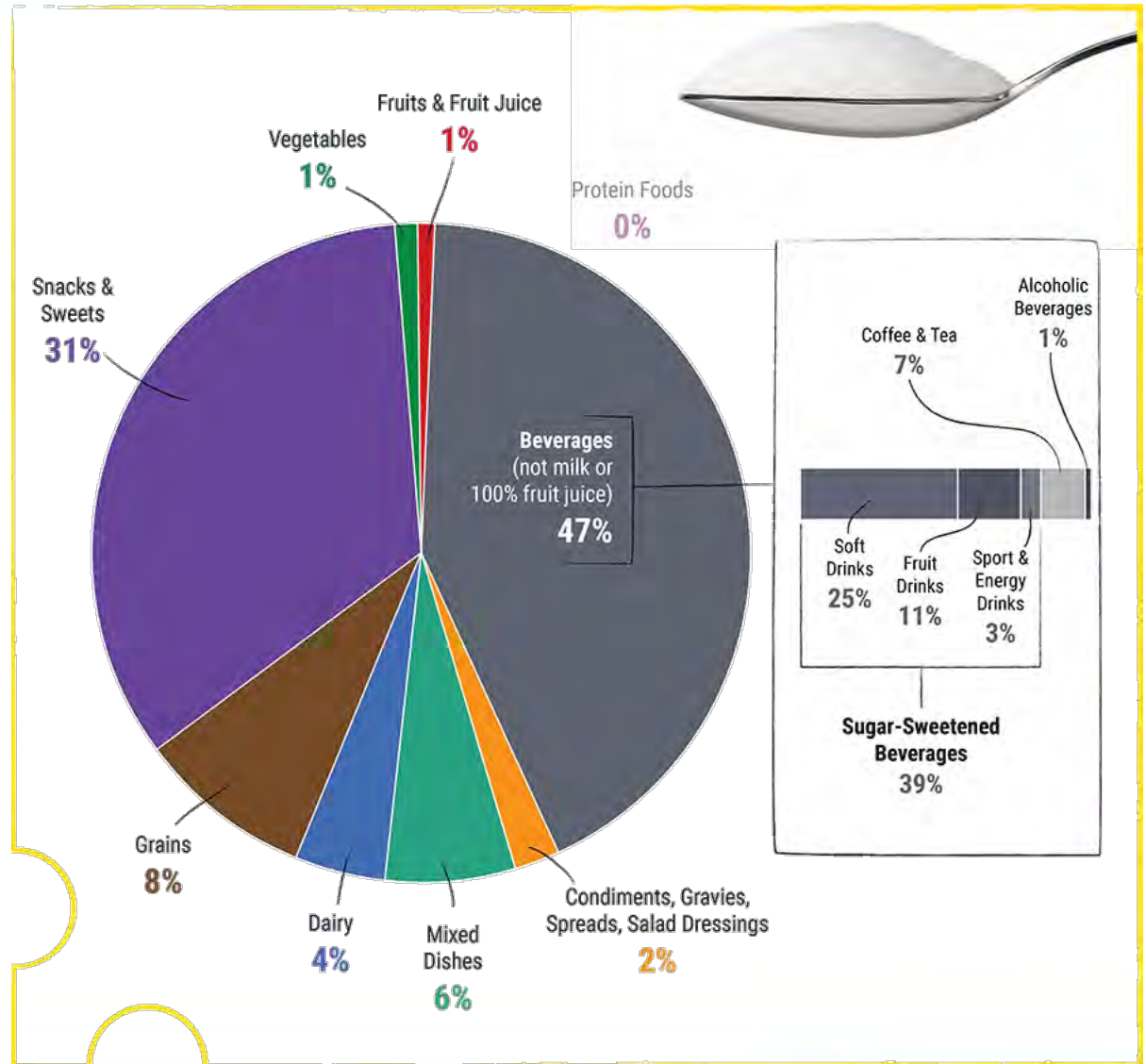


<https://health.gov/dietaryguidelines/2015/guidelines/chapter-2/a-closer-look-at-current-intakes-and-recommended-shifts>

Why Reduce Sugar Drink Intake?

U.S. Dietary Guidelines 2015-2020

Figure 2-10. Food Category Sources of Added Sugars in the U.S. Population Ages 2 Years and Older



What can we do about this?

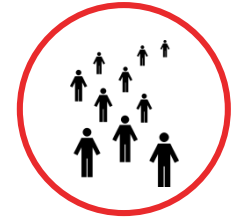
- ▶ Strong evidence links sugary beverage intake to excess weight gain and future chronic disease¹
- ▶ Note that research concerning these effects is recent - the past two decades (our Lancet study in 2001² was the first documenting risk to youth obesity)
- ▶ Sugary drink excise taxes can cost effectively prevent excess weight gain³

¹Malik VS, Pan A, Willett WC, Hu FB. Am J Clin Nutr. 2013 Oct;98(4):1084-102.

²Ludwig DS, Peterson KE, Gortmaker SL. Lancet. 2001 Feb 17;357(9255):505-8.

³Gortmaker SL, Wang YC, Long MW, et al. Health Aff (Millwood). 2015 Nov;34(11):1932-9.

What is CHOICES doing?



Policies and
programs
improving
nutrition &
physical
activity
environments



Best results
for dollars
invested



Improve
population
health &
health equity

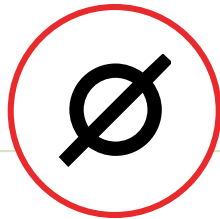
Cost-Effectiveness Analysis

Cost-Effectiveness Analysis

compares the costs and outcomes of:



vs.



One policy or
program strategy with
no strategy

OR



vs.



Two or more policy or
program strategies

CHOICES Model



Virtual population = 1 million people

- Based on massive amounts of national, state, & local data
- Accounts for characteristics like body growth & behaviors like dietary intake & smoking

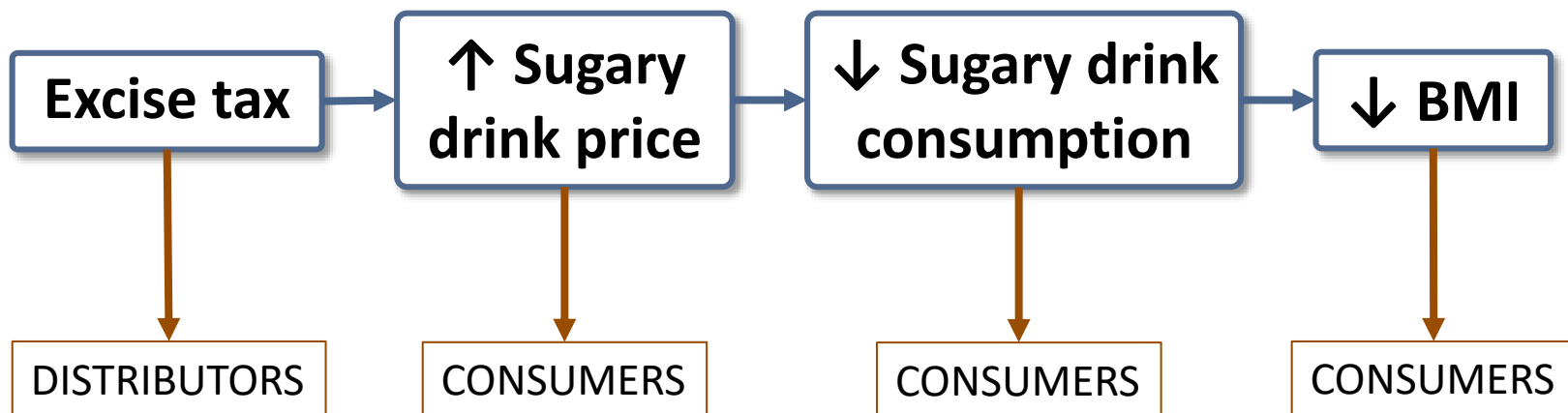
What have we found?



There are strategies that are cost-effective and **improve both population health and health equity**. A sugary drink excise tax is one of those strategies.



Sugary Drink Excise Tax

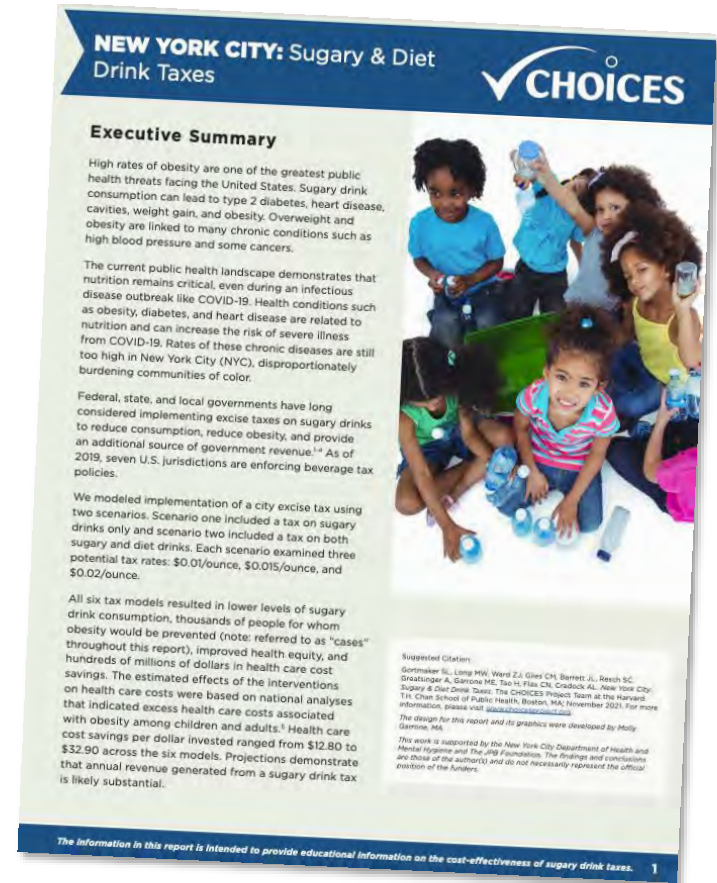


Sugary drink: a drink that has added sugars, including soda, sweetened iced tea, sports drinks, energy drinks, fruit punch, and other fruit-flavored drinks

Projected Impact of a \$0.02/oz Tax in NYC

Key Findings:

- ✓ Lower levels of sugary drink consumption
- ✓ Thousands of people for whom obesity would be prevented
- ✓ Hundreds of millions of dollars in health care cost savings
- ✓ Improved health equity
- ✓ Substantial annual revenue
(UConn Rudd Center Revenue Calculator)



Projected Impact of a \$0.02/oz Tax in NYC

94,800



Cases of obesity prevented in 2027

\$32.90



Health care costs saved per \$1 invested

\$437 million



Saved in net costs

3,640



Cases of diabetes prevented

Projected Impact of a \$0.02/oz Tax in NYC



\$5.06
million

Reduction in NYC
Medicaid expenditures



\$48.5 million



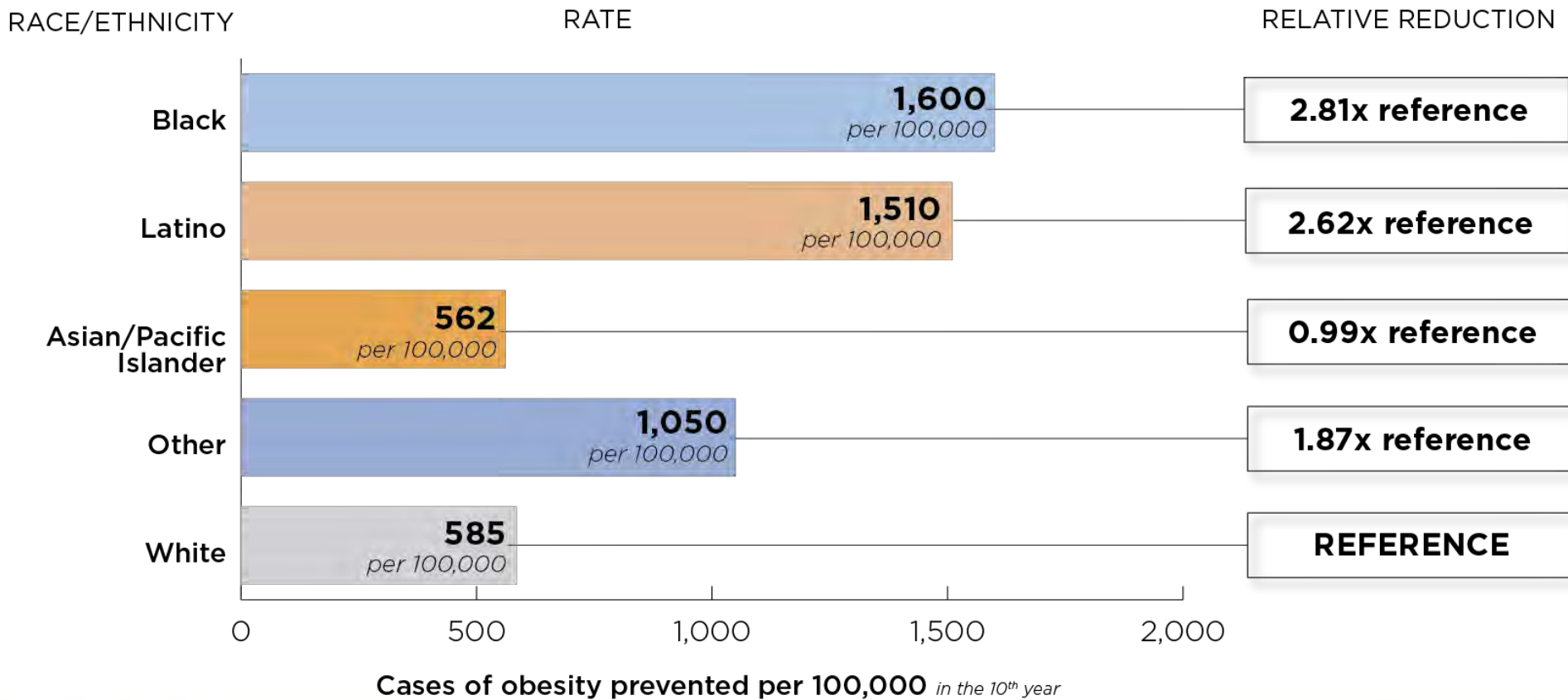
Total tooth decay
treatment costs avoided
over 10 years



\$210.20

Reduction in spending on
sugary drinks per
household in the first year

Projected Equity Impact of a \$0.02/oz Tax in NYC



\$0.02/oz Tax in NYC: Impact on Health Equity



**\$363
million***

Projected annual revenue¹

**Assuming 70% of Rudd Center projections*



- » This tax is **progressive**
- » Greater health benefits would accrue to Black & Latino New Yorkers, thus improving health equity
- » Revenue can be reinvested in communities with lower incomes if earmarked by legislature²

THANK YOU

www.choicesproject.org

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