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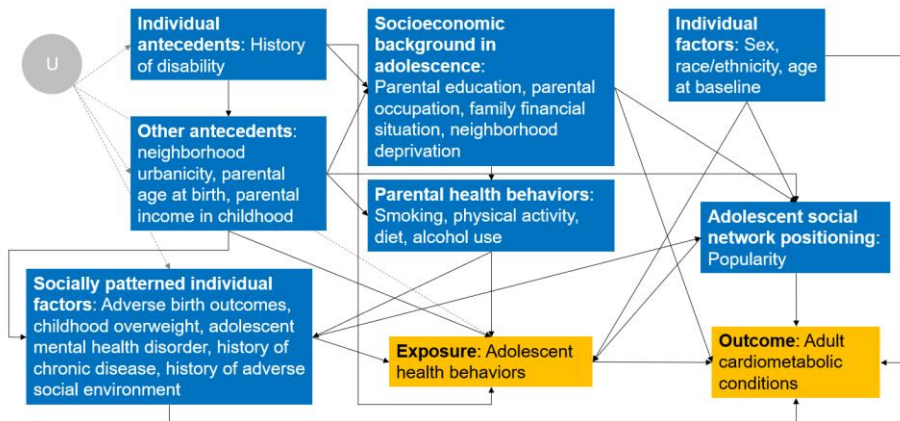
BACKGROUND

- High-risk health behaviors in adolescence could have detrimental effects on adult cardiometabolic health differing by socioeconomic situation
- **Aim:** to quantify the differential effect of adolescent high-risk health behaviors on adult cardiometabolic conditions by family financial situation

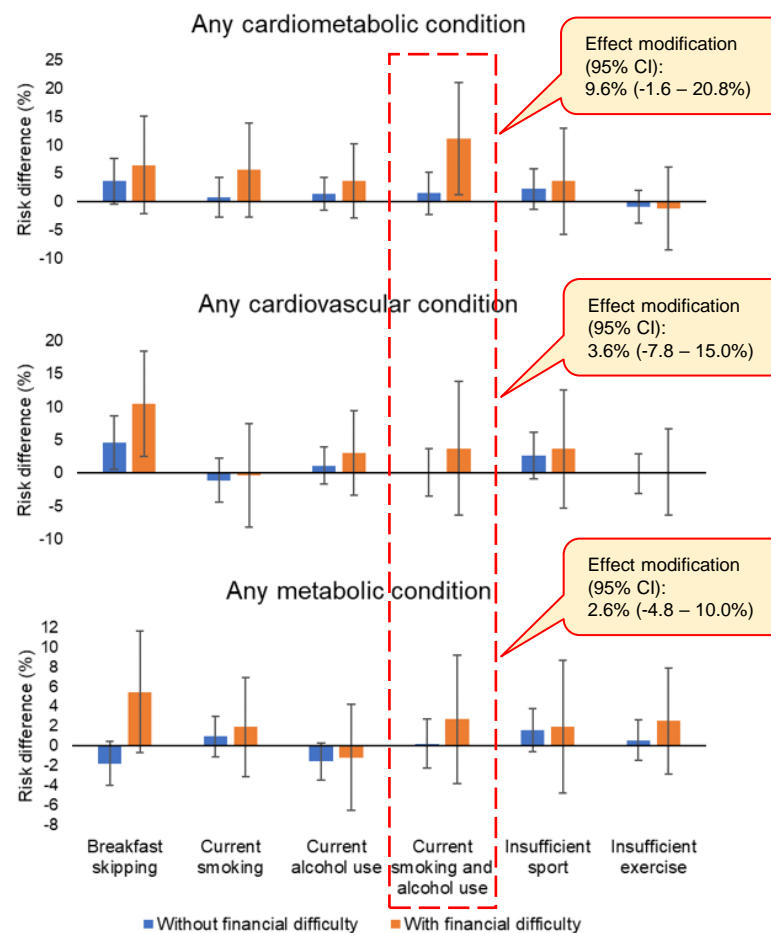
METHODS

- **Data source:** National Longitudinal Study of Adolescence to Adulthood (Add Health), nationally representative prospective US cohort, 1994 – now
- Assessed clustering of health behaviors using latent class modeling & estimated conditional average causal effect by family financial situation

Causal model:



Average causal effect of high-risk health behaviors on cardiometabolic conditions



RESULTS

- 36% of adolescents developed cardiometabolic conditions after 21 years
- Smoking and alcohol use frequently clustered
- **Joint smoking and alcohol use increased cardiometabolic cases by 9.6%** among adolescents with family financial difficulty vs. peers without (95% CI: -1.6% – 20.8%)
- No consistent differential effect of breakfast skipping on metabolic conditions across sensitivity analyses
- No differential effects of insufficient physical activity on adult cardiometabolic conditions

KEY MESSAGES & PUBLIC HEALTH SIGNIFICANCE

- Smoking and alcohol use in adolescence leads to unequal increases in adult cardiometabolic conditions
- Targeting high risk behaviors like smoking and alcohol use in adolescence may reduce socioeconomic inequalities in adult cardiometabolic health