Excerpts from “**The Impact of Poverty, Food Insecurity, and Poor Nutrition on Health and Well-Being”**

*This paper was prepared by FRAC’s Heather Hartline-Grafton, DrPH, RD, Senior Nutrition Policy and Research Analyst, with research assistance provided by Olivia Dean during a spring 2017 internship.*

There is growing awareness and acknowledgment in the health care community that health outcomes and disparities, more often than not, are driven by social determinants of health than by medical care.1 Social determinants of health include social, economic, physical, or other conditions where people live, learn, work, and play that influence their health.2 Poverty and food insecurity are social determinants of health, and are associated with some of the most serious and costly health problems in the nation.

Maintaining good health, consuming a nutritious diet, managing an existing chronic disease, or a combination of these can be a challenge for those struggling with poverty or food insecurity for a variety of reasons, including limited finances and resources, competing priorities, and stress. In addition, those impacted by poverty or food insecurity are likely experiencing additional resource-related hardships (e.g., housing instability, energy insecurity)3 that, in turn, can contribute to poor nutrition, health, and disease management.4,5,6

This paper reviews the latest research on the harmful impacts of poverty, food insecurity, and poor nutrition on the health and well-being of children and adults.

**Page 1**

**Food Insecurity, Health, and Well-Being**

In 2016, approximately 28.3 million adults (11.5 percent of all adults) and 12.9 million children (17.5 percent of all children) lived in food-insecure households.69 Food insecurity — even marginal food security (a less severe level of food insecurity)70, 71, 72 — is associated with some of the most common and costly health problems and behaviors in the U.S., as shown in Figure 1 on the next page. While food insecurity has direct and indirect impacts on physical and mental health for people of all ages, food insecurity is especially detrimental to the health, development, and well-being of children in the short and long terms.73, 74, 75, 76

After multiple risk factors are considered, children who live in households that are food insecure, even at the lowest levels, are likely to be sick more often, recover from illness more slowly, and be hospitalized more frequently. Lack of adequate healthy food can impair a child’s ability to concentrate and perform well in school and is linked to higher levels of behavioral and emotional problems from preschool through adolescence.” — American Academy of Pediatrics’ Policy Statement, Promoting Food Security for All Children77

According to a study of working-age adults living at or below 200 percent of the federal poverty line: “In general, lower food security is associated with higher probability of each of the chronic diseases examined — hypertension, coronary heart disease (CHD), hepatitis, stroke, cancer, asthma, diabetes, arthritis, chronic obstructive pulmonary disease (COPD), and kidney disease … Moreover, differences between adults in households with marginal, low, and very low food security are very often statistically significant, which suggests that looking at the entire range of food security is important for understanding chronic illness and potential economic hardship. Indeed, food security status is more strongly predictive of chronic illness in some cases even than income. Income is significantly associated with only 3 of the 10 chronic diseases — hepatitis, arthritis, and COPD — while food insecurity is significantly associated with all 10.” — From Food Insecurity, Chronic Disease, and Health Among Working-Age Adults78

**Page 3**

**\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**Because of limited financial resources, those who are food insecure — with or without existing disease — may also use coping strategies to stretch budgets that are harmful for health, such as:**

* engaging in cost-related medication underuse or nonadherence (e.g., skipping doses, taking less medicine than prescribed, delaying to fill a prescription, not taking certain medications with food as instructed);150, 151, 152
* postponing or forgoing preventive or needed medical care;153, 154
* forgoing the foods needed for special medical diets (e.g., diabetic diets);155
* purchasing a low-cost diet that relies on energy-dense, but nutrient-poor, foods;156, 157
* diluting or rationing infant formula;158
* and making trade-offs between food and other basic necessities (e.g., housing, utilities, transportation).159, 160

**Food insecurity, along with the health-compromising coping strategies associated with food insecurity, can exacerbate existing disease.** Some of these exacerbated conditions include poor glycemic control for people with diabetes,161, 162, 163, 164 end stage renal disease for people with chronic kidney disease,165 and low CD4 counts and poor antiretroviral therapy adherence among people living with HIV.166, 167 Food insecurity also can complicate and compound the health challenges and expenses faced by households with children who have special health care needs or adults with disabilities — populations at high risk for food insecurity.168, 169, 170, 171 For example, children with epilepsy living in food-insecure households have significantly worse health related quality of life and more medication side effects than their counterparts in food-secure households.172

**Not surprisingly, research shows that household food insecurity is a strong predictor of higher health care utilization and increased health care costs**.173 For instance, food insecurity and its associated health-compromising coping strategies can increase physician encounters and office visits,174, 175 emergency room visits,176, 177, 178 hospitalizations,179, 180, 181 and expenditures for prescription medications.182 The implications for health care costs are staggering: the direct and indirect health-related costs of hunger and food insecurity in the U.S. have been estimated to be $160 billion for 2014 alone.183 Furthermore, using data from 2011 to 2013, researchers estimated that those experiencing food insecurity have an extra $1,863 in health care expenditures each year, compared to their food-secure counterparts.184 This translates to $77.5 billion in excess annual health care expenditures among those with food insecurity. The extra health care expenditures are particularly high among food-insecure adults with heart disease ($5,144 extra), diabetes ($4,414 extra), and hypertension ($2,176 extra), when compared to food-secure adults with these chronic diseases.

**Page 5**

**Conclusion**

Poverty, food insecurity, and poor nutrition have serious consequences for the health and well-being of children, adults, and older adults, including a greater risk for chronic disease and poor mental health. Beyond the consequences for individuals and families, these consequences also have costly implications for the economy and health care system. Fortunately, solutions exist to tackle these challenging issues, including increased utilization of the federal nutrition programs. SNAP and the Child Nutrition Programs are important, effective, and widely available interventions to improve the health and well-being of vulnerable Americans.

**Page 6**

**Works Cited Entry:**

Hartline-Grafton, Heather and Olivia Dean. “The Impact of Poverty, Food Insecurity, and Poor Nutrition on Health and Well-Being.” Food Research & Action Center, Dec. 2017. <https://frac.org/wp-content/uploads/hunger-health-impact-poverty-food-insecurity-health-well-being.pdf>.