

Understanding the Components of U.S. Food Expenditures During Recessionary and Non-Recessionary Periods

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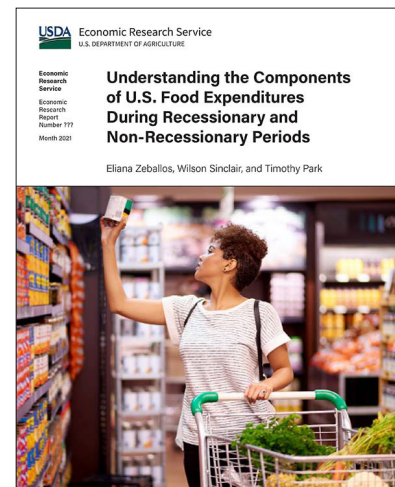
What Is the Issue?

According to the U.S. Department of Agriculture, Economic Research Service's (USDA, ERS) *Food Expenditure Series*, total spending on food and beverages in the United States reached \$1.8 trillion in 2019. This expenditure includes spending at food-at-home (FAH) establishments—grocery stores, supercenters, convenience stores, and other retailers—and food-away-from-home (FAFH) establishments—restaurants, school cafeterias, sports venues, and other eating places. While real per capita total food expenditures increased steadily through the decades, the share of expenditures at FAH establishments decreased from about 53 percent in 1997 to 48 percent in 2019 but then increased to 56 percent in 2020. Previous research has highlighted the roles of rising incomes, lower saving rates, and behavioral changes in U.S. consumer spending. The framework used in this study brings together variations in aggregate income, the propensity to spend versus to save, the propensity to spend on food versus non-food, and the substitution between FAH and FAFH to better understand changes in food spending.

What Did the Study Find?

Prior to 2020, total food expenditures had been increasing for two decades:

- After adjusting for inflation, total food expenditures per capita in 2019 were up 25.2 percent since 1997, rising each year except for the recession years of 2008 and 2009. By contrast, total food expenditures per capita in 2020 were down 8.8 percent compared with 2019.
- Expenditures at FAH establishments and FAFH establishments trended upward from 1997 until 2019.
 - Over this time period, FAH and FAFH expenditures per capita increased by 16.1 percent and 38.4 percent, respectively.
 - The annual share of FAFH expenditures was 51.6 percent in 2019, up from 47.3 percent in 1997.



ERS is a primary source of economic research and analysis from the U.S. Department of Agriculture, providing timely information on economic and policy issues related to agriculture, food, the environment, and rural America.

- Prior to 2020, economic recessions generally had less impact on FAH spending than on FAFH spending, as substitution towards more cost-efficient spending at FAH establishments is common in times of reduced income. During the Great Recession, FAH spending per capita declined by 5.7 percent from 2007 to 2009. FAFH spending declined by 8.2 percent from 2007 to 2009.
- In contrast to prior recessions, the recession caused by the Coronavirus (COVID-19) pandemic resulted from an unprecedented combination of changes related to the pandemic. Not only was this period distinguished by restrictions on mobility and FAFH establishments, but disposable income increased, due in part to increased Government social benefits paid to individuals in 2020 (e.g., unemployment insurance and stimulus payments to households).¹ As a result:¹
 - FAH spending increased by 4.3 percent in 2020. FAFH spending declined by 21.0 percent in 2020.

Results from the structural decomposition reveal the relative contributions of trend components to U.S. food spending changes during non-recessionary periods, as well as during the Great Recession, and the COVID-19 Recession:

- During non-recessionary periods, increased disposable personal income accounted for the largest share of growth in both FAH and FAFH, though the contribution of income was lower after the Great Recession than before. This positive contribution to the growth of FAH spending was partially offset by a shift from spending on FAH to spending on FAFH, as well as by the propensity to spend on food (versus non-food) before the Great Recession.
- During the Great Recession, the decline in disposable personal income contributed to waning FAH and FAFH spending. However, a decline in both the propensity to spend versus save—and in the propensity to spend on food versus non-food—contributed just as much. These components may reflect an inability of households to economize in other parts of the budget, such as rent.
- In contrast, total food expenditures fell, but FAH spending increased during and in the aftermath of the COVID-19 Recession. Although the economy entered a recession, disposable personal income increased (in part due to financial transfers from the Government to households), contributing positively to FAH and FAFH spending. The average decline in the propensity to spend versus save—and the average decline in the propensity to spend on food versus non-food—contributed negatively to FAH and FAFH spending. The substitution towards FAH and away from FAFH decreased FAFH spending dramatically, reflecting the restrictions on mobility and the restrictions on restaurants.

How Was the Study Conducted?

To examine changes in food spending, this study's framework separated food spending into four components: disposable personal income (DPI) (i.e., income effect); personal consumption expenditures (PCE) as a share of DPI (i.e., propensity to spend versus save); total food spending as a share of PCE (i.e., propensity to spend on food versus non-food); and FAH as a share of total food spending (i.e., substitution between FAFH and FAH). Using data from 1997 to 2020, this study compared the contributions of these components of food spending during non-recessionary periods, the Great Recession (December 2007 to June 2009), and the COVID-19 Recession (February to April 2020). This report also used the monthly *Food Expenditure Series (FES)* created by the USDA, Economic Research Service (ERS), which is a unique dataset that measures the value of the U.S. food system over time by month. In addition, this report used aggregate measures of DPI and PCE from the Bureau of Economic Analysis. All variables are seasonally adjusted in constant 2020 prices. Finally, this report used the consumer price index (CPI) for all items to deflate DPI and PCE, CPI for FAH to deflate FAH spending, and CPI for FAFH to deflate FAFH spending.

¹The Coronavirus Aid, Relief, and Economic Security Act (CARES Act) is an economic stimulus bill passed by the 116th U.S. Congress and signed into law on March 27, 2020. The Act came in response to the economic fallout of the COVID-19 pandemic in the United States.