Fiscal Research Center

Tax Incentive Evaluation: Georgia Sales Tax Exemption for Food for Off-Premises Consumption

Peter S. Bluestone Robert D. Buschman Nicholas I. Warner



ANDREW YOUNG SCHOOL FISCAL RESEARCH CENTER

Tax Incentive Evaluation: Georgia Sales Tax Exemption for Food for Off-Premises Consumption

Prepared by:

Georgia State University Fiscal Research Center

For:

Georgia Department of Audits and Accounts

November 2022

Authors: Peter S. Bluestone Robert D. Buschman* Nicholas I. Warner

* Associate director and principal investigator; rbuschman1@gsu.edu

Fiscal Research Center Andrew Young School of Policy Studies Georgia State University 14 Marietta Street NW Atlanta, Georgia 30303

Executive summary

In 1996, Georgia enacted a state sales tax exemption for food for home consumption that applies to most grocery items, exempting them from the state's 4-percent sales tax rate. The state-level exemption does not apply to local sales taxes on groceries. Across the local tax jurisdictions in Georgia, the population-weighted average local sales tax rate is 3.37 percent as of July 1, 2022, according to the Tax Foundation. The purpose of this report is to evaluate the Georgia exemption for purchases of food for off-premises consumption, in accordance with the provisions of O.C.G.A. §28-5-41.1 (2021 Senate Bill 6) in terms of its fiscal and economic impacts as well as its public benefits.

This report was prepared under a contract with the Georgia Department of Audits and Accounts. Program information used in the report was obtained from the Georgia Department of Community Affairs (DCA) and Georgia Department of Revenue (DOR).

The annual tax-expenditure cost to the state for the grocery exemption is estimated at \$838 million for FY 2023. Based on the academic literature, this full amount is estimated to be captured by consumers as additional disposable income. We use the IMPLAN input-output model to estimate the economic activity this additional household disposable income generates for Georgia. From these IMPLAN estimates, we project the amount of state and local revenue gains from this increased economic activity, by state fiscal year (FY) as shown in the first row of Tables ES1 and ES2, respectively.

As a result of this sales tax exemption, the state's general fund expenditures are implicitly reduced by the amount of the tax expenditure. An alternative use of the funds, in the absence of the exemption, is modeled assuming an increase in state spending by that amount, allocated across the various spending categories based on recent state budgets. Tables ES1 and ES2 show the estimated amount of state and local revenue from this alternative use of funds, the opportunity cost of the exemption. The net fiscal cost to the state, accounting for revenue gains from induced economic activity as well as the tax expenditure and opportunity costs, is estimated at \$860 million for FY 2023. Table ES2 shows the net local revenue effects on the same basis.

Tuble Lori Grocery Exemption State Tiscar Effects						
(\$ millions)	FY 2023	FY 2024	FY 2025	FY 2026	FY 2027	
Revenue gains from economic impact	\$28.9	\$31.4	\$32.9	\$34.1	\$35.4	
Less:						
Tax expenditure cost	(\$838.4)	(\$911.1)	(\$953.9)	(\$988.2)	(\$1,025.8)	
Alternative use revenue gains	(\$53.96)	(\$58.64)	(\$61.40)	(\$63.61)	(\$66.03)	
Net Fiscal Effects	(\$863.4)	(\$938.3)	(\$982.4)	(\$1,017.7)	(\$1,056.4)	

Table ES1. Grocery Exemption State Fiscal Effects

Table ES2. Grocery Exemption Local Fiscal Effects

(\$ millions)	FY 2023	FY 2024	FY 2025	FY 2026	FY 2027
Revenue gains from economic impact	\$27.9	\$30.3	\$31.7	\$32.8	\$34.1
Less:					
Alternative use revenue gains	(\$20.3)	(\$22.0)	(\$23.1)	(\$23.9)	(\$24.8)
Net Fiscal Effects	\$7.6	\$8.2	\$8.6	\$8.9	\$9.3

The grocery tax exemption has several public benefits. First, it helps lower-income households meet their basic food needs. Second, it reduces the regressivity of the sales tax, which is generally more burdensome on lower-income households that spend a greater share of their income on groceries than higher-income households. For instance, households with less than \$15,000 in annual income spend on average 41 percent of this income on groceries. Comparatively, those making more than \$200,000 annually spend, on average, about 2 percent of this income on groceries.

As is shown in Table ES1 the cost of the grocery tax exemption far exceeds the benefits to the state in terms of tax revenue generated. However, unlike other tax preferences targeting economic growth, providing a positive future net revenue effect is not a presumed intent of the grocery exemption. The citizens of the state clearly benefit from the exemption through the tax savings on groceries, as was the originally stated intent of the exemption. In addition, the exemption helps to alleviate some of the regressivity of the sales tax. Thus, the exemption helps to improve the equity of the state tax structure and improve the economic outlook for lower-income Georgians.

Contents

1.	Introduction	1
2.	Georgia's Grocery Sales Tax Exemption – History and Overview	1
3.	Tax Expenditure Estimates and Distribution of Direct Costs and Benefits	2
	Tax expenditure costs and distribution across local governments	2
	Distribution of benefits to consumer households	4
4.	Other States' Grocery Tax Exemptions	5
5.	Literature Review: Economic Effects of Grocery Taxes and Exemptions	6
	Incidence of a tax on food	6
	Grocery taxes and food insecurity	7
	Economic impact study of a state grocery tax	7
6.	IMPLAN Economic Impact Analysis	7
	Model Overview	8
	Economic Impact Induced Effects	9
	Alternative-Use Economic Impacts	9
7.	Fiscal Impacts 1	0
	Foregone revenue1	0
	Revenue effects of induced economic impact 1	0
	Alterative-Use Annual State and Local Tax Revenue 1	2
	Administrative Costs 1	2
8.	Conclusion 1	2
Re	ferences1	4
Aţ	ppendix A: State Sales Tax Rates and Food & Drug Exemptions 1	6
Aŗ	ppendix B: Value of Alternative Use – IMPLAN Code Table 1	7

1. Introduction

In 1996, Georgia enacted a state sales tax exemption of food for off-premises consumption that applies to most grocery items, exempting them from the state's 4-percent sales tax rate. The purpose of this report is to evaluate the Georgia exemption for purchases of food for off-premises consumption, in accordance with the provisions of O.C.G.A. § 28-5-41.1 (2021 Senate Bill 6), in terms of its fiscal and economic impacts as well as its public benefits.

This report was prepared under a contract with the Georgia Department of Audits and Accounts (GDAA) and relied on their assistance in obtaining estimates of the program's administrative costs. Program information used in the report was obtained from the Georgia Department of Community Affairs (DCA) and Georgia Department of Revenue (DOR). The report begins with background on the Georgia grocery exemption, followed by a discussion of other state programs, a review of the literature, an IMPLAN analysis of economic and fiscal impacts of the exemption, estimates of the tax expenditure and administrative costs, and an analysis of the public benefits of the program in terms of its presumed goal of improving food affordability in Georgia.

2. Georgia's Grocery Sales Tax Exemption – History and Overview

Georgia's enactment of House Bill 265 in the first week of the 1996 legislative session phased in a state sales tax exemption on food purchased for off-premises consumption, reducing the applicable tax rate to 2 percent effective October 1, 1996, to 1 percent a year later, and to zero beginning October 1, 1998.

Although the exemption applies to most food for off-premises consumption, it does not apply to restaurant meals nor to retail sales of alcoholic beverages, tobacco, immediate consumption items (i.e., prepared foods or meals), vitamins, or minerals. The exemption also does not apply to items used primarily for medical or hygiene purposes (Georgia Tax Expenditure Report for FY 2023).

The state-level exemption does not prohibit municipalities from levying sales tax on groceries. Across the local tax jurisdictions in Georgia, the population-weighted average local sales tax rate is 3.37 percent as of July 1, 2022, according to the Tax Foundation. There is no federal-level sales tax, however, so this exemption has no interaction with federal laws or credits.

The passage of a grocery tax exemption was motivated, according to then-governor Zell Miller, by a desire to provide tax relief to all Georgia families on the purchase of a necessity, food. As he said upon signing the bill, "If you eat, you win" (Foskett, 1996). Sales taxes are also regressive by nature, as they are more burdensome on lower-income households that spend a greater share of their income on goods that are subject to the tax than higher-income households. Thus, a sales tax exemption on groceries helps to make the state sales tax less regressive.

3. Tax Expenditure Estimates and Distribution of Direct Costs and Benefits

Tax expenditure costs and distribution across local governments

The tax expenditure cost of the grocery exemption was estimated for the forthcoming Georgia Tax Expenditure Report for FY 2024 as shown in Figure 1 below, 2019-22 representing estimated historical costs and 2023-27 Fiscal Research Center projections. These costs are understood in terms of forgone state sales tax revenue, meaning the state sales tax base, absent this exemption, would apply to these sales of grocery items and would be expected to generate tax in the amounts shown. It should be noted that federal benefit programs that involve grocery items such as SNAP and WIC are exempt from both state and local taxes, regardless of the state grocery exemption; these benefits are thus not included in the tax expenditure estimate.

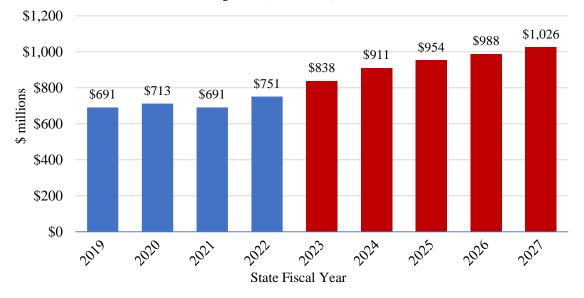
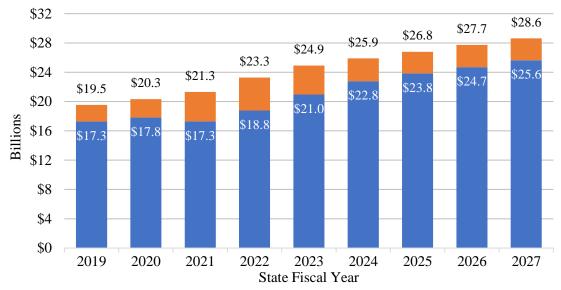
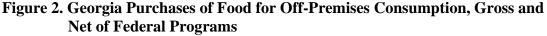


Figure 1. Estimated State Tax Expenditure for Exemption of Food Purchased for Off-Premises Consumption (\$ millions)

These tax expenditure estimates are based on data from the Weekly Retail Food Sales series published by U.S. Department of Agriculture (USDA), which reports sales by state and product category, enabling a reliable estimate of the sales that would be taxable absent this or the federal program exemptions. This otherwise-taxable base is estimated as shown in Figure 2, projected through FY 2027. Growth in FY 2023 is assumed at the 7 percent average rate of the prior two years, in part reflecting recent high rates of inflation. For FY 2024-27, assumed growth is based on consensus CPI inflation forecasts from the Philadelphia Federal Reserve Bank's Fourth Quarter 2022 Survey of Professional Forecasters and state population growth forecasts from the Governor's Office of Planning and Budget (OPB).

This base is reduced by estimates of SNAP and WIC purchases, which are based on USDA statelevel reporting of actual spending on these programs through state FY 2022 and projected through FY 2027 based on recent trends and Congressional Budget Office projections. The combined amount of estimated SNAP and WIC purchases are also reflected in Figure 2, the difference representing estimated amounts of food purchases exempted by O.C.G.A. §48-8-3(57).





The local tax expenditure costs of the grocery exemption are distributed across Georgia counties based on where consumers make exempt purchases. The map in Figure 3 shows the amount spent on groceries in Georgia at the county level. To allocate grocery spending to counties, we relied on a novel source of data that tracks grocery store visits and length of time spent at the store by using cell phone data from the company SafeGraph. Trips of longer duration to a grocery store suggest greater spending. Grocery spending is allocated to counties based on the counties share of total Georgia store visit time. As would be expected, the most populous urban counties have the greatest amount of spending.

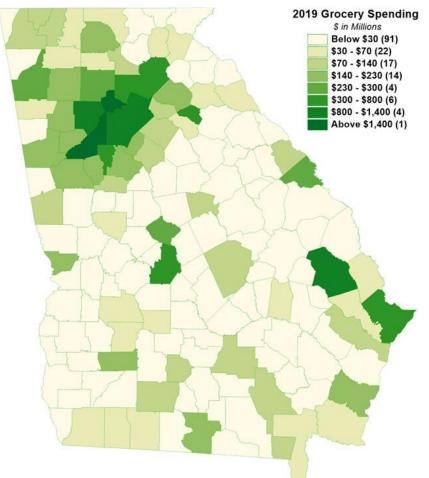


Figure 3. 2019 Grocery Spending by Georgia County

Source: Consumer Expenditure Survey and SafeGraph data

Distribution of benefits to consumer households

The Georgia grocery exemption lowers the price of staple food items by 4 percent, making the cost for Georgians to feed themselves and their dependents more affordable. As covered in the economic impact section below, these savings allow for more consumption of other goods and services because food becomes less expensive. This additional consumption becomes spending that grows Georgia's economy.

The distribution of these benefits across households has the effect of making Georgia's sales tax less regressive. Taxes on consumption with a flat rate, particularly when charged on inelastic or sustaining products like food, are regressive taxes because, in practice, lower income individuals and households pay a higher percentage of their income in sales taxes on groceries. By contrast, progressive income taxes are designed specifically to charge higher rates as individuals and households earn more income. In this framework, individuals and households with more income pay higher percentages of their income in income taxes. Sales taxes on food are functionally regressive because spending on food is similar at all income levels. Sales tax exemptions on food, therefore, create more progressivity in an otherwise regressive tax (Miller, 1951). Consumer expenditure data from the Bureau of Labor Statistics (BLS) helps to illustrate this point. Table 1 details the results from the consumer expenditure survey for 2020 for average food for off-premises consumption expenditures for southeastern U.S. consumer units, broken down by income. We show that lower-income households spent higher percentages of their income on this consumption compared to higher income households.

Income	Mean Income Before Taxes	Mean Annual Expenditure on Food*	Exempted 4% Sales Tax	Exempted Tax/Income
Less than \$15k	\$7,203	\$2,992	\$119.7	1.66%
\$15k to \$29.9k	\$22,192	\$2,805	\$112.2	0.51%
\$30k to \$39.9k	\$34,715	\$3,520	\$140.8	0.41%
\$40k to \$49.9k	\$44,691	\$4,160	\$166.4	0.37%
\$50k to \$69.9k	\$59,466	\$3,941	\$157.6	0.27%
\$70k to \$99.9k	\$83,669	\$4,721	\$188.8	0.23%
\$100k to \$149.9k	\$120,865	\$5,610	\$224.4	0.19%
\$150k to \$199.9k	\$171,164	\$6,129	\$245.2	0.14%
More than \$200k	\$363,725	\$7,839	\$313.6	0.09%
All SE Consumer Units	\$78,716	\$4,313	\$172.5	0.22%

Table 1. Consumer Expenditures on Food, Exempted Tax, and Implied Effective Tax Rate	
by Income for Southeastern U.S. Consumers, 2020	

* Food for at-home consumption only

Comparing the amount of state sales taxes that would be charged on food purchases to income levels shows the progressivity of the exemption (and the regressivity of the sales taxes on food). Households having less than \$15,000 in annual income spent \$2,992 on food for at-home consumption, representing about 41 percent of their annual income. A 4-percent tax on that consumption would represent 1.66 percent of their annual income. Comparatively, a 4-percent tax on food for at-home consumption would represent 0.09 percent of the annual income of those making more than \$200,000 annually.

4. Other States' Grocery Tax Exemptions

In the United States as of 2022, 32 states plus the District of Columbia exempt groceries from state-level sales tax and all but three of the 32 states from local sales tax as well. Six other states have a reduced rate for groceries (Federation of Tax Administrators, 2022). States vary in their definition of what constitutes an exempt grocery item. For example, due to the perceived lack of nutritional value, many states that exempt grocery items continue to tax candy and soda (Loughead, 2018). Excluding certain food items from the exemption makes the tax code more complicated and accounts for many of the differences in food exemption policies between states. Table 2 below summarizes how Georgia's neighboring states treat groceries, soda, and candy in the context of this sales tax (Fritts, 2020). A more detailed table is available in the appendix.

State	State general sales tax	Grocery treatment	Local grocery taxes?	Candy counted as groceries?	Soda counted as groceries?
Georgia	4%	Exempt	Yes	Yes	Yes
Alabama	4%	Not Exempt	Yes	Yes	Yes
Florida	6%	Exempt	No	No	No
North Carolina	4.75%	Exempt	2% uniform rate	No	No
South Carolina	6%	Exempt	No	Yes	Yes
Tennessee	7%	4%	Yes	Yes	Yes

Table 2. Sales Tax Treatment of Groceries in Southeastern States

Sources: Federation of Tax Administrators (2022), Fritts (2019), and state revenue departments.

5. Literature Review: Economic Effects of Grocery Taxes and Exemptions

Incidence of a tax on food

Tax incidence is an economic term indicating who ultimately pays a tax. The is relevant for the sales tax exemption on groceries because the incidence of sales tax on food affects who benefits from the exemption. If producers, wholesalers, or retailers were charging higher pretax prices in the presence of the exemption than would be expected without it, households would not be experiencing the full benefit of the exemption. We thus review here the tax incidence literature's findings in this regard.

Economic theory differentiates between the statutory and economic incidence of a tax. The statutory incidence falls on those legally responsible to pay the tax, in this case the businesses remitting the tax to the state. However, depending on the price elasticity of demand for the taxed goods, and the market structure and pricing power of sellers of the goods, the final burden of the tax – the economic incidence – may be shifted to consumers in the form of higher prices (Minnesota DOR). According to Zhao et al, (2022), "Standard welfare theory shows that the tax incidence between consumers and retailers under perfect competition depends on the relative price elasticities of demand and supply with whichever party is less price responsive bearing more of the tax burden (Harberger, 1962). In some instances, tax burdens may even be overshifted, i.e., the retail tax-inclusive price rises by more than the amount of the tax.

Zhao et al. (2022) analyzed Nielsen Homescan data and found that food retailers significantly over-shift grocery tax burdens onto consumers, who are subject to a price increase by more than the amount of the tax. Furthermore, the results showed no relationship between the grocery food tax and the average earnings of grocery store workers within a county, suggesting that revenue increases from tax over-shifting accrues to grocery retailers rather than their workers. This study also indicates the degree of over-shifting is associated with the type of retailer. Discount stores (e.g., Wal-Mart, Target), warehouse clubs (e.g., Sam's Club, BJ's), and Dollar Stores all have a significantly higher degree of over-shifting than the regular grocery stores. Unsurprisingly, products such as milk and eggs, which have relatively inelastic demand compared to other food items, have the highest degree of over-shifting.

Grocery taxes and food insecurity

A 2016 empirical study by Wilson et al. on the relationship between grocery taxes and food insecurity found a strong, positive relationship between grocery taxes and levels of food insecurity. More specifically it showed that a 1-percentage point increase in the grocery tax increases the probability of households experiencing food insecurity by 0.60 percent. Importantly, no significant relationship was found for SNAP households. This model provides empirical evidence that taxes on food increase the likelihood of food insecurity for non-SNAP households. SNAP reduces food insecurity by offering direct benefits and also indirectly by exempting these benefits from taxation. (See also Gibson-Davis and Foster, 2006; Gregory and Coleman-Jensen, 2013; Gundersen and Kreider, 2008; Gundersen et al., 2011; Ratcliffe et al., 2011; Yen et al., 2012.)

Zhao et al. (2021) analyzed the connection between grocery taxes and participation in SNAP, concluding that grocery taxes have a significant and positive impact on SNAP participation. Specifically, they found that counties in states that raise the grocery taxes by 1 percentage point will see an increase of SNAP participation rate of 7.3 percent relative to their cross-border neighbors. The authors suggest two major implications of their findings. First, when local governments impose grocery taxes, a tradeoff appears between local tax revenue and federal subsidies. For instance, taxes on groceries generate revenue for local governments, but the increased overall price creates an incentive for greater participation in SNAP, which imposes additional costs to the federal government. The second implication is that participation in SNAP can reduce the regressivity of grocery taxes by shielding the lowest income households from paying them.

Economic impact study of a state grocery tax

Another key study, Myles et al. (2008), used an economic impact model to assess the effects of repealing the Mississippi grocery tax in 2008. Their model indicated repealing or reducing the grocery tax would create an income effect by raising the purchasing power of all residents. The authors estimate 5–10 percent of the savings would be spent on additional food consumption, with the remainder going to other purchases. This leads the authors to conclude that increases in grocery sales would generate small retail employment gains, while sales of other goods and services would generate significant gains in employment, income, and other sales in Mississippi. However, with the state losing \$202 million in foregone tax revenue, it was not clear if the employment gains would fully offset revenue losses. The authors also note that because low-income households spend a larger portion of their food budget on groceries, the bulk of the tax savings from exempting groceries would flow to this group.

6. IMPLAN Economic Impact Analysis

In this section, we model the economic activity associated with additional disposable household income provided by the tax exemption on groceries. Note that this economic activity is only shown as an induced economic impact, as the additional funds flow into the economy through household income rather than firms. Results reported here include estimates of employment, wages, value added, and total output associated with the induced economic impact. In addition, as explained further below, we use these economic impact estimates to produce estimates of tax

revenue impacts at the state and local levels from this additional household income. All of the benefits of the exemption are deemed to flow to the consumer, and thus, the benefits modeled here are all deemed to flow directly from the full amount of the tax expenditure. The full IMPLAN model is discussed below to explain why only induced effects are used.

Model Overview

To estimate the economic impact of the grocery exemption in Georgia, we use IMPLAN, a regional input-output model that is widely used for economic impact analysis. IMPLAN estimates how an initial change in spending or revenue for any industry category works its way through a regional economy, using data on input-output relationships between any industry and its suppliers and customers within or outside the given region—in this case, the state of Georgia. IMPLAN also has data on the size of each industry in the economy in terms of revenue and employment at the state and county levels. The model uses sector multipliers to estimate the impact of the initial spending by firms on suppliers of goods and services to the sectors of interest, or on labor. This analysis uses IMPLAN model data for the year 2019, adjusted forward to represent average annual revenues and wages in 2021 dollars. Below is a discussion of the relevant IMPLAN terms used in the report.

Direct effects are the changes that initiate the ripple effects through the economy. For purposes of this analysis, direct effects are increased firm output (revenue) directly attributable to the exemption.

Indirect effects are the economic activity supported by business-to-business purchases in the supply chain for grocery store activity. For example, a grocery store purchases inventory from a wholesaler. Each of the supplying businesses subsequently spends a portion of the money they receive on their own production inputs, which in turn prompts spending by the suppliers of these inputs. This spending continues but progressively diminishes in its in-state impacts due to "leakages," which occur when firms spend money on imports (including imports from other states), taxes, and profits.

Induced effects are economic activity that occurs from households spending labor income earned from the direct and indirect activities. This activity results from household purchases on consumption items such as food, housing, healthcare, and entertainment. The labor income spent to generate these effects does not include taxes, savings, or compensation of nonresidents (commuters) as these leave the local economy (leakage).

Output is the value of production. This includes the value of all final goods and services, as well as all intermediate goods and services used to produce them. IMPLAN measures output as annual firm-level revenues or sales, assuming firms hold no inventory. Estimates of output changes resulting from the additional economic activity are then used to estimate state and local sales tax revenue.

We also report *value added*, which measures the contribution to state gross domestic product (GDP).

Labor income includes total compensation—wages, benefits, and payroll taxes—for both employees and self-employed individuals. Wage-gain estimates are used to estimate incremental state income tax revenue.

Employment includes full-time, part-time, and temporary jobs, including the self-employed. Job numbers do not represent full-time equivalents, so one individual may hold multiple jobs.

Economic Impact Induced Effects

Table 3 reports the IMPLAN estimates of direct, indirect, and induced impacts for the additional household income provided by the grocery exemption of \$691 million, as estimated for FY 2021. Note again that the direct and indirect impacts are zero, as the additional funds initially flow from household spending. Real economic impacts in future years would be projected to grow from these levels with the amount of the tax expenditure, based on population and income growth, with nominal dollar measures further dependent on inflation.

Impact Type	Employment	Labor Income	Value Added	Output
Direct Effect	0	0	0	0
Indirect Effect	0	0	0	0
Induced Effect	5,119	\$245,505,191	\$471,811,537	\$806,518,253
Total Effect	5,119	\$245,505,191	\$471,811,537	\$806,518,253
	1 .1 . 1 1			

Table 3. Tax Exemption Economic Impact IMPLAN Results

Source: IMPLAN and authors' calculations

Alternative-Use Economic Impacts

The induced economic impacts estimated above do not account for the opportunity costs of the forgone state revenues, i.e., the economic impacts of alternative uses of the funds currently expended through the tax exemption. SB 6 requires evaluations of tax incentives to include estimates of *net* economic and fiscal impacts, thus requiring consideration of the economic and revenue effects of alternative uses of the revenues that would be available for other purposes in the absence of the exemption.

Alternatives could include other economic incentives, spending on other policy areas across state government, or a reduction in taxes that could also result in direct, indirect, and induced economic effects. However, absent information as to how the General Assembly would otherwise choose to spend foregone revenue if not on the grocery exemption, we estimate the impact of using the revenue to fund an equivalent increase in state government spending in proportion to existing expenditures. That is, we allocated the foregone revenue to industry sectors as direct effects based on the sector shares of spending in the state budget. The two largest categories of spending—education (53 percent) and healthcare (21 percent)—account for about 75 percent of the state budget. See the Appendix B for more detail on the shares allocated to different government services and the IMPLAN industry codes most closely corresponding to the service categories.

As shown in Table 4 below, if the state received the forgone revenue associated with groceries and spent the money, it could be expected to generate approximately \$1.5 billion in output annually. This estimate includes \$691 million in annual direct government outlays, the FY 2021 estimated tax expenditure for the exemption, plus the amounts shown for indirect and induced effects resulting from the initial, direct outlays.

Table 4. Alternative-Ose Debionne Activity							
Impact Type	Employment	Labor Income	Value Added	Output			
Direct Effect	13,823	\$527,775,374	\$492,689,601	\$691,369,811			
Indirect Effect	1,290	\$66,521,655	\$113,219,918	\$218,922,294			
Induced Effect	3,464	\$166,678,339	\$316,854,359	\$542,479,103			
Total Effect	18,577	\$760,975,368	\$922,763,877	\$1,452,771,207			

Table 4. Alternative-Use Economic Activity

Source: IMPLAN and authors' calculations

Comparisons between grocery exemption and alternative use economic impacts should be made cautiously as the grocery exemption offers other public benefits, including economic aid to lower-income households and a reduction of the regressivity of the state sales tax.

7. Fiscal Impacts

A summary of the fiscal impacts of the grocery exemption is presented in Table 5 below. Following Table 5, we detail the estimates of the positive revenue effects arising from the induced economic impacts and of the opportunity cost of the tax expenditure, the revenues that could be expected from the alternate use of funds. Administrative costs are also discussed.

Table 5. Grocery Exemption State and Local Fiscal Effects

(\$ millions)	FY 2023	FY 2024	FY 2025	FY 2026	FY 2027
Tax expenditure cost					
State	(\$838.4)	(\$911.1)	(\$953.9)	(\$988.2)	(\$1,025.8)
Revenue gains from economic impact					
State	\$28.9	\$31.4	\$32.9	\$34.1	\$35.4
Local	\$27.9	\$30.3	\$31.7	\$32.8	\$34.1
Alternative use reduction					
State	(\$54.0)	(\$58.6)	(\$61.4)	(\$63.6)	(\$66.0)
Local	(\$20.3)	(\$22.0)	(\$23.1)	(\$23.9)	(\$24.8)
Net fiscal effects					
State	(\$863.4)	(\$938.3)	(\$982.4)	(\$1,017.7)	(\$1,056.4)
Local	\$7.6	\$8.2	\$8.6	\$8.9	\$9.3
Total net fiscal effects	(\$855.9)	(\$930.1)	(\$973.8)	(\$1,008.8)	(\$1,047.2)

Foregone revenue

Foregone revenues from the grocery exemption are the estimated tax expenditures presented in Section 3 above and shown in Table 5.

Revenue effects of induced economic impact

Table 6 shows estimates for state and local tax revenues attributable to economic activity associated with the grocery exemption for the FY 2021 base year. State income tax is estimated using employee compensation generated by IMPLAN. The labor income estimated in the broader consumer-facing economy is comprised mostly of service workers, where the average labor income is approximately \$48,000 per job. Based on Georgia DOR tax data, specifically net tax liability relative to adjusted gross income (AGI) for taxpayers with AGI of \$48-85 thousand in tax year (TY) 2020, we assume an average effective tax rate (AETR) under current law of 3.84 percent on labor income estimated above. Resulting income tax revenues are estimated at about \$9.4 million for FY 2021.

IMPLAN reports estimates of sales tax and property tax. However, the model relies on levels of economic activity rather than sales or property tax rates and tax bases. Thus, they are not our preferred estimates. To estimate sales tax revenues, we use the model's estimated incremental output for the various retail sectors and adjust for the taxable portion of sector sales to arrive at estimates of taxable sales. For retail sectors, IMPLAN reports as output only the retail gross margin, not the total sales at retail, so these estimates are grossed up using average gross margin rates from IMPLAN for each retail sector to arrive at estimated sales to which the tax would be applied. The state sales tax is calculated using the state sales tax rate of 4 percent and the local sales tax is calculated using an average local sales tax rate of 3.37 percent, the population-weighted average as of July 2022, according to the Tax Foundation. The state and local sales tax estimates for the base year are also shown in Table 6.

To estimate the additional property tax due to the economic activity associated with the tax exemption, we calculate the ratio of the IMPLAN's estimate of sales tax to our preferred estimate of sales tax above and apply this to IMPLAN's estimate of property tax revenue. This estimate assumes that economic activity that generates IMPLAN's sales tax estimates is like that which generates the property tax, thus this estimate should be treated cautiously.

Finally, about 78 percent of Georgia state tax collections are from personal income and state sales taxes. Georgia collects a host of other taxes that make up the remaining 22 percent, on average. Two taxes make up about half of the 22 percent: corporate income tax and title ad valorem tax (TAVT) on motor vehicles. Table 6 shows the base year estimated revenue from these other taxes assuming a proportional effect such that the 22 percent of total tax revenues hold for the economic activity resulting from the grocery exemption.

Table 0. State and Local Tax Revenues from Grocery Exemption induced Effects, F1 2021				
(\$ in Millions)	State tax	Local Tax		
GA income tax estimate	\$9.4			
Sales tax estimates	\$9.5	\$8.0		
Property tax estimates		\$15.0		
All other taxes (estimated at 22% of total GA tax)	\$5.2			
Total state and local tax estimates	\$23.9	\$23.0		

Table 6. State and Local Tax Revenues from Grocery Exemption Induced Effects, FY 2021

Alterative-Use Annual State and Local Tax Revenue

New tax revenues resulting from the alternate use case are estimated in an equivalent manner as the grocery exemption in the earlier section and are shown in Table 7.

Table 7. Alterative-Use State and Local Tax Revenue, FY 2021					
State Tax	Local Tax				
\$29.2					
\$6.4	\$6.1				
	\$10.7				
\$8.9					
\$44.5	\$16.7				
	State Tax \$29.2 \$6.4 \$8.9				

Table 7. Alterative-Use State and Local	l Tax Revenue, FY 2021
---	------------------------

Base year revenue effects, induced or alternative use, are projected forward in the same manner as the estimated tax expenditure upon which they are based and shown in Table 5.

Administrative Costs

The Georgia DOR is responsible for administering the grocery exemptions claimed on businesses' sales tax returns and reported negligible administrative costs to administer this exemption. Businesses report taxable and exempt sales separately on their ST-3 sales tax return. Exempt sales are reported as a category, unless otherwise required by law, so there is no additional administrative cost associated with any specific exemption that is included in the reported exempt sales. Additional costs could be associated with auditing this specific exemption, but the Department of Audits has no record of an audit of this specific exemption in the past.

8. Conclusion

In 1996, Georgia enacted a state sales tax exemption on purchases of food for off-premises consumption that applies to most grocery items, exempting them from the state's 4-percent sales tax rate. The purpose of this report is to evaluate this Georgia grocery exemption, in accordance with the provisions of O.C.G.A. §28-5-41.1 (2021 Senate Bill 6), in terms of its fiscal and economic impacts as well as its public benefits.

The annual tax expenditure cost to the state for the grocery exemption is estimated at approximately \$691 million for FY 2021, but assuming based on the academic literature that the tax benefits are captured by consumers as additional household income, we would expect positive economic effects and revenue gains from the resulting household consumption increases, as presented in Sections 6 and 7 above.

If the state did not offer this sales tax exemption, it would have the \$691 million to spend in other ways. An alternative use of the funds is modeled based on the General Assembly's current allocation of revenue to various spending categories. Economic and fiscal effects under this alternative use scenario are also presented above.

However, net fiscal effects are not the best basis for evaluating the performance of a tax preference the original intent of which was broad public benefit in the form of tax relief to households on spending for a necessity. The grocery tax exemption clearly helps households afford food as academic research shows that the tax savings are realized by consumers in lower after-tax prices for food and not shifted to retailers or producers. In addition, the benefits have the effect of reducing the regressivity of the sales tax because lower-income households spend a greater share of their income on groceries than higher-income households.

References

Federation of Tax Administrators. 2022. "State Sales Tax Rates and Food & Drug Exemptions." Retrieved from: <u>https://www.taxadmin.org/assets/docs/Research/Rates/sales.pdf</u>

Fritts, J. 2019. "How Are Groceries, candy, and soda taxed in your state?" Tax Foundation. Retrieved from: <u>https://taxfoundation.org/grocery-tax-candy-tax-soda-tax-2019/</u>

Foskett, Ken. 1996. "Miller savors food tax cut." *Atlanta Journal-Constitution*, January 12, 1996, p. A1.

Georgia: Sales Tax Handbook. Sales Tax Handbook. (n.d.). Retrieved July 1, 2022, from <u>https://www.salestaxhandbook.com/georgia</u>

Georgia Tax Expenditure Report for FY 2023. 2021. Fiscal Research Center, Georgia State University. Retrieved from: <u>https://frc.gsu.edu/files/2022/01/State-of-Georgia-FY-2023-Tax-Expenditure-Report.pdf</u>

Gibson-Davis, C.M., Foster, E.M. 2006. "A Cautionary Tale: Using Propensity Scores to Estimate the Effect of Food Stamps on Food Insecurity." *Soc. Serv. Rev.* 80: 93–126.

Gregory, C.A., Coleman-Jensen, A. 2013. "Do High Food Prices Increase Food Insecurity in the United States?" *Applied Economic Perspectives and Policy* 35: 679–707.

Gundersen, C., Kreider, B. 2008. "Food Stamps and Food Insecurity: What Can Be Learned in the Presence of Nonclassical Measurement Error?" *J. Hum. Resour.* 43: 352–382.

Harberger, Arnold, 1962. "The Incidence of the Corporate Income Tax." *Journal of Political Economy* 70(3): 215–240.

Loughead, Katherine. 2018. "Sales taxes on soda, candy, and other groceries, 2018." Tax Foundation. Retrieved from: <u>https://files.taxfoundation.org/20180706104150/Tax-Foundation-FF598-Groceries-Soda-Candy.pdf</u>

Miller, Donald C. 1951. "Sales-tax progressivity attributable to a food exemption." *National Tax Journal* 4.2: 148–159.

Minnesota Department of Revenue. 2021. "Minnesota Tax Incidence Study: An Analysis of Minnesota's Household and Business Taxes." Retrieved from: https://www.revenue.state.mn.us/tax-incidence-studies

Myles, Albert E., Albert J. Allen, and Saleem Shaik. 2008. "The Economic Impact of Repealing Mississippi's Grocery Tax." No. 1368-2016-108451.

Ratcliffe, C., McKernan, S.-M., Zhang, S. 2011. "How Much Does the Supplemental Nutrition Assistance Program Reduce Food Insecurity?" *Am. J. Ag. Econ.* 93: 1082–1098.

Wilson, Norbert LW, Yuqing Zheng, Shaheer Burney, and Harry M. Kaiser. 2016. "Do Grocery Food Sales Taxes Cause Food Insecurity?" No. 333-2016-14464.

Yen, S.T., Bruce, D.J., Jahns, L., 2012. "Supplemental Nutrition Assistance Program Participation and Health: Evidence from Low-Income Individuals in Tennessee." *Contemporary Economic Policy* 30: 1–12.

Young, Douglas J., and Agnieszka Bielinska-Kwapisz. 2002. "Alcohol Taxes and Beverage Prices." *National Tax Journal* 55(1): 57–73.

Zhao, Jianqiang, Yuqing Zheng, and Harry M. Kaiser. 2022. "The Pass-through of Sales Taxes on Groceries: Evidence from Nielsen Homescan Data." 2022 Agricultural & Applied Economics Association Annual Meeting presentation paper, retrieved from: https://ageconsearch.umn.edu/record/322140/

Zhao, J. J., Kaiser, H. M., & Zheng, Y. 2021. "Do grocery food taxes incentivize participation in snap?" *Regional Science and Urban Economics* 95

(as of January 1, 2022)		EXEMPTIONS		
			Prescription	Nonprescription
STATE	Tax Rate (%)	Food (1)	Drugs	Drugs
ALABAMA	4		*	
ALASKA	none			
ARIZONA	5.6	*	*	
ARKANSAS	6.5	0.125% (4)	*	
CALIFORNIA (3)	7.25	*	*	
COLORADO	2.9	*	*	
CONNECTICUT	6.35	*	*	
DELAWARE	none			
FLORIDA	6	*	*	*
GEORGIA	4	* (4)	*	
HAWAII	4	(1)	*	
IDAHO	6		*	
ILLINOIS	6.25	1%	1%	1%
INDIANA	7	*	*	170
IOWA	6	*	*	
KANSAS	6.5		*	
KENTUCKY	6	*	*	
LOUISIANA	4.45	* (4)	*	
MAINE	5.5	(+)	*	
MARYLAND	5.5	*	*	*
MASSACHUSETTS	6.25	*	*	
MASSACHUSETTS	6	*	*	
	6.875	*	*	*
MINNESOTA			*	
MISSISSIPPI	7	1 2250/ (4)	*	
MISSOURI	4.225	1.225% (4)		
MONTANA	none	 *	 *	
NEBRASKA	5.5	*	*	
NEVADA	6.85			
NEW HAMPSHIRE	none	 *	 *	
NEW JERSEY	6.625			*
NEW MEXICO	5.125	*	*	
NEW YORK	4	*	*	*
NORTH CAROLINA	4.75	* (4)	*	
NORTH DAKOTA	5	*	*	
OHIO	5.75	*	*	
OKLAHOMA	4.5			
OREGON	none	 *		 st
PENNSYLVANIA	6	*	*	*
RHODE ISLAND	7	*	*	
SOUTH CAROLINA	6	*	*	
SOUTH DAKOTA	4.5		*	
TENNESSEE	7	4% (4)	*	
TEXAS	6.25	*	*	*
UTAH	6.1 (5)	3.0% (5)	*	
VERMONT	6	*	*	*
VIRGINIA	5.3 (2)	2.5% (2)	*	*
WASHINGTON	6.5	*	*	
WEST VIRGINIA	6	*	*	
WISCONSIN	5	*	*	
WYOMING	4	*	*	
DIST. OF COLUMBIA	6	*	*	*

Appendix A: State Sales Tax Rates and Food & Drug Exemptions

DIST. OF COLUMBIA

* -- indicates exempt from tax, blank indicates subject to general sales tax rate.

(1) Some states tax food but allow a rebate or income tax credit to compensate poor households. They are HI, ID, KS, OK, and SD.

(2) Includes statewide 1.0% tax levied by local governments in Virginia.

(3) Tax rate may be adjusted annually according to a formula based on balances in the unappropriated general fund and the school foundation fund.

(4) Food sales subject to local taxes.

(5) Includes a statewide 1.25% tax levied by local governments in Utah.

Source: Federation of Tax Administrators (2022); compiled by FTA from various sources.

Appendix B: Value of Alternative Use – IMPLAN Code Table

Table B1 shows the approximate breakdown of state expenditures into functional areas that either directly correspond or are similar to the specified IMPLAN sectors in terms of the nature of labor and other inputs.

		-	
Category	Share state spending	IMPLAN codes	IMPLAN Sector Descriptions
Education, PK-12	41.6%	480	Elementary and secondary schools
Education, Post-Sec	15.0%	481	Post-secondary education
Health Care	22.5%	493	Individual and family services
Public Safety, excl Corrections	3.5%	471	Facilities support services
Public Safety, Corrections	4.6%	475	Investigation and security services
Mobile Georgia	7.7%	457	Architectural, engineering, related services
Growing Georgia	1.5%	469	Management of companies and enterprises
General Government	3.6%	469	Management of companies and enterprises
	EV 0010 1 E	V 2020 C	

Table B1. Approximate Distribution of State Expenditures

Source: Spending shares based on AFY 2019 and FY 2020 Governor's Budget Report, https://opb.georgia.gov/budget-information/budget-documents/governors-budget-reports