



Recommendations to Promote Healthy Retail Food Environments

Key Federal Policy Opportunities for the Farm Bill

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I. Executive Summary

The retail food environment, both in-store and online, is an important driver of dietary choices and dietary quality. Diet quality in the United States (US) is low and contributes to high rates of diet-related chronic health conditions. Inequitable access to healthy food environments and unequal exposure to unhealthy food marketing contribute to persistent differences in diet quality and health outcomes based on race, ethnicity, and socioeconomic status. In January 2023, the Center for Science in the Public Interest (CSPI) in partnership with the Johns Hopkins Bloomberg School of Public Health (BSPH), and Healthy Eating Research (HER), a national program of the Robert Wood Johnson Foundation, convened food and beverage retailers and manufacturers, Supplemental Nutrition Assistance Program (SNAP) participants, and public health researchers, practitioners, and advocates. The purpose of this convening was to develop policy recommendations to support healthy food retail and healthy food marketing in-stores and online. Recommendations largely focused on opportunities that could be leveraged via SNAP and the farm bill. These recommendations, and the rationale behind them, are outlined in this report.

SNAP is a program administered by the United States Department of Agriculture (USDA). It is the largest nutrition assistance program in the US, serving one in eight Americans. SNAP is authorized through the farm bill, a package of agriculture and nutrition legislation passed by Congress roughly every five years. SNAP participants receive money they can spend on foods and beverages at nearly 260,000 participating retailers around the country. All shoppers face barriers to purchasing nutritious food in a retail environment that disproportionately promotes unhealthy food products. However, retail marketing has an even greater impact on shoppers who use SNAP—SNAP participants buy more promoted products relative to nonparticipants, potentially in part due to targeted marketing. Given the size and reach of SNAP and the large number of retailers that participate in the program, the farm bill presents an opportunity to advocate for SNAP policy changes to create health-promoting food environments in-store and online. Leveraging the farm bill and SNAP to promote healthy retail food environments is a promising strategy to improve public health and reduce differences in access across populations. Furthermore, strong policies to support healthy retail food environments could potentially make it easier for all shoppers to identify and access healthy foods and beverages in in-store and online retail food environments. The recommendations outlined in this report are grounded in the promotion of equitable food environments and were informed by evidence-based strategies in the public health literature, key takeaways from the January 2023 interdisciplinary stakeholder SNAP Healthy Retail Marketing convening, and a conceptual framework developed for this report.

In addition to policy opportunities to improve the retail food environment, we recognize that it is imperative to address the affordability of foods and improve benefit adequacy to strengthen the purchasing power of SNAP participants and provide an equitable opportunity to purchase and consume healthy meals. Therefore, we also recommend policy changes to help SNAP participants afford and access healthy foods of their choice. Without such changes, the ability of people receiving SNAP benefits to purchase healthy food will still be limited regardless of improvements to the retail food environment.

To improve the healthfulness of the retail food environment, we recommend the following ten policy actions across six categories: **1** SNAP-authorized retailer requirements; **2** research pilots; **3** grant programs; **4** nutrition education; **5** voluntary rules; and **6** recognition programs.

SNAP-AUTHORIZED RETAILER REQUIREMENTS:

- 1. Strengthen SNAP retailer stocking standards to better align with Dietary Guidelines for Americans.** To increase healthy food availability, we recommend removing the stocking standards appropriations rider, strengthening stocking standards for SNAP-authorized retailers including better alignment with the Dietary Guidelines for Americans, providing a time-bound waiver for smaller retailer implementation, and offering technical assistance and grants to help smaller retailers meet new standards.
- 2. Establish healthy placement standards for SNAP retailers in-store and online.** To make it easier for shoppers to select healthier options, we recommend creating healthy placement standards for SNAP-authorized retailers to locate nutritious foods in prominent locations in-store and online. We also recommend providing a phase-in period to allow for retailer implementation and offering technical assistance and grants to assist with changes needed to comply.
- 3. Mandate that online retailers display the Nutrition Facts Panel, ingredients, and allergens.** Currently, retailers are not required to display nutrition, ingredient, and allergen information online. We recommend requiring retailers to display the same nutrition, ingredient, and allergen information that is available in stores in a manner that is easy to read, readily accessible, and free from intervening marketing information at the online point of sale. We also recommend that the SNAP EBT Modernization Technical Assistance Center provides online labeling technical support to retailers.

RESEARCH PILOTS

- 4. Fund research pilots to identify marketing interventions that adapt the in-store and online retail environments to promote and incentivize healthier purchases.** We recommend funding pilots to explore how healthy food marketing interventions influence food purchases and consumption, retailer participation, and feasibility considerations to inform requirements and future policies, as well as understand any potential unintended consequences.

GRANT PROGRAMS

- 5. Increase Healthy Food Financing Initiative (HFFI) funding to meet the mandatory funding threshold.** HFFI provides funds to increase access to grocery stores in communities with limited resources. The 2018 Farm Bill authorized \$25 million per year to this program but Congress has yet to appropriate more than \$5 million per year. We recommend Congress secure mandatory funding for HFFI to increase the reach and reliability of the program.
- 6. Expand nutrition incentives and promote retailer participation and healthy marketing through the Gus Schumacher Nutrition Incentive Program (GusNIP).** GusNIP has demonstrated the ability to increase fruit and vegetable purchases by SNAP participants, but more funding is necessary to fully meet the demand and need for this program. We recommend increasing GusNIP funding and waiving the match requirement for grant applicants.
- 7. Establish a healthy marketing grant program for retailers.** We recommend establishing a new grant program for retailers to support pilot programs and evaluations of healthy marketing strategies in-store and online.

NUTRITION EDUCATION

8. Expand the SNAP Education (SNAP-Ed) target audience and allowable activities so nutrition education reaches more people and is available in more retail food settings.

We recommend that USDA should re-evaluate the current definition of the SNAP-Ed target audience to allow more flexibility in the target audience and allowable activities. Additionally, allowing multi-state partnerships would facilitate SNAP-Ed programming in collaboration with online SNAP retailers.

VOLUNTARY RULES

9. Create a common nutrition classification system for voluntary retailer adoption. Consumers face a variety of messages and conflicting nutrition information when shopping in-store and online. We recommend pursuing a common nutrition classification system to clearly communicate nutrition information and support shoppers' efforts to purchase nutritious food.

RECOGNITION PROGRAMS

10. Establish a USDA healthy marketing manufacturer and retailer recognition program.

To recognize retailers who are committed to creating healthier food environments, we recommend that USDA create healthy marketing criteria for manufacturers and retailers in collaboration with leading experts and organizations. These standards can then be used to establish and publicize healthy manufacturer and retailer awards and best practices.

To support the above recommendations, we also highlight key areas for research to continue to build the evidence base for policies and strategies to promote healthier food choices when shopping in-store and online. Finally, we highlight key considerations for any policy, voluntary action, or incentive strategy to improve in-store or online retail food environments to ensure effective and equitable implementation. These considerations include prioritizing health equity during policy development and implementation, understanding that there is no one-size fits all solution and that multiple, integrated approaches will be needed, and prioritizing engagement and getting 'buy-in' from multiple stakeholders throughout the process.

In-store and online retail food environments are important determinants of food and beverage choices, dietary quality, and ultimately diet-related health outcomes. Leveraging SNAP and the farm bill to improve retail food environments, investing in research, and strengthening SNAP benefits will help promote healthy diets and improve health equity. The recommendations included in this report can help make progress towards creating environments in which it is easier for all shoppers, and SNAP participants in particular, to make healthy food and beverage choices.

II. Key Terms

Term	Definition
Brick-and-mortar retail	Physical businesses in which people shop for food (e.g., grocery stores, super centers, corner stores). Does not include farmers markets or mobile markets, or websites/online retail.
Cooperative marketing agreements (CMAs)	A legal contract drawn up between two businesses in which the food retailer agrees to market the manufacturers' products according to the terms laid out in the contract. Food retailers may receive payment for agreeing to display manufacturers' products in prime retail locations.
Farm bill	The farm bill sets national agriculture, nutrition, conservation, and forestry policy and is passed by Congress every five years. It includes Title IV, the nutrition title that authorizes SNAP and other federal food assistance programs. ¹
Food environment	The physical and digital interface where consumers interact with the wider food system. It encompasses external dimensions such as availability, price, vendor and product properties, and product promotion; and personal dimensions such as the accessibility, affordability, convenience, and desirability of foods. ²
Food industry	Businesses and companies that produce, manufacture, market, and distribute foods and beverages across the supply chain.
Four Ps of marketing	The "Four Ps" of marketing include product, placement, pricing, and promotion. These are the four key pillars of any marketing strategy. ³
Gus Schumacher Nutrition Incentive Program (GusNIP)	The Gus Schumacher Nutrition Incentive Program (GusNIP) awards organizations with competitive grants to conduct and evaluate projects that provide incentives for individuals with low incomes to increase their purchase of fruits and vegetables and prescriptions for these foods. Since 2019, \$270M in funding has been distributed to 197 projects across the U.S through GusNIP. ⁴
Health disparities	Preventable differences in health or opportunities to achieve health that adversely affect socially disadvantaged groups and arise from discrimination or marginalization. ⁵
Health equity	When social justice in health is attained and everyone has a fair and just opportunity to achieve health. ⁵
Healthy foods	While no universally agreed upon definition exists, this report considers healthy foods as those that align with the Dietary Guidelines for Americans—a dietary pattern low in sodium, added sugars, and saturated fat—as well as nutrient dense food groups such as fruits, vegetables, whole grains, legumes, nuts/seeds, lean protein foods, and low-fat dairy. ⁶
Unhealthy foods	While any food can be incorporated into a healthy dietary pattern, in this report unhealthy foods are considered to be those that are high in added sugar, sodium, and saturated fat. ⁶
Healthy Food Financing Initiative (HFFI)	The Healthy Food Financing Initiative (HFFI) aims to improve access to healthy foods in underserved areas by funding healthy retail food projects and other food supply chain enterprises. ⁷
SNAP-authorized retailer	Retailers that meet minimum stocking standards and have been approved by the United States Department of Agriculture to accept SNAP Electronic Benefit Transfer (EBT). Some exceptions exist for stores in areas where people using SNAP have significantly limited access to food. ⁸
SNAP Education (SNAP-Ed)	SNAP-Ed is a federally funded program administered by SNAP state and local implementing agencies. SNAP-Ed provides SNAP-eligible individuals with nutrition education and leverages policies, systems, and environmental strategies to improve community access and utilization of healthy foods. ⁹
SNAP-eligible foods	All foods and beverages excluding alcoholic beverages and hot prepared foods are eligible to be purchased using SNAP EBT. ¹⁰
Stocking standards	To be SNAP-authorized, retailers must meet at least one of the following criteria: 1) have more than 50 percent of total retail sales from staple food sales, or 2) continuously stock at least 3 units of 3 different varieties for each staple food category. Staple food categories include 1) vegetables or fruit; 2) dairy products; 3) meat, poultry, and fish; and 4) breads and cereals. ⁸
Supplemental Nutrition Assistance Program (SNAP)	The Supplemental Food Assistance Program (SNAP) is the nation's largest federally funded food assistance program and aims to improve the food security and purchasing power of low-income Americans by providing benefits that can be spent at nearly 260,000 SNAP-authorized food retailers across the country. ¹¹

III. Introduction

Low quality diets, or diets low in vegetables and fruits and high in sodium, saturated fat, and added sugars, are one of the leading causes of chronic diseases in the United States (US).¹² Consumption of foods and beverages with excessive amounts of harmful nutrients, such as added sugars, leads to increased risk of chronic health conditions, including heart disease and type-2 diabetes.¹³ The rates of chronic diseases in the US are high, and disparities exist in these conditions based on race, ethnicity, and socioeconomic status.¹⁴⁻¹⁷ Despite efforts to improve access to high quality, healthy food in recent years, racial, ethnic, and socioeconomic disparities in access to nutritious foods persist. Difficulty in purchasing affordable, healthy foods disproportionately affects communities of color and populations with low incomes.¹⁸ In 2021, 13.5 million households in the United States experienced food insecurity, or lack of consistent access to enough food for a household to live an active, healthy lifestyle,¹⁸ which has been linked to increased risk of developmental problems in children, poor physical and mental health, and depression.¹⁹ Further, 88% of participants in the Supplemental Nutrition Assistance Program (SNAP) report facing challenges to consuming a healthy diet, most commonly due to the high cost of healthy foods.²⁰

THE SUPPLEMENTAL NUTRITION ASSISTANCE PROGRAM

SNAP is the nation's largest federally funded food assistance program and is jointly administered by the U.S. Department of Agriculture (USDA) and state agencies.¹¹ The overall goals of SNAP are to improve participants' food security and their purchasing power to access a nutritious diet.¹¹ SNAP provides Americans who meet certain income and asset tests with money that can be spent on food and beverages.¹¹ SNAP benefits cannot be spent on hot prepared foods or alcohol; otherwise, there are no restrictions on foods and beverages that can be purchased with benefits.¹¹ In 2022, over 41 million Americans participated in SNAP receiving an average of \$230 per person in monthly benefits (approximately \$7 per person per day).²¹

IN-STORE AND ONLINE FOOD ENVIRONMENTS

Neighborhood food environments and access to food retailers, such as supermarkets, farmers markets, and corner stores, are important drivers of individual's food choices and diet quality. Food retailers provide three-quarters of calories purchased by Americans.²² A smaller proportion of calories purchased (17%) come from food away from home sources like restaurants and other eating places, which score lower in measures of nutritional quality compared to food at home.²²

Online grocery shopping has become increasingly popular since the onset of the COVID-19 pandemic, during which access to delivery and in-store pickup was dramatically expanded in the US.²³ In 2022, 28% of Americans reported ordering groceries online in the past month, compared to 9% in 2017.²⁴ Further, the SNAP Online Purchasing Pilot, which allows SNAP benefits to be used to purchase groceries online, was expanded during the COVID-19 pandemic, increasing access to online grocery purchasing for Americans with limited incomes. Prior to its pandemic-era expansion, only five states offered online grocery purchasing from at least one retailer.²⁵ Currently, all 50 states and the District of Columbia accept SNAP online from at least one participating retailer.²⁶ Though shopping online has become more accessible in recent years, disparities in online food access exist. Online SNAP delivery is limited in rural areas,²⁷ and smaller retailers that tend to lack online purchasing options are more prevalent in low-income neighborhoods than full-service supermarkets.²⁸

FOOD MARKETING

Marketing plays an important role in influencing food choices in both brick-and-mortar and online retail food environments. Food retailers contract with manufacturers and other vendors to advertise certain products to customers using marketing practices such as prominent placement, price promotions, and product displays that disproportionately market unhealthy foods to consumers.^{29,30} This is also the case in the online grocery retail environment, where a recent study found that 62% of foods and beverages

marketed in online grocery food chains were of low nutritional quality.³¹ While consumers may be unaware of the influence marketing has on their food choices, research has shown that more than half of consumers' grocery store purchasing decisions are unplanned.³² Food retailers and manufacturers also utilize targeted marketing, which directs marketing to certain demographic groups based on race, income, gender, or other characteristics, to influence consumer purchases.³³ The retail food environment is a critical place to intervene to promote healthy food choices that have the potential to impact risk of diet-related disease and overall diet quality.

POLICY OPPORTUNITIES TO IMPROVE RETAIL FOOD ENVIRONMENTS

Researchers, government officials, public health leaders, advocacy organizations, and other stakeholders have highlighted the importance of a healthy retail food environment in shaping the purchasing decisions and overall diet quality of Americans. In November 2020, HER released A National Research Agenda to Support Healthy Eating through Retail Strategies to identify retail strategies that support healthy eating.³⁴ In September 2022, The White House Conference on Hunger, Nutrition, and Health created a national strategy for ending hunger and increasing healthy eating by 2030 to reduce the number of Americans experiencing diet-related chronic diseases.³⁵ Further, the farm bill, a package of agriculture and nutrition legislation passed by

Congress roughly every five years, is scheduled to be renewed in 2023.¹ The farm bill includes the Nutrition title (Title IV) that authorizes most federal food programs and comprises nearly 80% of the farm bill budget, with SNAP accounting for most of Title IV spending.¹ The farm bill presents a critical opportunity to pass legislation that includes policies for SNAP-authorized retailers aimed at improving the retail food environment for the benefit of all shoppers, including those participating in SNAP.

SNAP provides benefits via an electronic benefit transfer (EBT) card,¹¹ which participants can use to buy groceries at the nearly 260,000 participating retailers across the country.³⁸ Congress grants USDA the authority to authorize retailers to accept SNAP benefits and establish eligibility criteria for retailers who wish to do so.¹¹ Despite research demonstrating that interventions to display and promote nutritious items in stores can promote purchases and consumption of healthier foods and beverages,^{30,39,40} USDA requires little from retailers to participate beyond minimal requirements to stock certain types of foods (called staple foods).⁴¹ SNAP-authorized retailers profit substantially from the program. In 2022, \$114 billion in SNAP benefits were distributed,²¹ representing approximately 13% of total food retailer sales.⁴² Given the size and reach of SNAP and the large number of retailers that participate in the program, leveraging the 2023 Farm Bill to promote SNAP policy changes, including improvements to SNAP-authorized

| The farm bill

The farm bill is a package of legislation, also known as an omnibus bill, that is reauthorized (i.e., passed) by Congress approximately every five years.³⁶ The most recent farm bill, titled the Agricultural Improvement Act of 2018, expires on September 30, 2023.³⁶ The farm bill includes twelve sections, or titles, that cover a range of diverse topics related to agriculture, food systems, and nutrition.¹ The farm bill is a large bill (the 2018 Farm Bill had an overall 5-year cost

of \$428 billion) that provides an opportunity to fund existing programs, pilot new programs and initiatives, strengthen existing rules and regulations, and propose new rules and regulations related to food and agriculture.³⁷ The Supplemental Nutrition Assistance Program, or SNAP, is included in the farm bill, and is by far the largest component of the Nutrition title's budget.¹ In the 2018 Farm Bill, the Nutrition title accounted for 76% (\$326 billion) of the total farm bill budget.³⁷ In the past, the farm bill has also

included a number of other food and nutrition programs such as the Fresh Fruit and Vegetable Program, Healthy Food Financing Initiative, Farmers Market Promotion Program, and Gus Schumacher Nutrition Incentive Program (GusNIP), formerly known as the Food Insecurity Nutrition Incentive Program. Many of these programs, including SNAP, began as small pilot programs when initially introduced and were subsequently scaled up and expanded in later farm bills.

retailer standards, will be important to help SNAP participants access health-promoting food environments. Furthermore, strong policies to promote healthy retail food environments will make it easier for all shoppers to identify and access healthy foods and beverages in both in-store and online retail food environments.

GOALS OF THIS REPORT

The goal of this report is to make recommendations for policy, voluntary actions, and research areas to support in-store and online food environments that make healthy food and beverage choices easier for all consumers, including SNAP participants. All shoppers face barriers to purchasing nutritious food in a retail environment that disproportionately promotes unhealthy food products. However, retail marketing has an even greater impact on shoppers who use SNAP—SNAP participants buy more promoted products relative to nonparticipants,³⁰ potentially in part due to targeted marketing.⁴³ The recommendations outlined in this report were informed by a convening of industry, SNAP participant, and public health stakeholders, and are grounded in the promotion of equitable access to healthy foods for all residents of the US.

IV. Conceptual Framework

The retail food environment plays an important role in guiding consumer purchasing decisions. Retailers leverage product, placement, pricing, and promotion (the four Ps) as key marketing strategies to influence consumer behavior both in-store and online.³ These strategies are disproportionately used to market energy-dense foods that are low in nutrients and contribute to low dietary quality.⁴⁴ Figure 1 displays a conceptual framework depicting the ways in which food industry, policy, and food retailer characteristics influence retailer marketing strategies while connecting consumer purchasing decisions to population health, equity, and economic outcomes. Additionally, the framework situates the retail food environment, customer level factors and purchasing decisions, and resulting outcomes within broader systemic, historical, cultural, and structural contexts.

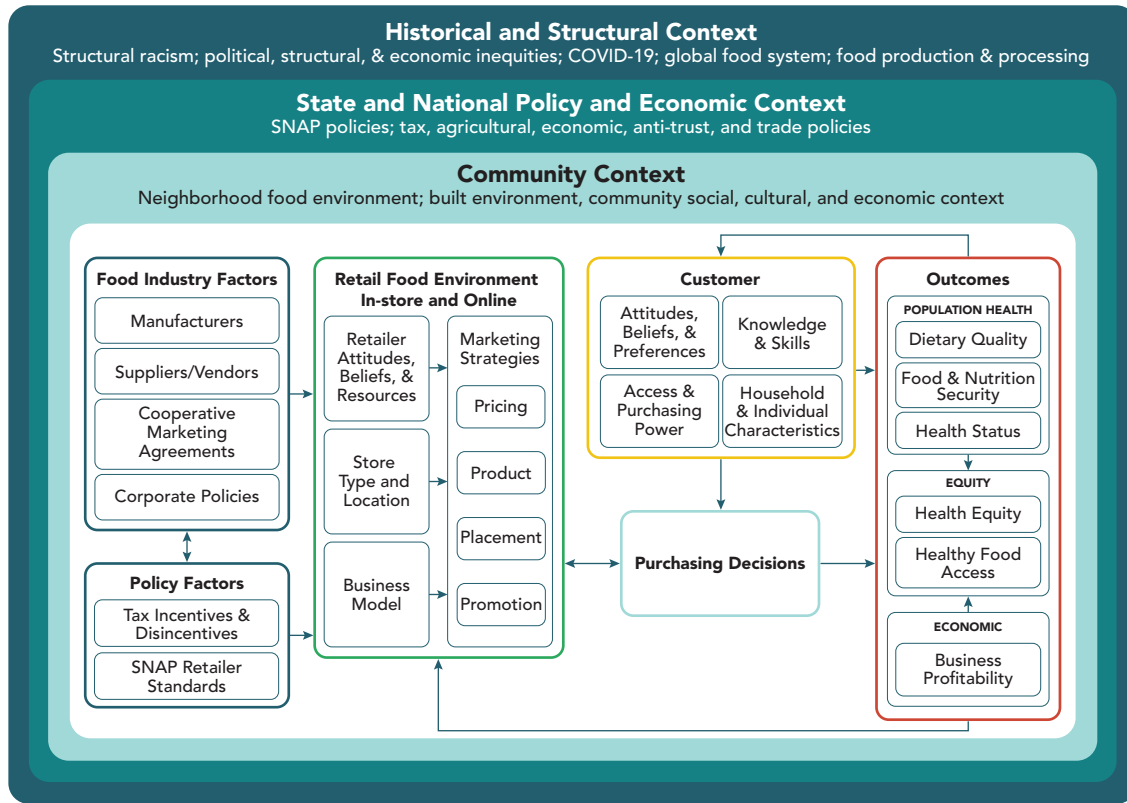
FOOD INDUSTRY AND POLICY FACTORS

The retail food environment is directly shaped by food industry factors and policy factors. Specifically, food and beverage manufacturers shape the retail food environment through cooperative marketing agreements (CMAs) in which manufacturers pay retailers to preferentially promote specific products in prime locations throughout the store with competitive pricing.²⁹ Contracts with suppliers and vendors influence product availability, while major food retailers have corporate policies that dictate marketing strategies within individual stores.²⁹ Policy approaches can be leveraged to influence both industry and retailer characteristics that shape retail product, placement, pricing, and promotion. Tax incentives to promote healthier food and beverages and/or disincentives for promotion of unhealthy items and SNAP retailer standards are identified in the framework as important opportunities for facilitating healthier food retail marketing strategies.

RETAIL FOOD ENVIRONMENT

Within the retail food environment, marketing strategies are a result of the food industry and policy factors, as well as characteristics of the retail food environment itself, such as retailers' attitudes, beliefs, and resources. For example, small retailers with fewer resources may have a limited capacity to stock healthier foods if this strategy poses a real or perceived risk to profits.⁴⁵ Retailer type (e.g., supermarket, small grocery store, convenience store, online retailer) and business model additionally influence marketing strategies. For example, online retailers use unique marketing techniques such as ordering search results, personalized price offers, and product recommendations.⁴⁶ However, Moran et al. found that over 60% of items marketed online had low nutritional quality.³¹ Conversely, community-owned food stores may prioritize promoting healthful foods over less healthful foods, given that these stores are often mission-oriented with goals of promoting public health and social justice within communities.^{47,48} There are further differences in marketing practices by retailer size. Smaller retailers face more barriers to stocking healthy foods. Though major food and beverage manufacturers, which sell predominantly processed and unhealthy foods,

Figure 1. Healthy retail food environment conceptual framework



deliver and set up displays for their products,²⁹ smaller retailers must often self-source fruits and vegetables which creates barriers to stocking these products.⁴⁹ Additionally, smaller retailers perceive stocking fruits and vegetables as higher risk, as fresh produce is perishable and smaller retailers might have to invest in additional refrigeration.⁴⁵ Thus, approaches for improving the retail food marketing environment must be tailored to different store types.

CUSTOMER CHARACTERISTICS

While there are contextual systemic and structural factors that affect the accessibility of food and purchasing behaviors, the retail food marketing environment also interacts with customer characteristics to influence purchasing decisions. Numerous customer characteristics that shape purchasing decisions have been identified in the literature. For example, consumers' attitudes, beliefs, and preferences shape where they shop and how food marketing impacts their decisions.^{50,51} Additionally, consumers' purchasing decisions are influenced by their purchasing power, proximity to stores, and ability to physically or digitally access those

retailers.^{20,27} Consumers' knowledge and skills may further inform purchasing decisions.^{20,52,53} For example, consumers confident in their cooking skills may be more influenced by marketing strategies that emphasize ingredients for scratch cooking, whereas consumers with limited cooking skills and resources might prefer ready-to-heat and ready-to-eat meals. Lastly, individual and household characteristics such as age, physical ability, work schedules, time availability, number of children, and access to housing and cooking facilities and equipment can all affect food choices, purchasing decisions, and dietary intake.^{20,54,55} Food retailers can respond to consumer purchases by stocking and promoting items they believe their customers want.⁴⁵

POPULATION HEALTH, EQUITY AND ECONOMIC OUTCOMES

Ultimately, purchasing decisions shape population health, equity, and business outcomes. Most directly, purchasing decisions affect consumers' dietary quality,⁵⁶ which over time can affect diet-related disease risk and health status.^{57,58} Food and nutrition security are

also directly impacted, based on the quality and sufficiency of foods consumers can purchase. It is similarly important to acknowledge the role of business profitability, as economic stability is a cornerstone of thriving communities that foster health for all. Business profitability, in turn, influences healthy food access, while dietary quality, food and nutrition security, and health status determine health equity outcomes. Taken together, population health and equity outcomes feed back into customer characteristics, while business profitability shapes the retail food environment, demonstrating the dynamic connection between outcomes and the factors that shape food marketing and purchasing decisions.

COMMUNITY, POLICY, HISTORICAL, AND STRUCTURAL CONTEXTS

Finally, these processes must be understood within a broader context. At the community level, important contextual factors include the overall food environment, built environment, and local cultural and economic factors.^{59,60} In addition to the opportunities for intervening in policy discussed above, there are broader state and national policies and economic factors, such as SNAP benefit adequacy and eligibility rules, which lay a foundation for the ways consumers will interact with the retail food environment.^{61,62} Encompassing all of these are historical and structural factors including structural racism, repercussions of COVID-19 on the economy and supply chains, and the global food system, including food production and processing.

V. Convening Activities

BACKGROUND

In the fall of 2020, HER, Center for Science in the Public Interest (CSPI), Johns Hopkins Bloomberg School of Public Health (BSPH), and The Food Trust convened public health researchers, advocates, food and beverage retailers, and funders to develop the first national research agenda focused on healthy food retail.³⁴ The agenda identified key areas of research for developing retail strategies to support healthy eating. Three years later, as preparations were underway for the 2023 Farm Bill, CSPI, HER,

and BSPH reconvened an interdisciplinary group of stakeholders to review the current evidence on healthy retail strategies and discuss policy recommendations that could be pursued in the 2023 Farm Bill and beyond. The 60 convening participants included shoppers who utilize SNAP, food and beverage retailers and manufacturers, advocates, and public health researchers and practitioners.

ADVISORY COMMITTEE

In the spring of 2022, CSPI assembled a nine-person advisory committee with expertise ranging from corporate retail to public health research to SNAP administration to help set the convening agenda (see Acknowledgements for a full list of advisory committee members). The advisory committee met five times to provide insight on hiring a trained meeting facilitator, convening prework, convening agenda, convening participants, and meeting format. The advisory committee also participated in a postmortem review shortly after the convening.

COMMISSIONED RESEARCH

Additional research was necessary to inform discussion of healthy retail marketing policy recommendations at the convening. With guidance from the advisory committee, HER commissioned research to answer the questions:

- 1) What healthy retail marketing interventions are effective?
- 2) What are the policy opportunities for integrating effective healthy retail marketing interventions?
- 3) What are the perceptions of shoppers most impacted by these proposed policy changes?

The following tables and results summarize findings from the research commissioned in advance of the convening.

1) What healthy retail marketing interventions are effective?

This updated literature review identified nine strategies for healthy food promotion in grocery stores and assessed the current evidence on strategy effectiveness (Table 1).⁶³

2) What are the policy opportunities and legal considerations for integrating effective healthy retail marketing interventions?

This original legal research identified healthy retail marketing policy opportunities and assessed their legal feasibility based on 1) government entity authority to act and 2) accordance with the U.S. Constitution (Table 2).⁶⁴ Notably, the U.S. Supreme Court has held that the First Amendment of the U.S. Constitution protects commercial speech and created a higher bar for restricting advertising that is not deceptive, false, or unfair.

3) What are the perceptions of shoppers most impacted by these proposed policy changes?

In October 2022, researchers conducted a national web-based survey of SNAP participants in the US (N=1,454) to assess support for policies and strategies to promote healthy foods in-store and online.⁶⁵ The survey found that SNAP participants are broadly supportive of voluntary

actions retailers could take and government policies to support expanding access to healthy foods (82.8% - 71.5% support), particularly by making it easier to identify healthy options in online and in-store retail environments.⁶⁵ Participants were less supportive of strategies to restrict unhealthy foods and beverages available using SNAP benefits, but still overall supportive (74.3% - 60.4%).⁶⁵

CONVENING

A two-day virtual convening was held on January 18-19, 2023. Day one focused on a discussion of in-store and online healthy retail marketing strategies identified through the commissioned research prework. The prework revealed potential strategies that were effective, legally feasible, and supported by SNAP participants. Promising interventions included nutrition education, nutritional messaging, placement strategies, and nutrition classification systems. During the first day of the convening participants worked in small groups to brainstorm promising retail marketing interventions, opportunities, barriers, and considerations that should be taken into account for successful policy development. Ideas generated in small groups were shared back with the full group of participants. Individuals who use SNAP also provided insight

Table 1. Overview of healthy food promotion strategies within grocery retail settings

Strategy	Definition	Evidence
Nutrition scoring	Scale to represent healthfulness of items	Widely researched; effective
Nutritional messaging	Signage, flyers, etc. to note healthful benefits of items	Widely researched; effective
Non-nutritional messaging	Non-traditional marketing (e.g., scarcity labeling - “while supplies last”)	Mixed effectiveness
Food tasting	Healthy food sampling, demos	Generally positive effects; limited single component studies
Nutrition education	Healthy learning experiences	Generally positive effects; limited single component studies
Endcaps, secondary placement	Prominent display of healthy items (e.g., ends of aisles)	Emerging evidence on healthy purchases, consumption
Point-of-sale/checkout	Place healthy items in checkout lanes	Use in multi-component interventions promising
Placement on shelf	Place healthy items to promote (e.g., eye level)	Use in multi-component interventions promising
Increased stocking	Stock higher quantity of healthy food items	May be effective when combined with other interventions

Source: Adapted from Wolgast et al., 2022.⁶³

Table 2. Policy options to reform SNAP-authorized retail food environments

Marketing strategy	Broad legal feasibility	Legally feasible if carefully designed	Legal feasibility unlikely
Information	Public information campaign Nutrition facts and ingredient information Voluntary nutrient-specific interpretive labels (e.g., traffic light, stars, healthy designation) SNAP/EBT accepted here signs	Mandatory nutrient-specific interpretative labels (including warning labels)	Restrict nondeceptive, non-false, or non-unfair in-store or online advertisements Condition retail licenses on retailer not displaying advertising or price information or requiring them to display information found to be unconstitutional
Price	Excise taxes on sugary beverages Establish minimum prices for sugary beverages Provide incentives to SNAP participants to purchase fruits and vegetables		Restrict price information
Placement	Healthy endcaps and checkout aisles		

into their lived experience with the program and shared their ideas for healthy retail food environments and broader SNAP improvements. Day two focused on potential policy levers to advance priorities identified during day one discussions. In small breakout groups, convening participants brainstormed policy ideas and discussed key design elements, equity considerations, challenges, and opportunities. Iterative discussions across both days in small groups and with feedback from the larger group resulted in several key priority areas for policies, interventions, and research to promote healthy retail food environments for SNAP participants which are reflected in this report. Appendix A provides additional details on convening planning and activities.

VI. Methods

All authors of this report participated in the two-day convening. To synthesize and translate the insights and key takeaways from the convening into policy recommendations and strategies for promoting healthy food retail, CSPI, the BSPH team, and the advisory committee held a series of meetings to debrief in the weeks after the

convening. The BSPH team then reviewed all notes from the various notetakers and breakout groups during the convening, as well as the real-time notes from convening participants that were posted on digital platforms during the interactive sessions. The BSPH team reviewed the written chat log from the convening as well as the pre- and post-convening participant survey results. Exemplary quotes from the chat and notes were extracted to represent the views of different stakeholders and the key takeaways from the various discussions over the two-day convening. Three members of the BSPH team independently wrote memos to synthesize meeting discussions from the breakout groups with a particular focus on perspectives and recommendations from different stakeholders. These memos were then used as the basis for team discussions to synthesize policy recommendations, stakeholder perspectives, implementation considerations, priorities for research, and other important contextual factors raised by participants when considering actions needed to promote healthy food retail. The CSPI team led the development of policy recommendations, informed by discussions during the convening and among the report authors. Finally, the BSPH and CSPI teams held a series of iterative meetings to outline and collaboratively draft the report.

VII. Key Considerations for Strengthening SNAP Benefits to Support Healthier Food Environments

It is imperative to consider when reading the policy recommendations outlined in this report that while the retail food environment should be designed to make purchasing healthy foods easier for all shoppers, there are substantial structural and societal barriers limiting how much people who utilize SNAP can benefit from these changes. It is critical to address the affordability of foods and improve benefit adequacy to strengthen the purchasing power of SNAP participants and provide an equitable opportunity to purchase and consume healthy meals.

Changes are needed to strengthen SNAP benefits and expand where and how benefits can be used. Without such changes, the ability of SNAP participants to purchase healthy food will still be limited regardless of improvements to the retail food environment. For example, if healthy foods are promoted on endcaps and shown first when searching online but remain unaffordable or ineligible for purchase with SNAP benefits, marketing strategies are less likely to impact the food choices of people using SNAP and other shoppers with low incomes. Table 3 outlines key considerations lifted up by SNAP participants during the convening. Many of the proposed strategies also received broad support from a national sample of SNAP participants surveyed in October 2022.⁶⁵

Table 3. Key considerations for strengthening the Supplemental Nutrition Assistance Program

Key consideration	How is this related to healthy retail?	Policy recommendations
Affordability	People who use SNAP want to eat healthy, but purchasing healthy foods must be affordable. Current benefit allotments, which on average are \$6 per person/day, are not sufficient for people using SNAP to afford a healthy diet.	Use a more generous food plan, such as the Low-Cost Food Plan, to determine benefit allotments.
Convenience	It takes time and mental energy to prepare healthy meals at home. It is important to ensure participants have access to healthy, convenient food options.	Allow SNAP benefits to be used to purchase hot foods (e.g., rotisserie chicken, hot deli bar items).
Online access	SNAP retailers may not be accessible by all, especially those who are who are elderly, immunocompromised, living with a disability, transportation burdened, and/or living in rural communities or areas with limited food access. The expansion of the Online Purchasing Pilot allows SNAP benefits to be used to purchase food from online grocers. However, delivery and service fees are a barrier to utilization for many people who use SNAP.	Reimburse smaller, independent retailers for online delivery and service fees. Require larger retailers to waive online delivery and service fees for people using SNAP.
Cultural relevance	Certain foods hold particular importance for specific cultures. It will be important to assess the impact of policy changes on access to culturally important foods.	Increase EBT acceptance and participation among smaller retailers/markets with culturally specific foods. Consider culturally relevant foods when creating, implementing, and evaluating healthy marketing interventions.

AFFORDABILITY

Throughout the convening, the affordability of healthy foods was the greatest concern raised by participants who use SNAP. While retail policies and strategies discussed by the group may make the retail food environment healthier, purchasing healthy food must also be affordable. Current SNAP benefit allotments are not sufficient for people using SNAP to afford a healthy diet.⁶⁶ Benefit allotments are based on The Thrifty Food Plan (TFP), which serves as the lowest cost food plan for affording a healthy diet prepared at home in the United States.⁶⁷ In the 2018 Farm Bill, Congress instructed USDA to re-evaluate the TFP by 2022 and every 5 years thereafter.³⁶ In 2021, during the pandemic, the TFP was reevaluated and found that the cost of a healthy meal was 21% higher than benefit allotments.⁶⁸ This ultimately led Congress to increase the average household allotment by approximately 27%.⁶⁸ While the reevaluation and benefit increase were much needed, it did not substantially increase the purchasing power of people using SNAP, as the benefit allotment per meal only increased from \$1.40 to \$1.80.⁶⁶ A short-term evaluation of the effects on food security and dietary intake did not find significant improvement resulting from the TFP increase.⁶⁹ More recently, the end of pandemic emergency allotments and the rising cost of food due to inflation has once again left families experiencing hardship in their ability to afford food.⁷⁰ Advocates are pushing Congress to use a food plan that provides SNAP participants with a higher average monthly benefit allotment, like the Low-Cost Food Plan.⁷¹

CONVENIENCE

Another key consideration elevated during the convening by participants who use SNAP was the need to expand SNAP-eligible foods to include those that are hot and prepared, such as rotisserie chicken and foods from the prepared foods bar at a grocery store. Currently, SNAP benefits may only be used to purchase foods intended for home preparation and consumption, which excludes hot prepared foods that might be available at retailers.¹⁰ Restricting SNAP participants from using benefits for convenience foods, like hot prepared meals, contributes to inequitable access to healthy foods, disproportionate burdens (e.g., more time and effort to prepare meals), and increased stigma for SNAP participants.⁷² Studies have found that

the diets and purchasing behavior of people who do and do not use SNAP are similar,⁷³ yet SNAP participants face scrutiny and restrictions for their food purchases.¹⁰ Preparing and cooking healthy food at home requires an individual to be housed and have ample time, resources, and physical and mental energy.⁷⁴ Restricting purchase of hot prepared foods for recipients of SNAP further exacerbates barriers to purchasing and consuming healthy foods for people who may have little to no access to a kitchen or places to store perishable foods.⁷⁵ Allowing benefits to be used to purchase hot prepared foods would afford all participants in SNAP, regardless of their housing status, the convenience of purchasing a hot, healthy meal that is available to other shoppers who do not use SNAP.

ONLINE ACCESS

The ability to use SNAP benefits online, via the SNAP Online Purchasing Pilot, is a relatively recent development.⁷⁶ Currently, online purchasing using SNAP is accepted in at least one retailer per state in all 50 states and the District of Columbia.²⁶ However, delivery fees, the inconsistent ability to split payments between two types of tenders (e.g., cash and SNAP EBT), and lack of participating retailers, particularly in rural areas, continue to be barriers to utilization.^{76,77} Large retailers, like Amazon and Walmart, tend to dominate participation in online ordering with a limited number of smaller retailers only recently accepting SNAP online.⁷⁶ Further, most retailers participating in online SNAP have added fees on online orders, which cannot be paid with SNAP benefits, and therefore present a barrier to using SNAP benefits for online grocery shopping.⁷⁸

To make online purchasing more accessible and equitable for people who use SNAP, USDA should reimburse smaller, independent retailers for SNAP delivery and service fees while requiring larger retailers to waive fees for SNAP orders.⁷⁹ USDA currently requires retailers accepting SNAP benefits online to allow split payments (i.e., use SNAP benefits for eligible purchases and another payment method for SNAP ineligible items). However, SNAP participants at the convening reported that this is not always possible when they try to shop for groceries and other household essentials online. Many SNAP-authorized online retailers

Legislative opportunities beyond the farm bill

While the policy recommendations resulting from this convening could be included in the farm bill, there are other vehicles to move these priorities forward. Every year, Congress must pass **annual appropriations**, or spending bills, to fund the federal government by October 1, otherwise the government shuts down.⁸¹ The annual appropriations package could include increases in discretionary funding or

supportive language related to some of these recommendations. The advantage of including certain recommendations in the annual appropriations package is that this bill must pass each year, whereas the farm bill passes every five years. However, one of the biggest threats to implementation of policy is from **policy riders**, which are non-funding policy provisions inserted into the appropriations package

to influence or typically block agency action.⁸² For instance, there is a current rider from previous spending bills that blocks USDA from strengthening stocking standards for SNAP retailers.⁸³ The Biden administration has called for this rider to be removed.³⁵ Other mechanisms include **agency action through rulemaking or guidance** if funding or changes to existing law are not needed.

sell both food items that can be purchased with SNAP benefits and other household items, like toilet paper and paper towels, that cannot be purchased with benefits. The inability to use a separate form of payment, in addition to the SNAP EBT card, to pay for non-eligible items within the same order leaves participants placing two separate orders with two separate delivery fees and is a barrier and deterrent to using SNAP benefits online. Based on reports from SNAP participants at the convening, greater enforcement of the requirement to allow split payments should be a priority for USDA.

CULTURAL RELEVANCE

Finally, it is crucial when developing healthy retail policies to consider the cultural relevance and preference of foods. Culturally relevant foods are those that hold significance in the diet of a particular culture or subpopulation.⁸⁰ For example, rice is an important source of carbohydrates for millions of people around the world and is a staple food in many cultures. It will be necessary to assess the impact of healthy retail policy changes on access to culturally important foods, and whether the foods of some populations are disproportionately affected compared to others.

These priorities raised by SNAP participants at the convening must be considered when developing new strategies and policies aimed at improving the healthy retail food environment if we are to have the greatest impact on improving diet quality for all populations.

VIII. Recommendations to Improve the Healthfulness of the Retail Food Marketing Environment

POLICY RECOMMENDATIONS

Informed by the SNAP Healthy Retail Marketing Convening, CSPI identified ten policy recommendations to improve the healthfulness of the retail food marketing environment across six categories: 1) SNAP-authorized retailer requirements, 2) research pilots, 3) grants programs, 4) nutrition education, 5) voluntary rules, and 6) recognition programs (Table 4).



Table 4. Policy recommendations to improve the retail food marketing environment

Policy opportunity	Policy recommendations	Current status	Policy mechanisms	Legislative opportunities
1) SNAP authorized retailer requirements	Strengthen SNAP retailer stocking standards to better align with Dietary Guidelines for Americans	Current stocking standards require 36 staple food stocking units. An appropriations rider bars increasing stocking requirements.	Federal rulemaking	Appropriations Farm Bill
	Establish SNAP retailer healthy placement standards in-store and online	No current placement standards but legal precedent exists. Two cities have enacted healthy checkout ordinances.		
	Mandate that online retailers display the Nutrition Facts Panel (NFP), ingredients, and allergens.	No current online NFP, ingredient, or allergen requirements for retailers. Manufacturers are required to display NFP, ingredients, and allergens on all products.		
2) Research pilots	Fund research pilots to identify marketing interventions that adapt the in-store and online retail environments to promote and incentivize healthier purchases	Several nutrition-oriented demonstration projects were authorized in the 2008 Farm Bill, but mandatory funding was only made available for the Healthy Incentives Pilot. The other pilots were given discretionary funding that expired in 2012.	Federal funding and/or requirement USDA approval and existing or third-party funding	Appropriations Farm Bill
3) Grant programs	Increase Healthy Food Financing Initiative (HFFI) funding to meet the mandatory funding threshold	The 2018 Farm Bill Authorized \$25 million a year for HFFI, but only \$1-5 million a year has passed in appropriations.	Federal funding	Appropriations Farm Bill
	Expand nutrition incentives and promote retailer participation and healthy marketing through the Gus Schumacher Nutrition Incentive Program (GusNIP)	GusNIP is currently funded at \$56 million to be appropriated over 5 years and is available in 35 states. Currently, only 1% of SNAP-authorized retailers participate in GusNIP.		
	Establish a healthy marketing grant program for retailers	No healthy marketing grants program currently exists.		
4) Nutrition education	Expand the SNAP-Ed target audience so nutrition education is available to more communities across more retail food settings	In 2019 USDA allocated \$433 million to SNAP-Ed. The SNAP-Ed target audience definition requires programming to demonstrate that it serves a population with at least 50% low income. SNAP-Ed programming is not permitted in online retail settings because the target audience eligibility cannot be determined.	Federal rulemaking	Farm Bill
5) Voluntary rules	Create a common nutrition classification system for voluntary retailer adoption	No common nutrition classification system exists. Some retailers have developed their own systems, but they vary store to store.	Federal guidance	Farm Bill
6) Recognition programs	Establish a USDA healthy marketing manufacturer and retailer recognition program	USDA has recognition programs to support healthier school food environments, but no programs are focused on SNAP or the retail environment.	Federal agency action	Farm Bill

1) SNAP-AUTHORIZED RETAILER REQUIREMENTS

USDA has the authority to condition SNAP retailer licensing on certain requirements, and currently only requires retailers to stock 36 staple food units—basic foods that make up a significant portion of people’s diet and are prepared at home (e.g., fruits, vegetables, meat, dairy).⁸ Minimal stocking standards leave shoppers at some SNAP-authorized retailers with limited healthy options, especially at smaller retail formats like convenience stores.⁸⁴ And while supermarkets and grocery stores usually have a wide array of food options, nutritious choices may be difficult to find due to the more prominent placement and promotion of unhealthy items throughout the store.^{30,85} Unhealthy food marketing is also pervasive online,^{31,86} and in some cases, it may be impossible to make healthy choices online due to missing or inaccessible nutrition and ingredient information.⁸⁷ SNAP retailers and the manufacturers that supply them benefit greatly from billions of SNAP federal dollars. By strengthening SNAP retailer requirements and supports to create a healthier retail food environment, SNAP participants, and everyone who shops at SNAP-authorized stores, can benefit.

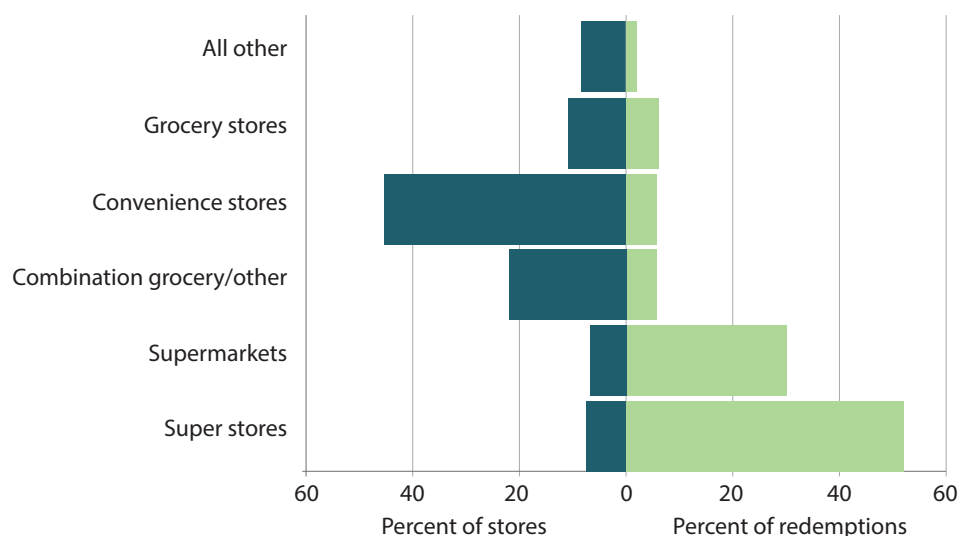
This section considers updating SNAP retailer standards, including stronger stocking standards, healthy placement standards, and online labeling requirements, to make nutritious choices more

readily available and accessible at SNAP-authorized retailers. However, if too stringent, strengthened retailer standards could decrease retailer participation in SNAP. The goal is not to improve healthy food access to the detriment of overall food access, but to improve both. The following recommendations strive to achieve this balance, considering both retailer feasibility and public health impact. Additionally, the existing Need for Access provision allows SNAP authorization of stores that do not meet stocking standards in “an area where SNAP clients have significantly limited access to food.”⁸⁸ Maintaining the Need for Access consideration with expanded SNAP retailer standards will be critical to mitigate unintended consequences for food access, especially in rural areas where small and independent SNAP-authorized retailers may play an outsized role. Additional retailer supports, including time-bound waivers, phase-in periods, technical assistance, and grants are also important components of our policy recommendations.

✔ **Recommendation: Strengthen SNAP retailer stocking standards to better align with the Dietary Guidelines for Americans**

Shoppers can only purchase healthy items if they are available. SNAP participants may have choices when it comes to where they shop but may lack choices when it comes to foods available to them. Stocking standards aim to increase the number of food items and

Figure 2. SNAP participation and redemption by store type



Source: U.S. Department of Agriculture, Food and Nutrition Service, 2023.³⁸

overall nutritional content of foods available at SNAP retailers. Most SNAP benefits (77%) are redeemed at supermarkets and super stores where stocking standards are easily met (Figure 2).³⁸ However, nearly half of SNAP-authorized retailers are convenience stores³⁸ that have limited fruit and vegetable, whole grain, and dairy products compared to larger retailers.^{84,89} This limited healthy food availability disproportionately impacts African American, Hispanic, and Native American SNAP participants as they spend more of their benefits at smaller retailers relative to White SNAP participants,⁹⁰ thus providing an opportunity for stronger stocking standards to promote health equity. And people participating in the program want more healthy choices at stores—in a national survey of SNAP participants, 79% of respondents supported requiring SNAP-authorized stores to stock a wider selection of healthy foods and beverages.⁶⁵

Currently, SNAP-authorized retailers must stock three units of three different varieties for four staple food categories (fruits or vegetables; dairy products; meat, poultry, or fish; and breads or cereals), or 36 staple stocking food units total (Table 5).⁸ There have been recent attempts to strengthen the stocking requirement. The 2014

Table 5. Stocking standard requirements for SNAP-authorized retailers under criterion A

	Prior regulation	Proposed rule	Current rule
Staple food categories	4	4	4
Varieties in each category	3	7	3
Minimum number of categories that must include perishable foods	2	3	2
Depth of stock for each variety	1 item of each variety	6 items of each variety	3 items of each variety
Minimum stocking unit total	12 items	168 items	36 items

Source: Adapted from Congressional Research Service, 2017.⁹⁴

Farm Bill increased the variety of staple foods and number of perishable items required of SNAP-authorized retailers.⁹¹ A 2016 USDA proposed rule to codify the 2014 standards would have required retailers to stock six units of seven different varieties in each of the four staple food categories, or 168 staple stocking food units total.⁹² However, the convenience store trade association opposed the proposed rule and USDA ultimately issued a final rule with the current, weaker standards.⁹³ In years since, the convenience store trade association successfully lobbied Congress to include an appropriations rider that bars USDA from increasing stocking standards.⁸³

To improve healthy food availability at SNAP-authorized retailers, we recommend:

- Removing the stocking standards appropriations rider.** Before SNAP retailer stocking standards can be strengthened, Congress must remove the appropriations rider barring USDA from expanding the requirement.
- Increasing stocking standards for SNAP-authorized retailers for greater alignment with the Dietary Guidelines for Americans, such as greater requirements for fruits and vegetables given high nutrient content and high retailer feasibility.** Stocking standards should be expanded to better align with the Dietary Guidelines for Americans to increase the availability of foods that promote health and reduce the risk of chronic disease.⁶ A recent, multi-site study found most small food stores in areas with lower incomes (86%) already met the 2016 proposed rule requirements for fresh, frozen, and/or canned fruits and vegetables, yet few (33%) already met requirements for dairy.⁹⁵ These findings imply potential benefit from considering category requirements individually given variation in nutrient density and retailer feasibility. USDA estimated that the average small store would need to add 54 additional staple food items at a cost of approximately \$140 to meet the proposed criteria, and to purchase all 168 staple food items would cost approximately \$400, including storage and potential spoilage costs.⁹²

Additionally, these costs could be recouped as new inventory is sold, with potential for long-term financial benefits from expanded inventory.⁹² Further, evidence from other programs suggests stocking standards can improve the retail food environment. Minimum stocking standards for the Special Supplemental Nutrition Program for Women, Infants, and Children (WIC), including the 2009 WIC package reformulation, increased the availability and variety of healthy foods in convenience and nonchain grocery stores.⁹⁶

- **Providing a timebound waiver that allows for smaller retailer implementation.**

Some small retailers will need to make substantive changes and might not be immediately able to meet expanded stocking requirements. Allowing small food stores to apply for a timebound waiver provides flexibility and time for stores to update operations to reach compliance, mitigating SNAP retailer dropout.

- **Offering technical assistance and grants to assist with smaller retailer sourcing, stocking, and marketing of staple foods.**

Smaller stores are capable of stocking healthier products, especially when coupled with technical support and incentives to increase consumer demand for these products.⁹⁷ Technical assistance including procurement, stocking, and marketing resources (e.g., toolkits, tip sheets, videos, webinars) could be made widely

available to retailers through a technical assistance center led by associations, trade organizations, businesses, or nonprofits in the field. Additionally, grants could be made available to small retailers to cover direct costs (e.g., increased stock of produce) or indirect costs (e.g., coolers/freezers to store increased stock of produce, promotional materials to increase consumer awareness of and demand for increased stock of produce) associated with expanding stock of staple foods.

In addition to CSPI, the Biden-Harris Administration,³⁵ Bipartisan Policy Center,⁹⁸ and leading experts in the nutrition field⁶² support strengthened stocking standards.

- ✔ **Recommendation: Establish SNAP retailer healthy placement standards in-store and online**

Even when healthy foods and beverages are available at retailers, they might not be the easy choice. Retailers typically have one produce section, yet sugary drinks are placed in an average of 30 different locations throughout the store.⁸⁵ Indeed, more in-store promotions are for unhealthy items compared to healthy items.³⁰ The same trends persist online with most marketed products (62% in one study) having low nutritional quality (defined as products that are ultra-processed and excessive in sodium, excessive in free sugars, contain other sweeteners, or excessive in saturated fats).³¹ Food and beverage manufacturers pay retailers to prominently promote their products, dictating the retail environment through cooperative marketing agreements (CMAs).²⁹ And evidence shows that promotions work—product sales increase when placed at checkout, on end caps, and at the front of the store.³⁰

Additionally, shoppers using SNAP want a healthier retail food environment—a national survey of SNAP participants found the majority of respondents support placing healthier foods and drinks at checkout (81%) and requiring retailers to display only healthier foods and drinks at checkout (60%).⁶⁵ Currently, there are no existing SNAP retailer placement requirements; however, they are legally feasible provided that they are solely based on objective nutrition criteria.⁶⁴ Two cities (Berkeley, CA and Perris, CA) have passed healthy checkout ordinances

Photo: shironosov/istockphoto.com.



in recent years that require all large retailers, regardless of SNAP participation, to place only healthy food and beverage products in checkout aisles.

To make healthy food and beverage choices easier at SNAP-authorized retailers, we recommend:

- **Creating healthy placement standards for SNAP-authorized retailers that improve the availability of nutritious foods in prominent retailer locations in-store and online.** Product placement is a promising healthy retail strategy,⁴⁰ with prominent placement of healthy products increasing product sales.³⁰ In-store healthy placement standards could include front of store, checkout, and end caps. Online healthy placement standards could include top spots in search ordering, recommendations based on previously purchased products, and product placement at online checkout. Because unhealthy product placement is pervasive, a whole-of-store approach is necessary to make healthy choices easier.³⁰ Manufacturers must work with retailers to shift prominent placement of products in their portfolio that meet established nutrition criteria.
- **Providing a phase-in period to allow for retailer implementation.** Most retailers will need to make substantive changes to current product placement practices in their store. A phase-in period will provide flexibility and time for stores to create a health-promoting store environment, including renegotiating CMAs, reducing the risk of retailer dropout.
- **Offering technical assistance and grants to assist with changes to the in-store and online retail environment. Technical assistance including placement and marketing resources (e.g., toolkits, tip sheets, videos, webinars) could be made widely available to retailers and manufacturers.** Additionally, grants should be made available to independent and Need for Access designated retailers to cover indirect costs (e.g., updated coolers at checkout to stock yogurt and fruit cups) associated with expanding placement of healthy foods and beverages.



✔ **Recommendation: Mandate that online retailers display the Nutrition Facts Panel (NFP), allergen, and ingredients information**

The 2014 Farm Bill authorized the SNAP Online Purchasing Pilot to allow retailers to accept SNAP benefits for online transactions to be picked up at the store or for delivery.⁹¹ USDA rapidly expanded the pilot in response to the COVID-19 pandemic with all 50 states and the District of Columbia now participating with at least one retailer authorized for online SNAP in each state.⁹⁹ In 2022, 6% of SNAP sales were online.³⁸ The Nutrition Facts Panel (NFP) provides information on the calorie and nutrient content of foods that consumers can use to assess how foods fit into their total daily diet, and utilization of the NFP is associated with healthier diets.¹⁰⁰ While many online retailers make nutrition and ingredient information available for some products, a recent study found that the NFP, ingredients lists, and allergens were often not disclosed at the online point of sale, or, when disclosed, were often difficult to read or hard to find.⁸⁷ Consumers cannot make personalized, nutrition-based shopping decisions online if critical information is absent or inaccessible.

Currently, there are no online retailer requirements for displaying the NFP or food and beverage manufacturer requirements for providing NFP information to retailers. The U.S. government already requires manufacturers to display the NFP on products in stores and should require the same information be made available online.¹⁰¹

To improve food labeling at online SNAP authorized retailers, we recommend:



- **Pursuing policy that would require all online retailers, including online SNAP retailers, to display the same nutrition, ingredient, and allergen information that is available in stores so that it is easy to read, readily accessible, and free from any intervening marketing information at the online point of sale.** The Food Labeling Modernization Act of 2023 would require online NFPs for foods sold by all online retailers.¹⁰² Alternatively, the farm bill could require online labeling specifically for foods sold by SNAP-authorized retailers. Policies should prioritize maintaining online SNAP retailer participation, especially amongst small and independent retailers.
- **Ensuring the SNAP EBT Modernization Technical Assistance Center provides online labeling technical support to retailers.** The SNAP EBT Modernization Technical Assistance Center already supports SNAP-authorized retailers who wish to offer online SNAP,¹⁰³ and expanded scope and funding could provide retailer support with back-end web updates to ensure labels can be added easily and work with consumer packaged goods (CPG) manufacturers to streamline nutrition label acquisition.
- **Pursuing policy that would require or encourage all CPG manufacturers to provide high-resolution Nutrition Facts Panel images to all online retailers.** To address issues with nutrition and ingredient information availability, CPG companies could be held accountable for providing

nutrition information directly to retailers for the products they manufacture.

In addition to CSPI, 40 other advocacy and research organizations have endorsed legislation that would require all retailers to display the NFP clearly and consistently for online shoppers.^{104,105}

2) RESEARCH PILOTS

Pilot projects are important tools for spurring innovation.¹⁰⁶ There is a history of establishing research pilots through the farm bill that, when proven effective, lead to permanent programs. For example, the 2002 Farm Bill authorized the Fresh Fruit and Vegetable Pilot, which was later made permanent in the 2008 Farm Bill.¹⁰⁷

Section 17(b) of the Food and Nutrition Act of 2008 gave USDA the authority to conduct SNAP demonstration projects (i.e., research pilots) to gather data that can be used to evaluate programs run by the agency and explore new strategies to improve the administration and effectiveness of the SNAP program.¹⁰⁸ It specified various SNAP demonstration projects that could promote health and nutrition while not limiting benefits, including increasing purchasing power, improving access to farmers markets, providing retailer incentives to increase availability of healthy food, strengthening stocking requirements, improving coordination of communication and SNAP-Ed efforts, and providing fruit and vegetable incentives at the point of purchase.¹⁰⁸

Of that list, the only one that received funding was the Massachusetts-based Healthy Incentives Pilot (HIP), funded at \$20 million: a demonstration project to provide fruit and vegetable financial incentives at the point of purchase.¹⁰⁹ HIP provided shoppers using SNAP with a 30-cent rebate for every SNAP dollar spent on targeted fruits and vegetables. HIP's 2014 final report found that the pilot increased spending on targeted fruit and vegetables by 11% and consumption of targeted fruits and vegetables by ¼ cup per day, closing 20% of the gap between current consumption and the Dietary Guidelines for Americans recommendations.^{110,111}

HIP's success led to the establishment of the Food Insecurity Nutrition Incentive Program (FINI) in the 2014 Farm Bill.⁹¹ It was later reauthorized under the name Gus Schumacher

Nutrition Incentive Program (GusNIP) in the 2018 Farm Bill.³⁶ In 2021, the competitive grants program redeemed \$41.6 million in incentives, generated \$85.6 million in the local economic activity, and increased participant fruit and vegetable consumption and food security.¹¹²

As noted, there are currently no existing marketing requirements for SNAP-authorized retailers. Yet research suggests that product placement is a promising healthy retail strategy for increasing sales of nutritious foods and beverages.³⁰ An important component of establishing healthy marketing standards for SNAP retailers is to conduct research that can be used to inform the development of such requirements; particularly real-world and large-scale interventions in SNAP-authorized retailers are needed. Similar to HIP, via the 2023 Farm Bill, Congress could fund research pilots to test innovative marketing interventions that promote healthier retail food environments among SNAP-authorized retailers. This research could be used to inform requirements that retailers must meet to accept SNAP benefits, and such standards could be codified in a future farm bill.

Recommendation: Fund research pilots to identify marketing interventions that adapt the in-store and online retail environments to promote and incentivize healthier purchases

To identify effective healthy retail marketing interventions, we recommend:

- **Appropriating \$100 million for state-based nutrition security demonstration projects.** Pilots should explore the ways in which healthy food marketing interventions impact food purchases and consumption, retailer participation and feasibility, and any unintended consequences. Pilot findings will illustrate what is needed to operationalize marketing standards.
- **Inclusion of at least one demonstration project that adapts in-store and online retail placement practices to promote and incentivize healthier purchases.** Pilot testing promising placement strategies with SNAP participants will illuminate the most effective approaches that could be included in requirements for SNAP authorized retailers in the future.

- **Inclusion of at least one demonstration project that tests stronger requirements for SNAP-authorized retailers to stock a wider variety of nutritious foods and beverages.** More research is needed to understand the impact of stronger stocking standards on SNAP participant purchases and consumption, as well as feasibility considerations for retailers.

In addition to CSPI, the USDA,¹¹³ the National Alliance for Nutrition and Activity (NANA),⁷¹ and several prominent researchers⁶² support funding SNAP retailer marketing research pilots. Additionally, a 2019 report from Iowa found strong support among stakeholders, including SNAP participants, for studying the feasibility of product-placement strategies and restrictions on the marketing of unhealthy products by SNAP retailers.¹¹⁴

3) GRANT PROGRAMS

USDA administers several grant programs across the food supply chain. Projects generally fall into categories such as land conservation, food production, processing, aggregation and distribution, and markets and consumers. Two grant programs that offer funds either directly to retailers or to non-profits and state agencies with the intent of working with food retailers are the Healthy Food Financing Initiative (HFFI) and Gus Schumacher Nutrition Incentive Program (GusNIP).





HFFI improves access to healthy foods in underserved areas through loans, grants, and technical assistance resources.⁷ The grant program was established in the 2014 Farm Bill and was reauthorized in the 2018 Farm Bill.^{36,91} HFFI is managed through the Reinvestment Fund, which funds a variety of projects including retail predevelopment and other one-time soft costs, construction, retail equipment such as refrigeration units, supplies or materials including signage, or other hard costs.¹¹⁵ The 2018 Farm Bill authorized \$22.6 million to fund HFFI and supported 134 projects in rural, urban, and tribal communities.¹¹⁶ Unlike other USDA grant programs, retailers are eligible to apply directly for HFFI funds. In 2021, 69% of projects funded were grocery retail projects.¹¹⁶

GusNIP is a competitive grants program to provide opportunities to both conduct and evaluate projects providing point-of-sale financial incentives to increase the purchase of fruits and vegetables by shoppers utilizing SNAP.⁴ The 2018 Farm Bill authorized \$45-\$56 million to be appropriated over five years and the program is now available in more than 35 states.^{36,112} Currently, nonprofits and government agencies are eligible to apply for a GusNIP grant.¹¹⁷ Retailers are not eligible to directly apply, but can receive funding for an incentive program through partnership with a nonprofit or government agency that has received funding from USDA.¹¹⁸

GusNIP directly addresses one of the 4 Ps of marketing: price. It provides shoppers using SNAP with a financial incentive (e.g., discount, rebate) to purchase fruits and vegetables

at participating retailers.¹¹² The majority of programs offer a \$1 for \$1 match, allowing a SNAP shopper to earn an extra \$1 for produce when they use their SNAP EBT card.¹¹² In 2022, more than \$39 million of produce was purchased using incentive funding, with nutrition incentive participants reporting eating more fruits and vegetables per day than the average American and improved nutrition security.¹¹² Non-profits and government agencies that are awarded GusNIP funds can use funds for in and out-of-store marketing, but the primary focus of the funds is financial incentives directly provided to SNAP shoppers.¹¹⁷

However, only a small fraction of SNAP participants are able to access incentives.¹¹⁹ Even organizations that have received GusNIP funding report that the current funding available is inadequate to meet demand.¹²⁰ Along with needing increased funding overall, one key barrier for projects receiving GusNIP funding is the grant matching requirement in which applicants must raise \$1 in non-USDA funds for every \$1 they request.¹¹⁷

✓ **Recommendation: Increase Healthy Food Financing Initiative (HFFI) funding to meet the mandatory funding threshold**

The 2018 Farm Bill authorized HFFI at \$25 million per year but has yet to appropriate above \$5 million per year outside of supplemental American Rescue Plan Act funding.^{36,115} HFFI is the only current opportunity for retailers to directly receive USDA funding to support projects such as grocery expansion, development, and innovative healthy marketing. Increasing the authorization amount so that the program qualifies for mandatory funding would shield the program from the vagaries of the annual Congressional appropriations process, increase the reach of the program, and ultimately create a more consistent opportunity for grocers to reach underserved communities.

To support retailers to access funding for healthy marketing projects, we recommend:

- **Congress should secure mandatory funding for HFFI. Increasing the funding to meet the threshold for mandatory funding would allow the program to be funded without additional appropriations requests.** Additionally, having a consistent

funding allocation through mandatory farm bill funding would allow projects to have the funding and planning time to incorporate multiple elements of healthy food access from availability to healthy marketing into projects because funding allocations wouldn't change annually.

In addition to CSPI, the National Grocers Association¹²¹ and National Sustainable Agriculture Coalition¹²² support this recommendation.

🌱 **Recommendation: Expand nutrition incentives and promote retailer participation and healthy marketing through GusNIP**

GusNIP programs across the country have demonstrated the ability to reach SNAP shoppers and increase fruit and vegetable purchases. However, at the current funding level only a small fraction of people enrolled in SNAP are able to access incentives. Currently, \$41 million worth of GusNIP nutrition incentives are redeemed annually,¹¹² but if all 22 million households participating in SNAP received \$20 of GusNIP funds per month the cost of incentives alone would be \$5.4 billion.¹²³ Furthermore, the current program is limited in reach due to the number of retailers participating. Currently, 2,928 retail firms participate in GusNIP,¹¹² about 1% of all SNAP-participating retailers.³⁸ Investing in GusNIP expansion could increase retailer participation and program access, particularly to supermarkets and superstores where the majority of SNAP benefits are spent.³⁸ An overall increase in GusNIP funding is needed to expand fruit and vegetable incentives to be available to all.

To expand the reach of GusNIP incentives, we recommend:

- **Increase GusNIP funding to allow more SNAP shoppers to utilize the benefits.** Increased funding would allow more shoppers using SNAP to participate in the program, increasing the opportunity for increased fruit and vegetable access in the program overall. With current funding levels, even if grantees were able to scale projects to be available widely, there would not be adequate funding to make the benefit available to all shoppers using SNAP in their communities.

- **Invest in technology such as point-of-sale systems and EBT incentive integration to increase retailer participation.**¹¹⁹

Technology investment allows nutrition incentives to be integrated within the systems retailers already use to accept SNAP benefits. This will allow programs to operate more efficiently and minimize stigma associated with systems like paper coupons or tokens.

Additionally, GusNIP nutrition incentive grant applicants must match federal funds dollar-for-dollar (50% of program costs funded from GusNIP funds and 50% from applicant sources).¹¹⁷ Matching sources include cash contributions from public and private sector funders and certain types of in-kind contributions. Federal funds cannot be used as match contributions except in the case of Tribal agencies.⁴ The match requirement has become a barrier for some applicants, particularly those from lower-resourced organizations with limited existing funding.¹²⁰ The dollar-for-dollar match burdens organizations and limits the dollars able to be allocated towards marketing at GusNIP participating retailers. Additionally, grocer in-kind support (e.g., staff training, product placement, store signage) should be eligible to count as matching dollars. Grocers spend time training staff, sharing information about the program, and organizing produce departments to run a successful nutrition incentive program. By allowing in-kind expenses from grocers to count as matching funds, both applicant organizations and grocers themselves have incentive to use time and resources to



incorporate healthy marketing practices into GusNIP programs.¹²¹

To ensure match dollars are not a barrier to nutrition incentive expansion, we recommend:

- **Removing the GusNIP match requirements for grantees.** Eliminating the match will allow grantees to use the other funds they raise funds more flexibly, including spending more on other healthy marketing strategies alongside pricing strategies.
- **If the match requirement cannot be fully removed, allowing retailer in-kind support to count as matching dollars.** If eliminating the match is not feasible, expanding the definition of in-kind support acknowledges the resources both grantees and grocers invest to run a successful incentive program, as well as incentivizes grocers to integrate healthy marketing practices because it increases federal funds to programs.

In addition to CSPI, the Alliance for National Nutrition Incentives (ANNI), a coalition comprised of nearly 30 national, state, and regional stakeholders, supports these GusNIP recommendations.^{124,125} Of note, convening participants that shopped with SNAP expressed interest in expanding incentive programs to

cover additional healthy foods and beverages, such as whole grain products, lean proteins and legumes, unsweetened beverages, or other items promoted as part of a healthy retail strategy to help address the affordability of healthier diets.

✔ **Recommendation: Establish a healthy food marketing grant program for retailers**

Both HFFI and GusNIP grants currently do allow for marketing to be a covered cost, but healthy food marketing was not the original goal of either program.^{115,117} To support retailers in implementing and evaluating healthy marketing strategies, CSPI recommends a healthy food marketing grant program for retailers be established through the farm bill. These funds would fill a unique gap by allocating money to test healthy retail strategies in in-store retail environments, such as healthy checkout aisles and endcaps, and online retail environments, such as preferred search for nutritious items or healthy filters. Like the HFFI grant, funds could be used for both direct costs such as display materials and indirect costs such as staff time to develop and implement marketing materials, costs associated with changes in inventory, and refrigerated units to encourage retailers to take on the risks of attempting new and innovative placement and marketing strategies.

To support retailers in implementing best practices for healthy food marketing, we recommend:

- **Allocating funds for retailers to implement healthy marketing strategies.** Retailers, particularly smaller retailers, face barriers such as lacking refrigeration equipment, inventory, and website design support when implementing healthy marketing strategies. Allocating funds for retailers to test best practices for healthy marketing will allow retailers the flexibility to pilot strategies and expand the evidence base on healthy marketing strategies through grant evaluations.

Photo: XiXinXing/istockphoto.com.



4) NUTRITION EDUCATION

In-store and online retail food spaces provide ample opportunities to educate consumers, including those who use SNAP, on strategies and skills to support healthy food purchases and preparation. In addition to supporting healthy retail food environments and ensuring healthy options are affordable and accessible, it is critical to empower shoppers with the knowledge they need to make decisions on what to buy and how to prepare healthy meals for themselves and their families. SNAP Education (SNAP-Ed) is a multi-faceted program that is federally funded and implemented by SNAP state and local agencies.⁹ SNAP-Ed provides people who are SNAP-eligible with nutrition education and works to improve the policies, systems, and environments of communities to promote health.¹²⁶ SNAP-Ed is funded through the Nutrition Education and Obesity Prevention Grant Program in the Healthy, Hunger-Free Kids Act of 2010.¹²⁷ The Final Rule was published March 2016, which codifies SNAP-Ed provisions.¹²⁸ In 2019, USDA Food and Nutrition Services allocated \$433 million to SNAP-Ed.¹²⁹ SNAP-Ed funding is granted to state agencies, who are responsible for managing a state SNAP-Ed plan.¹³⁰

There are three approaches to offering nutrition education through SNAP-Ed currently supported by USDA: 1) individual or group-based direct nutrition education, health promotion, and intervention strategies, 2) comprehensive, multilevel interventions at multiple complementary organizations and institutional levels, and 3) community and public health approaches to improve nutrition and obesity prevention.⁹ Approach one is focused on reaching individuals through education about dietary patterns and opportunities such as cooking classes or communications materials such as text messages, flyers, and interactive websites.⁹ Approach two offers nutrition education in partnership with organizations that connect with high amounts of individuals who qualify for SNAP-Ed such as worksites, faith-based organizations, emergency food distribution sites, or schools.⁹ Approach two also allows SNAP-Ed to be offered at retail venues through evidence-based multi-component interventions. This could include combining recipes with merchandising, customer newsletters, and technical advice on product placement.⁹ Approach three focuses on



population level interventions such as work with local governments to improve food access in low-income communities, collaboration with local food policy councils, and technical assistance to corner stores or convenience stores to increase their product offerings to include more healthy food and beverages.⁹ States ultimately determine the interventions they include in their state plan. SNAP-Ed offers an opportunity to further support placement, price, and promotion strategies outlined throughout this report by including key partnerships with grocers in the state plan.

Funding allocation varies state to state. In order to receive SNAP-Ed funds, programs are required to serve the SNAP-Ed target audience which the USDA defines as “people who receive SNAP or a community where at least 50% of the population has low income.”⁹ SNAP-Ed programs are required to demonstrate that the population served at the site meets these criteria. This presents multiple challenges to SNAP-Ed programs including barriers around data availability on a community level, struggles with shifting populations, and challenges to reach SNAP participants who happen to live in high-income census tracts. Furthermore, as SNAP expands, online retailers are not able to offer SNAP-Ed resources due to an inability to document the target audience. As retail expands between communities and even across state-lines, the current rule limits the ability to reach more individuals.

🌱 **Recommendation: Expand the SNAP-Ed target audience and allowable activities so nutrition education reaches more people and is available in more retail food settings**

CSPI recommends that USDA permit community-level eligibility criteria for the SNAP-Ed target audience. By expanding the SNAP-Ed target audience in this way, more individuals and communities could benefit from SNAP-Ed curricula and policy, systems, and environment interventions. SNAP-Ed could also expand into the online retail food environment which has the potential to serve a critical role in helping SNAP participants navigate using their benefits to purchase healthy foods when shopping online. Further, recognizing the important role that retailers and manufacturers have in shaping our food environment, SNAP-Ed nutrition and health equity curricula could be expanded to educate these critical stakeholders using an expanded target audience.

To expand the reach of SNAP-Ed as a tool to support healthy marketing, we recommend:

- **USDA certify the SNAP-Ed target audience based off community level data instead of census tract.** Allowing community level data to serve as eligibility criteria for the SNAP-Ed target audience will expand the reach and impact of SNAP-Ed to more communities that could benefit from the program that would otherwise not qualify under current target audience definitions.

- **USDA should allow for multi-state partnerships to allow retailers that operate across the country to integrate SNAP-Ed consistently across stores and on their online platform.** The online retail environment is a prime area for SNAP-Ed nutrition education to intervene and help SNAP participants in making healthier purchasing decisions. By allowing large, national and regional SNAP-authorized online retailers to consistently implement SNAP-Ed curricula, and providing guidance for how to do so, SNAP participants, and people shopping online at these retailers, will benefit.

In addition to CSPI, American Public Human Services Association supports these SNAP-Ed recommendations.¹³¹

5) VOLUNTARY RULES

Mandatory policies are often the best way to drive industry action as there are penalties associated with non-compliance. Additionally, compared to guidance, laws or regulations are more difficult to roll back when there are changes in administration. But voluntary approaches are often faster to establish and more flexible, meaning standards could be updated over time as the marketplace changes.¹³² However, any voluntary guidance should be paired with a rigorous monitoring and evaluation plan to ensure commitments by industry are upheld and targets are met.

🌱 **Recommendation: Create a common nutrition classification system for voluntary retailer adoption**

Federal U.S. food labeling policies for communicating concise nutrition information to consumers dates back to the NFP for packaged foods, mandated by the Nutrition Labeling and Education Act of 1990.¹⁰¹ In 2009, the US government began exploring policies for creating uniform front-of-package (FOP) labels that would require prominent labels on processed foods to help consumers quickly and easily identify foods that are high in sodium, added sugar, or saturated fat—nutrients that are overconsumed in this country and linked to chronic disease.^{6,133} More recently, in 2022, the Food and Drug Administration (FDA) announced an updated proposed rule for

Photo: United States Department of Agriculture.



the definition of “healthy” when the term is used as a FOP icon, aligning it with current nutrition science, the updated NFP, and the current Dietary Guidelines for Americans.¹³⁴ No voluntary or mandatory FOP policy has been implemented, but in April, the Food Labeling Modernization Act of 2023 was introduced, which, if passed, would mandate FOP labeling.¹⁰²

In the absence of federal regulation, US retailers and manufacturers use a variety of voluntary FOP labels and shelf tags, all applying different schemes to communicate to consumers whether a product meets differing nutrition criteria. Some retailers have gone further by implementing their own comprehensive nutrition guidance programs, but many retailers offer no guidance at all. Nutrition guidance programs are broadly categorized as programs that evaluate the nutritional quality of foods and beverages, and present the information via a shopping tool designed to help shoppers navigate in-store and online choices (e.g., Ahold Delhaize’s Guiding Stars,¹³⁵ Walmart’s Great for You,¹³⁶ Kroger’s OptUp¹³⁷). Stores that do offer these programs present the information in a range of places from shelf tags and product packages to weekly circulars and online shopping platforms.

The lack of uniform retail nutrition guidance can leave shoppers feeling frustrated and overwhelmed as they face a wide variety of messages and conflicting nutrition information in stores and online. A uniform system would ensure nutrition classification systems are rooted in sound nutrition science and build trust among consumers as information would be consistent wherever they shop. Additionally, it would ease implementation challenges and encourage greater participation among manufacturers and retailers. It could also provide policy guidance on product inclusion for nutrition assistance programs like food is medicine and nutrition incentives for SNAP shoppers.

There are a number of ways to approach designing a common nutrition classification system. For example, HER developed nutrition guidelines for the charitable food system via a panel of experts from diverse fields.¹³⁸ This approach could serve as a model for how a common system could be developed collaboratively between government, researchers,

and advocates. And it would leave room for national membership organizations, like FMI, the Food Industry Association, the National Grocers Association, and the National Association of Convenience Stores, to develop implementation resources for their members, which could help level the playing field for independent and smaller stores. In terms of the type of system, a multi-tier design similar to Guiding Stars is a model for establishing standards that motivate manufacturers to reformulate their products. Guiding Stars uses a system that rates the nutritional quality of foods as good, better, and best using 1, 2, or 3 stars displayed on shelf tags. Guiding Stars evaluates products using nutrients found on the NFP and ingredients list. For fresh, unlabeled foods the program uses information from USDA’s National Nutrient Database for Standard Reference (SR-28).¹³⁵

Nutrition classification systems are valuable for retailers as they enable retailers to monitor and report on the percentage of their sales coming from healthy products which can improve their standing with environmental, social, and governance (ESG)-minded investors like Morgan Stanley Capital International (MSCI) and Dow Jones Sustainability Indices (DJSI). A common nutrition classification system would make these metrics even more meaningful as retailers would compete on a level playing field to establish which food retailer has the healthiest sales.¹³⁹

It should be noted that there are a number of challenges associated with designing and implementing a common nutrition classification system. Specific challenges identified by convening participants include: hard to implement and maintain given the vast number of products on store shelves and frequent product churn; deciding whether it is the responsibility of retailers or manufacturers to label; where to display the information (e.g., shelf tags, product labels); how to display the information on packages (e.g., quantitative scores, interpretive labels like traffic lights or warnings); and how to compare product ratings within product categories and across a whole shopping basket. Finally, it was also noted by convening participants that existing food labeling efforts may disproportionately affect culturally important foods for some groups more so than others.

To improve the healthfulness of the retail food environment, we recommend:

- **USDA issue guidance for a common nutrition classification system for voluntary adoption by retailers and manufacturers.** While a voluntary rule cannot mandate adoption of the classification system by all retailers, it should require that any retailer who chooses to use a nutrition classification system utilize the common nutrition classification system. USDA's guidance should also consider how an evidence-based system can be calibrated for equity.

6) RECOGNITION PROGRAM

USDA currently utilizes recognition programs to incentivize voluntary changes to create healthier food environments. For example, the HealthierUS School Challenge is a voluntary, national awards program that recognizes schools for fostering more nutritious choices and increased physical activity.¹⁴⁰ Schools are awarded bronze, silver, gold, or gold award of distinction based on their adherence to rigorous criteria established by USDA.¹⁴¹ Also, with the aim of making healthier choices easier in schools, USDA in partnership with Action for Healthy Kids recently announced the Healthy Meals Incentives Recognition Awards for School Food Authorities. This recognition program supports improvements in the nutrition quality of the National School Lunch Program and School Breakfast Program by spotlighting and sharing best practices that are consistent with the Dietary Guidelines for Americans.¹⁴² USDA could create additional programs to support healthful eating across other nutrition assistance programs, including SNAP.

Recommendation: Establish a USDA healthy marketing manufacturer and retailer recognition program

To incentivize healthy retail marketing and sharing of best practices, we recommend:

- **USDA should create healthy marketing criteria for manufacturers and retailers in collaboration with leading experts and organizations.** Establishing guidelines for manufacturer and retailer healthy marketing best practices in partnership with issue

area experts would create a useful industry resource and enable the creation of tiered awards based on company marketing practices. Criteria could be tied to a common nutrition classification system, including determining which products are healthy and should be prominently placed and promoted.

- **USDA should establish and publicize healthy manufacturer and retailer awards and best practices.** USDA can publicize the new recognition program and share the awards criteria. Additionally, award winners should be publicized alongside their innovative healthy marketing best practices.

Retailer and manufacturer tax incentives and disincentives

Participants in the convening proposed two possible means of creating a healthier food environment through the tax code:

1. **Create tax incentives for manufacturer and retailer marketing of healthy food.**
2. **Remove manufacturer and retailer tax deductions for marketing of unhealthy food.**

The tax code does not currently provide incentives for expenses related to marketing healthy food. The current tax code does provide a deduction for business expenses, including those related to marketing, regardless of industry or subject matter.¹⁴³ There is an exception to this deduction for certain foreign advertising expenses,¹⁴⁴ which could serve as a model for exempting food marketing expenses. The government can incentivize and disincentivize activities through the tax code,¹⁴⁵ and it is worth exploring how to harness this tool to improve our food environment.

During the convening, stakeholders highlighted that the current structure of the tax code allows food retailers to deduct costs related to both healthy and unhealthy food marketing, which is not consistent with policies to improve the retail food environment. While participants noted potential legal and implementation complexities, revising the structure of the tax code to provide incentives for retailers to invest in healthy food marketing while also using the tax code to disincentivize unhealthy food marketing was an area of future research and inquiry that numerous stakeholders suggested should be a priority to create consistent policies that promote healthy food marketing and healthy food environments.

Table 6 presents key considerations that retailers and policymakers should prioritize when designing strategies to improve food retail environments. For all of the policy recommendations in this report, and for any other actions to strengthen retail food environments to make it easier for consumers to access healthier foods, it is imperative that steps are taken to prioritize equity and minimize unintended harms to communities and consumers.

Table 6. Key considerations for policies and strategies to promote healthy retail food environments

Any policy, voluntary actions, or incentive strategies to improve in-store or online retail food environments and promote healthier foods must:
<p>Prioritize health equity during policy development and implementation. Structural racism has created inequitable food environments that contribute to a range of health disparities for people with low-incomes and Black, Indigenous, and Latine communities. Any efforts to improve the retail food environment and incentivize marketing of healthy food must be designed in such a way that benefits the community and avoids potential unintended consequences that reinforce, contribute to, or worsen inequitable food environments. On the path to racial justice and removing longstanding inequities, policymakers and advocates should ensure resources are allocated equitably in order to ensure priority populations have the resources necessary to be well-nourished and fed.</p>
<p>Consider that multiple, integrated approaches will be needed. There is no one silver bullet strategy; multiple and synergistic approaches addressing product, placement, pricing, and promotion are required to address different aspects of the retail food environment.</p>
<p>Be legally feasible. Policies undertaken by the government must be viable via either the legislation process, a rulemaking, or a voluntary guidance and, if mandatory, must not infringe on food retailer and manufacturer commercial free speech rights under the First Amendment.</p>
<p>Be mindful of potentially disincentivizing stores from accepting SNAP. This is particularly important in rural communities where access is already limited. For example, onerous stocking standards could disincentivize some, particularly smaller, retailers from accepting SNAP benefits thereby reducing access to stores that accept SNAP benefits.</p>
<p>Be mindful of the need to take a tiered approach to policies that would affect different types of retailers. A large grocery chain may be more easily able to adapt to certain regulations compared to a small independent store.</p>
<p>Engage food manufacturers and retailers when developing healthy retail strategies. Many food companies already have “better for you” products in their product lines that could be promoted in stores and online. For example, promoting water or unsweetened beverages instead of sugar-sweetened beverages on endcaps could represent ‘low hanging fruit’ for improving the retail food environment within the bounds of existing marketing agreements between manufacturers and retailers.</p>
<p>Seek ‘buy-in’ from retailers for healthy retail strategies. There can be a negative feedback loop in which retailers do not believe customers want healthier options and could therefore try to avoid compliance with healthy food promotion regulations. Getting ‘buy-in’ from retailers promotes higher uptake of incentives and greater compliance with the spirit, and not just the letter, of regulations.</p>
<p>Involve SNAP participants in developing policies and strategies. It is important that SNAP participants’ opinions and perspectives be considered early in the process and that they be included as a valuable stakeholder voice.</p>
<p>Consider tradeoffs between promotion of healthy foods and beverages versus regulating promotion of unhealthy options. It will be important to consider possible challenges in policy formulation, legal feasibility, and potential behavior change and health impact based on strategies focusing on promotion of healthy foods and beverages or strategies regulating or limiting promotion of unhealthy foods and beverages. More research may be needed to inform these considerations.</p>
<p>Address implementation, monitoring, and enforcement. It is critical to consider how any healthy food retail strategy, whether voluntary, incentive, or policy mandate, will be implemented, monitored, and enforced. Who will be responsible for monitoring compliance and enforcement? What will be the consequence for non-compliance? Will there be adequate funding and resources for implementation, monitoring, and enforcement?</p>

RESEARCH RECOMMENDATIONS

Seven key areas for future research emerged from the convening (Table 7). Importantly, research is needed to understand how policies targeting the retail food environment can advance equitable food access without exacerbating existing disparities. Mixed-methods research and equity-focused evaluations of pilot interventions, including those relevant to proposed SNAP program and policy changes, will play a pivotal role in identifying potential challenges as well as strategies for supporting equitable policy development and implementation.

Retailer input can also help inform effective implementation. However, there is limited research exploring retailers' experiences with programs to improve the retail food environment. Research and pilots are needed across diverse settings to understand how

policy can support healthy food retail in a variety of retailer types (e.g., convenience stores, supermarkets, dollar stores, online retailers). Likewise, there is comparatively little evidence regarding effective strategies for promoting healthy food purchases in the online setting compared to brick-and-mortar retailers. Research is needed to compare the effectiveness of different healthy online retail strategies, as well as innovative ways technology can be leveraged (e.g., personalized recommendations or search filters for healthy products) to promote healthier food choices.

While nutrition education is commonly included in retail food environment interventions, further research is needed to identify which strategies are most cost-effective, scalable, and have the greatest impact on purchasing. Though in-store nutrition education has typically occurred face-

Table 7. Areas for further research on improving the healthfulness of the retail food environment

Key research areas	Research questions to inform policy development	Possible strategies
1) Equity	<ol style="list-style-type: none"> 1. How do changes to SNAP-authorized retailer requirements impact economic and health equity? How does impact differ across retailer type (e.g., small vs. large) and community (e.g., urban vs. rural)? 2. What technical assistance is needed to overcome barriers to implement stronger SNAP-authorized retailer requirements? 3. Do nutrition classification systems disproportionately affect culturally relevant foods for some groups more so than others? If so, to what extent, and how can an evidence-based system be adapted? 	<ol style="list-style-type: none"> 1. Conduct pilot studies in diverse settings to test impacts of strengthening SNAP-authorized retailer requirements. 2. Develop and pilot test technical assistance as part of policy development for SNAP retailer requirements. 3. Evaluate equity impacts as part of ongoing research in retail food environment interventions.
2) SNAP	<ol style="list-style-type: none"> 1. How, if at all, does allowing SNAP benefits to be used to purchase hot, prepared foods in retail settings impact diet quality of people using SNAP? 2. How does SNAP benefit redemption and food purchasing behavior differ in in-store versus online retail settings? 3. What role can SNAP-Ed play in the in-store and online retail setting? 4. How can marketing strategies be used to promote food products eligible for SNAP incentives (e.g., GusNIP) in the in-store and online retail setting? 	<ol style="list-style-type: none"> 1. Conduct pilot studies allowing people who use SNAP to purchase hot, prepared foods and evaluate the impact on participant diet quality. 2. Partner with in-store and online retailers to evaluate SNAP participant purchasing and benefit redemption data to understand differences by retail environment. 3. Implement a demonstration project with a SNAP-Ed implementing agency to test SNAP-Ed curriculum in an online retail setting. 4. Conduct pilot studies to evaluate the use and effectiveness of marketing strategies for products eligible for SNAP incentives on changes in participant shopping and purchasing behavior.

3) Retailer	<ol style="list-style-type: none"> 1. How does implementation of various healthy retail marketing strategies impact quantitative measures of retailer performance? 2. How do retailers perceive the feasibility and acceptability of proposed retail food environment policy recommendations, and how do perceptions vary by retailer type, geography, and other retailer characteristics? 3. How does effectiveness of healthy retail food marketing strategies vary across retailer types and other retailer characteristics? 4. How are consumer satisfaction, loyalty, and perceptions of quality, safety, and affordability impacted after retailers implement healthy retail marketing strategies in their stores? 	<ol style="list-style-type: none"> 1. Conduct evaluations of various healthy marketing strategies, in isolation and combined, in partnership with retailers to assess effects on sales. 2. Conduct qualitative research and surveys with a variety of current retailers to understand barriers and facilitators to implementing proposed retail food environment policy recommendations. 3. Include qualitative component with retailers during retail food environment interventions to understand experiences of retailers implementing interventions.
4) Online shopping	<ol style="list-style-type: none"> 1. What online retail marketing strategies are most effective at promoting healthy shopping behaviors? 2. How can smart technology be leveraged to customize the online food shopping experience and prompt healthier shopping behaviors online? 	Conduct pilot studies in real-world and simulation online shopping environments to compare impacts of different online retail marketing strategies, in isolation and combined, on consumer shopping behavior.
5) Nutrition education	<ol style="list-style-type: none"> 1. What is the comparative effectiveness of different in-store nutrition education strategies on purchasing behaviors? 2. How can smart technology be used to supplement or substitute in-store nutrition education to encourage healthier shopping behaviors? 	Conduct comparative effectiveness trials for different nutrition education interventions in retail settings.
6) Nutrition criteria	<ol style="list-style-type: none"> 1. How should “healthy” be defined and scored to best align with current nutrition evidence for health promotion and disease prevention while maintaining legal objectivity? 2. What is the comparative effectiveness of different nutrition classification systems on changing purchasing behaviors and dietary intake? 3. What messaging and labeling strategies are most effective for communicating a nutrition classification system to consumers within the retail food environment? 4. How can a nutrition classification system be communicated equitably such that it is interpreted similarly across diverse groups? 	<ol style="list-style-type: none"> 1. Convene experts in the field of nutrition and diet-related disease prevention to develop recommendations for developing and implementing unified nutrition criteria. 2. Implement nutrition criteria to identify items to be included/excluded for healthy marketing. 3. Test effectiveness of promoting healthy food and beverage choices using different labeling strategies in both in-store and online retail settings. 4. Compare the effectiveness, in isolation and combined, of incentivizing healthy foods and disincentivizing unhealthy foods on diet and related health outcomes. 5. Conduct cognitive testing studies to understand how different groups interpret various nutrition classification systems.
7) Implementation	<ol style="list-style-type: none"> 1. How do policies to improve healthy retail food marketing impact key outcomes including consumer purchasing and consumption? 2. What factors influence the implementation of policies to improve healthfulness of retail food environment? 	<ol style="list-style-type: none"> 1. Conduct process and impact evaluations of municipal policies and field studies in laboratory stores to understand compliance with and impacts of policies. 2. Identify barriers and facilitators to successful implementation of policies

to-face, technology may be able to support lower-cost nutrition education via novel solutions such as label-scanning technology or other advances that allow consumers to get real-time answers to nutrition-related questions. However, research is needed to understand the acceptability and feasibility of such approaches.

Additionally, it will be challenging to scale the numerous healthy retail food environment strategies discussed in this report without a commonly adopted definition of what foods and beverages qualify as healthy. Research is needed to compare the impact of different nutrition classification systems and other nutrition criteria on purchasing behaviors and dietary intake and identify which messaging and labeling strategies are most effective for communicating this nutrition information to consumers. Comparing existing systems and developing a common nutrition classification system should be the focus of a future convening of experts in the field of nutrition and diet-related disease prevention. Ultimately, the nutrition criteria used for policy recommendations must be evidence-based and effective, but also feasible from legal and retailer perspectives. Nutrition criteria must be considered purely factual, and in no way subjective, in order to be upheld under the First Amendment. Additionally, tradeoffs should be considered between nutrition criteria effectiveness and retailer implementation. While a holistic definition of healthy may be most effective in changing consumer healthy eating behaviors, it may be easier for retailers to implement more simplistic standards by food categories (e.g., sugar-sweetened beverages) or nutrient criteria that are clearly listed on products (e.g., calories, sodium, added sugar, saturated fat). Further, research is needed to understand how interventions function in isolation, as well as in combination with other approaches. Since a multi-pronged approach will likely be required for improving healthy food purchasing and dietary intake, such research will help identify salient sets of strategies, and whether different combinations of approaches may be required in different settings.

Lastly, when policies that create a healthier retail food environment are implemented, process and impact evaluations should be conducted to assess policy compliance and impact on outcomes of interest.

IX. Conclusion

In this report we make ten recommendations for policy changes to support healthy food marketing and healthy retail food environments with the aim of helping all shoppers, and SNAP participants in particular, to identify, access, and choose healthier foods and beverages when shopping for food. These ten recommendations leverage the size and reach of SNAP and can be advanced via the 2023 Farm Bill and other legislative and regulatory policy opportunities. The recommendations fall into six categories: 1) SNAP-authorized retailer requirements; 2) research pilots; 3) grant programs; 4) nutrition education; 5) voluntary rules; and 6) recognition programs. We also make recommendations to further strengthen SNAP and help participants afford and access healthy foods. Finally, we identify key areas for additional research to continue to build the evidence base to inform future policy action.

The retail food environment is an important determinant of food and beverage choices and diet quality. Furthermore, marketing of unhealthy food and beverages, which is ubiquitous in in-store and online retail food environments, makes it more difficult for shoppers to purchase healthy items. Meanwhile, healthy foods are placed less prominently, are often not priced as competitively, and are not promoted as aggressively as unhealthy foods and beverages. Nearly 260,000 retailers across the United States accept SNAP benefits. Leveraging SNAP and the farm bill to require SNAP retailers to strengthen retailer stocking and marketing standards, fund research pilots and grant programs for healthy food marketing interventions, allow flexibility for SNAP-Ed funded nutrition education in retail settings, invest in research to create a voluntary nutrition classification system, and recognize retailers who are prioritizing health and health equity will be concrete steps forward towards creating healthier retail food environments.

It is important to recognize that the policy recommendations included in this report are not a silver bullet solution. There are numerous considerations and interrelated factors that shape food access, food choices, food marketing, and in-store and online retail food environments. Structural and historical racism, economic disparities, the built environment, and other

structural factors contribute to disparities in access to healthy food and a wide spectrum of health inequities and health disparities. Additional policy changes to SNAP are needed to address inadequate benefit levels, restrictions on purchasing hot foods, and other changes to help program participants afford and access healthy foods of their choice. More research is also needed to help identify policies, programs, and voluntary strategies that help consumers make healthy food choices while also addressing inequitable access to high quality, affordable, healthy foods and beverages. The recommendations included in this report, if implemented, can create environments in which it is easier for all shoppers to make healthy food and beverage choices.

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DISCLAIMER

The views put forth in this report and corresponding executive summary are by the authors and do not necessarily represent the views of HER, or Johns Hopkins University. Participation in the convening does not reflect an endorsement of this report. CSPI intends to use the report recommendations to develop an organizational strategy going forward, but the report does not reflect an organizational strategic plan in its current state.

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XI. References

- ¹ Johnson R, Monke J. *Farm Bill Primer: What Is the Farm Bill?* 2023. <https://crsreports.congress.gov/product/pdf/IF/IF12047>
- ² Turner C, Aggarwal A, Walls H, et al. Concepts and critical perspectives for food environment research: A global framework with implications for action in low- and middle-income countries. *Global Food Security*. 2018/09/01/ 2018;18:93-101. doi:<https://doi.org/10.1016/j.gfs.2018.08.003>
- ³ American Marketing Association. The Four Ps of Marketing. <https://www.ama.org/marketing-news/the-four-ps-of-marketing/>
- ⁴ U.S. Department of Agriculture National Institute of Food and Agriculture. Gus Schumacher Nutrition Incentive Program (GusNIP). Accessed July 10, 2023. <https://www.nifa.usda.gov/grants/programs/hunger-food-security-programs/gus-schumacher-nutrition-incentive-program>
- ⁵ Braveman PA, Kumanyika S, Fielding J, et al. Health disparities and health equity: the issue is justice. *Am J Public Health*. Dec 2011;101 Suppl 1(Suppl 1):S149-55. doi:10.2105/ajph.2010.300062
- ⁶ U.S. Department of Agriculture and U.S. Department of Health and Human Services. *Dietary Guidelines for Americans, 2020-2025*. 2020.
- ⁷ U.S. Department of Agriculture Rural Development. Healthy Food Financing Initiative Accessed May 23, 2023. <https://www.rd.usda.gov/about-rd/initiatives/healthy-food-financing-initiative>
- ⁸ U.S. Department of Agriculture Food and Nutrition Service. Supplemental Nutrition Assistance Program (SNAP) Store Eligibility Requirements Updated March 3, 2022. Accessed March 15, 2022. <https://www.fns.usda.gov/snap/retailer/eligible>
- ⁹ U.S. Department of Agriculture Food and Nutrition Service. *FY 2024 Supplemental Nutrition Assistance Program Education (SNAP-Ed) Plan Guidance Nutrition Education and Obesity Prevention Grant Program* 2023. <https://snaped.prod.usda.gov/sites/default/files/documents/FY%202024%20Supplemental%20Nutrition%20Assistance%20Program%20Education%20%28SNAP-Ed%29%20Plan%20Guidance%2C%20Nutrition%20Education%20and%20Obesity%20Prevention%20Program.pdf>
- ¹⁰ U.S. Department of Agriculture Food and Nutrition Service. What Can SNAP Buy? Accessed July 10, 2023. <https://www.fns.usda.gov/snap/eligible-food-items>
- ¹¹ Congressional Research Service. *Supplemental Nutrition Assistance Program (SNAP): A Primer on Eligibility and Benefits*. 2022. <https://crsreports.congress.gov/product/pdf/R/R42505>
- ¹² Centers for Disease Control and Prevention. About Chronic Disease. Updated July 21, 2022. Accessed May 11, 2023. <https://www.cdc.gov/chronicdisease/about/index.htm#:~:text=Poor%20nutrition%2C%20including%20diets%20low,Physical%20inactivity>
- ¹³ Centers for Disease Control and Prevention. Poor Nutrition. Accessed July 10, 2023. <https://www.cdc.gov/chronicdisease/resources/publications/factsheets/nutrition.htm>
- ¹⁴ Tsao CW, Aday AW, Almarazooq ZI, et al. Heart Disease and Stroke Statistics—2022 Update: A Report From the American Heart Association. *Circulation*. 2022;145(8):e153-e639. doi:10.1161/CIR.0000000000001052
- ¹⁵ Centers for Disease Control and Prevention. National Diabetes Statistics Report. Accessed April 27, 2023. <https://www.cdc.gov/diabetes/data/statistics-report/appendix.html#tabs-1-3>
- ¹⁶ Osthega Y, Fryar C, Nwankwo T, Nguyen D. *Hypertension prevalence among adults aged 18 and over: United States, 2017–2018*. Vol. NCHS Data Brief, no 364. 2020. <https://www.cdc.gov/nchs/data/databriefs/db364-h.pdf>
- ¹⁷ National Center for Health Statistics. *Health, United States, 2019*. 2021. <https://stacks.cdc.gov/view/cdc/100685>
- ¹⁸ Coleman-Jensen A, Rabbit MP, Gregory CA, Singh A. *Household Food Security in the United States in 2021*. Vol. Economic Research Report Number 309. 2022. <https://www.ers.usda.gov/webdocs/publications/104656/err-309.pdf?v=9296>
- ¹⁹ Gundersen C, Ziliak JP. Food Insecurity And Health Outcomes. *Health Affairs*. 2015/11/01 2015;34(11):1830-1839. doi:10.1377/hlthaff.2015.0645
- ²⁰ Gearing M, Dixit-Joshi S, May L. *Barriers that Constrain the Adequacy of Supplemental Nutrition Assistance Program (SNAP) Allotments: Survey Findings*. 2021. <https://fns-prod.azureedge.us/sites/default/files/resource-files/SNAP-Barriers-SurveyFindings.pdf>
- ²¹ U.S. Department of Agriculture Food and Nutrition Service. Supplemental Nutrition Assistance Program Participation and Costs. <https://fns-prod.azureedge.us/sites/default/files/resource-files/SNAPsummary-5.pdf>
- ²² Mancino L, Guthrie J, Ver Ploeg M, Biing-Hwan L. *Nutritional Quality of Foods Acquired by Americans: Findings From USDA's National Household Food Acquisition and Purchase Survey, EIB-188*. 2018. <https://www.ers.usda.gov/webdocs/publications/87531/eib-188.pdf?v=7662.4>
- ²³ Superfood Digital. 2020 Online Grocery Shopping Statistics: Pre and Post COVID-19. Accessed May 11, 2023. <https://superfood.digital/online-grocery-store-ecommerce-statistics/>
- ²⁴ Brenan M. In-Person Grocery Shopping Rebounds in U.S.; Online Also Up. Accessed May 11, 2023. <https://news.gallup.com/poll/397706/person-grocery-shopping-rebounds-online.aspx>
- ²⁵ Jordan J. Online Supplemental Nutrition Assistance Program (SNAP) Purchasing Grew Substantially in 2020. Accessed May 24, 2023. <https://www.ers.usda.gov/amber-waves/2021/july/online-supplemental-nutrition-assistance-program-snap-purchasing-grew-substantially-in-2020/>
- ²⁶ U.S. Department of Agriculture Food and Nutrition Service. Stores Accepting SNAP Online. Accessed May 11, 2023. <https://www.fns.usda.gov/snap/online-purchasing-pilot>
- ²⁷ Brandt EJ, Silvestri DM, Mande JR, Holland ML, Ross JS. Availability of Grocery Delivery to Food Deserts in States Participating in the Online Purchase Pilot. *JAMA Network Open*. 2019;2(12):e1916444-e1916444. doi:10.1001/jamanetworkopen.2019.16444
- ²⁸ Powell LM, Slater S, Mirtcheva D, Bao Y, Chaloupka FJ. Food store availability and neighborhood characteristics in the United States. *Preventive Medicine*. 2007/03/01/ 2007;44(3):189-195. doi:<https://doi.org/10.1016/j.ypmed.2006.08.008>
- ²⁹ Rivlin G. *Rigged: Supermarket Shelves for Sale*. 2016. https://www.cspinet.org/sites/default/files/media/documents/misc/CSPI_Rigged_4_small.pdf
- ³⁰ Petimar J, Moran AJ, Grummon AH, et al. In-store marketing and supermarket purchases: associations overall and by transaction SNAP status. *Am J Prev Med*. Mar 4 2023;doi:10.1016/j.amepre.2023.02.029
- ³¹ Moran AJ, Headrick G, Perez C, et al. Food Marketing Practices of Major Online Grocery Retailers in the United States, 2019-2020. *J Acad Nutr Diet*. Dec 2022;122(12):2295-2310.e2. doi:10.1016/j.jand.2022.04.003
- ³² Abratt R, Goodey SD. Unplanned buying and in-store stimuli in supermarkets. *Managerial and Decision Economics*. 1990;11(2):111-121. doi:<https://doi.org/10.1002/mde.4090110204>
- ³³ UConn Rudd Center. *Food advertising to Hispanic and Black youth: Contributing to health disparities*. 2015. https://media.ruddcenter.uconn.edu/PDFs/272-7%20%20Rudd_Targeted%20Marketing%20Report_Release_081115.pdf
- ³⁴ Hecht AA, Lott MM, Arm K, et al. Developing a National Research Agenda to Support Healthy Food Retail. *Int J Environ Res Public Health*. Nov 4 2020;17(21)doi:10.3390/ijerph17218141
- ³⁵ Biden-Harris Administration National Strategy on Hunger, Nutrition, and Health. 2022. <https://www.whitehouse.gov/wp-content/uploads/2022/09/White-House-National-Strategy-on-Hunger-Nutrition-and-Health-FINAL.pdf>
- ³⁶ Agricultural Improvement Act of 2018 P.L. 115-334. <https://www.congress.gov/bill/115th-congress/house-bill/2>
- ³⁷ U.S. Department of Agriculture Economic Research Service. Farm Bill Spending. Accessed July 18, 2023. <https://www.ers.usda.gov/topics/farm-economy/farm-commodity-policy/farm-bill-spending/#:~:text=The%20Agriculture%20Improvement%20Act%20of,%20Dyear%20period%202019%E2%80%9323>
- ³⁸ U.S. Department of Agriculture Food and Nutrition Service. SNAP Retailer Data: 2022 Year End Summary. <https://www.fns.usda.gov/data/snap-retailer-management-dashboard>

- ³⁹ Cameron AJ, Charlton E, Ngan WW, Sacks G. A Systematic Review of the Effectiveness of Supermarket-Based Interventions Involving Product, Promotion, or Place on the Healthiness of Consumer Purchases. *Current Nutrition Reports*. 2016/09/01 2016;5(3):129-138. doi:10.1007/s13668-016-0172-8
- ⁴⁰ Karpyn A, McCallops K, Wolgast H, Glanz K. Improving Consumption and Purchases of Healthier Foods in Retail Environments: A Systematic Review. *International Journal of Environmental Research and Public Health*. 2020;17(20):7524.
- ⁴¹ U.S. Department of Agriculture Food and Nutrition Service. Supplemental Nutrition Assistance Program (SNAP): Is My Store Eligible? Accessed May 24, 2023. <https://www.fns.usda.gov/snap/retailer/eligible>
- ⁴² U.S. Census Bureau. Advanced Monthly Sales for Retail and Food Services: Food and Beverage Stores. [https://www.census.gov/econ/currentdata/?programCode=MARTS&startYear=1992&endYear=2023&categories\[\]=445&dataType=SM&geoLevel=US&adjustd=1¬Adjusted=1&errorData=0#table-results](https://www.census.gov/econ/currentdata/?programCode=MARTS&startYear=1992&endYear=2023&categories[]=445&dataType=SM&geoLevel=US&adjustd=1¬Adjusted=1&errorData=0#table-results)
- ⁴³ Moran AJ, Musicus A, Gorski Findling MT, et al. Increases in Sugary Drink Marketing During Supplemental Nutrition Assistance Program Benefit Issuance in New York. *American Journal of Preventive Medicine*. 2018/07/01/ 2018;55(1):55-62. doi:<https://doi.org/10.1016/j.amepre.2018.03.012>
- ⁴⁴ World Health Organization. *Food marketing exposure and power and their associations with food-related attitudes, beliefs and behaviours: a narrative review*. 2022. <https://www.who.int/publications/i/item/9789240041783>
- ⁴⁵ Kim M, Budd N, Batorsky B, et al. Barriers to and Facilitators of Stocking Healthy Food Options: Viewpoints of Baltimore City Small Storeowners. *Ecol Food Nutr*. Jan-Feb 2017;56(1):17-30. doi:10.1080/03670244.2016.1246361
- ⁴⁶ Khandpur N, Zatz LY, Bleich SN, et al. Supermarkets in Cyberspace: A Conceptual Framework to Capture the Influence of Online Food Retail Environments on Consumer Behavior. *Int J Environ Res Public Health*. Nov 20 2020;17(22):doi:10.3390/ijerph17228639
- ⁴⁷ Harvey D. Urban food co-op tackles economic empowerment. *Race, Poverty & the Environment*. 2009;16(2):75-77.
- ⁴⁸ John S, Winkler MR, Kaur R, et al. Balancing Mission and Margins: What Makes Healthy Community Food Stores Successful. *International Journal of Environmental Research and Public Health*. 2022;19(14):8470.
- ⁴⁹ Ayala GX, D'Angelo H, Gittelsohn J, et al. Who is behind the stocking of energy-dense foods and beverages in small stores? The importance of food and beverage distributors. *Public Health Nutrition*. 2017;20(18):3333-3342. doi:10.1017/S1368980016003621
- ⁵⁰ Imtiyaz H, Soni P, Yukongdi V. Investigating the Role of Psychological, Social, Religious and Ethical Determinants on Consumers' Purchase Intention and Consumption of Convenience Food. *Foods*. 2021;10(2):237.
- ⁵¹ Committee on Examination of the Adequacy of Food Resources and SNAP Allotments; Food and Nutrition Board; Committee on National Statistics; Institute of Medicine; National Research Council. *Supplemental Nutrition Assistance Program: Examining the Evidence to Define Benefit Adequacy*. 2013. <https://www.ncbi.nlm.nih.gov/books/NBK206912/>
- ⁵² Spronk I, Kullen C, Burdon C, O'Connor H. Relationship between nutrition knowledge and dietary intake. *Br J Nutr*. May 28 2014;111(10):1713-26. doi:10.1017/s0007114514000087
- ⁵³ Wolfson JA, Lahne J, Raj M, Insolera N, Lavelle F, Dean M. Food Agency in the United States: Associations with Cooking Behavior and Dietary Intake. *Nutrients*. 2020;12(3):877.
- ⁵⁴ Miller A, Steinle N. Barriers to healthy eating in the elderly; a national and global perspective. *J Hum Nutr Food Sci*. 2020;8:1130.
- ⁵⁵ Rahkovsky I, Jo Y, Carlson A. *Consumers Balance Time and Money in Purchasing Convenience Foods*. 2018. <https://www.ers.usda.gov/webdocs/publications/89344/err-251.pdf?v=0>
- ⁵⁶ Appelhans BM, French SA, Tangney CC, Powell LM, Wang Y. To what extent do food purchases reflect shoppers' diet quality and nutrient intake? *International Journal of Behavioral Nutrition and Physical Activity*. 2017/04/11 2017;14(1):46. doi:10.1186/s12966-017-0502-2
- ⁵⁷ Ghazaryan A, Carlson A, Rhone AY, Roy K. Association between the Nutritional Quality of Household At-Home Food Purchases and Chronic Diseases and Risk Factors in the United States, 2015. *Nutrients*. 2021;13(9):3260.
- ⁵⁸ Schwingshackl L, Hoffmann G. Diet quality as assessed by the Healthy Eating Index, the Alternate Healthy Eating Index, the Dietary Approaches to Stop Hypertension score, and health outcomes: a systematic review and meta-analysis of cohort studies. *J Acad Nutr Diet*. May 2015;115(5):780-800.e5. doi:10.1016/j.jand.2014.12.009
- ⁵⁹ Pitt E, Gallegos D, Comans T, Cameron C, Thornton L. Exploring the influence of local food environments on food behaviours: a systematic review of qualitative literature. *Public Health Nutr*. Sep 2017;20(13):2393-2405. doi:10.1017/s1368980017001069
- ⁶⁰ Sawyer ADM, van Lenthe F, Kamphuis CBM, et al. Dynamics of the complex food environment underlying dietary intake in low-income groups: a systems map of associations extracted from a systematic umbrella literature review. *International Journal of Behavioral Nutrition and Physical Activity*. 2021/07/13 2021;18(1):96. doi:10.1186/s12966-021-01164-1
- ⁶¹ Moran AJ, Gu Y, Clynes S, Goheer A, Roberto CA, Palmer A. Associations between Governmental Policies to Improve the Nutritional Quality of Supermarket Purchases and Individual, Retailer, and Community Health Outcomes: An Integrative Review. *Int J Environ Res Public Health*. Oct 15 2020;17(20):doi:10.3390/ijerph17207493
- ⁶² Bleich SN, Sullivan K, Broad Leib E, et al. *Strengthening the Public Health Impacts of SNAP: Key Opportunities for the Next Farm Bill*. 2021.
- ⁶³ Wolgast H, Halverson M, Kennedy N, Gallard I, Karpyn A. *Which Healthy Food Promotion Strategies Within Grocery Retail Settings Are Most Promising?* 2022. https://healthyeatingresearch.org/wp-content/uploads/2023/02/Brief_Healthy_Foods_v2.pdf
- ⁶⁴ Pomeranz JL. Policy Opportunities and Legal Considerations to Reform SNAP-Authorized Food Retail Environments. *Journal of Public Health Management and Practice*. 2023;
- ⁶⁵ Bresnahan C, Tucker AC, John S, Johnson J, Nelms A, Wolfson J. Support for policies and strategies to promote healthy food retail in-store and online: Perspectives from a national sample of Supplemental Nutrition Assistance Program (SNAP) participants. *Under review*.
- ⁶⁶ Center for Science in the Public Interest. *SNAP Purchasing Power*. 2022. https://www.cspinet.org/sites/default/files/2022-03/SNAP_Purchasing_Power_2.pdf
- ⁶⁷ U.S. Department of Agriculture Food and Nutrition Service. SNAP and the Thrifty Food Plan. Accessed May 11, 2023. <https://www.fns.usda.gov/snap/thriftyfoodplan>
- ⁶⁸ U.S. Department of Agriculture. Thrifty Food Plan Re-Evaluation Puts Nutrition in Reach for SNAP Participants. <https://www.usda.gov/media/blog/2021/08/30/thrifty-food-plan-re-evaluation-puts-nutrition-reach-snap-participants>. Accessed May 30, 2023. <https://www.usda.gov/media/blog/2021/08/30/thrifty-food-plan-re-evaluation-puts-nutrition-reach-snap-participants>
- ⁶⁹ Leung CW, Wolfson JA. The impact of the 2021 Thrifty Food Plan benefit re-evaluation on SNAP participants' short-term food security and health outcomes. *Front Public Health*. 2023;11:1142577. doi:10.3389/fpubh.2023.1142577
- ⁷⁰ Rosenbaum D, Bergh K, Hall L. *Temporary Pandemic SNAP Benefits Will End in Remaining 35 States in March 2023*. 2023. <https://www.cbpp.org/research/food-assistance/temporary-pandemic-snap-benefits-will-end-in-remaining-35-states-in-march>
- ⁷¹ National Alliance for Nutrition and Activity. 2023 Farm Bill: Nutrition Security Recommendations. Accessed May 19, 2023. <https://www.cspinet.org/sites/default/files/2023-02/02-13-23%20NANA%20Combined%20Farm%20Bill%20Priorities%20Signed.pdf>
- ⁷² Guardia L, Lacko A. To End Hunger, We Must End Stigma. Accessed May 11, 2023. <https://frac.org/blog/endhungerendstigma>
- ⁷³ Schanzenbach DW. Pros and cons of restricting SNAP purchases. Accessed June 5, 2023. <https://www.brookings.edu/testimonies/pros-and-cons-of-restricting-snap-purchases/>
- ⁷⁴ You W, Davis GC. Estimating dual headed time in food production with implications for SNAP benefit adequacy. *Review of Economics of the Household*. 2019/03/01 2019;17(1):249-266. doi:10.1007/s11150-018-9403-7
- ⁷⁵ Center for Science in the Public Interest. *SNAP and the Food Retail Environment*. 2022. https://www.cspinet.org/sites/default/files/2022-03/SNAP_and_the_Food_Environment_v3.pdf
- ⁷⁶ Moran A, Headrick G, Khandpur N. *Promoting Equitable Expansion of the SNAP Online Purchasing Pilot*. 2021. <https://healthyeatingresearch.org/wp-content/uploads/2021/07/HER-Online-Purchasing-Brief-FINAL.pdf>

- 77 Foster IS, Liu SY, Hoffs CT, LeBoa C, Chen AS, Rummo PE. Disparities in SNAP online grocery delivery and implementation: Lessons learned from California during the 2020-21 COVID pandemic. *Health Place*. Jul 2022;76:102811. doi:10.1016/j.healthplace.2022.102811
- 78 Headrick G, Khandpur N, Perez C, et al. Content Analysis of Online Grocery Retail Policies and Practices Affecting Healthy Food Access. *J Nutr Educ Behav*. Mar 2022;54(3):219-229. doi:10.1016/j.jneb.2021.09.006
- 79 Ali SH, Lloyd-Montgomery J, Lowery CM, Vedovato GM, Trude ACB. Equity-Promoting Strategies in Online Grocery Shopping: Recommendations Provided by Households of Low Income. *Journal of Nutrition Education and Behavior*. 2022/11/01/ 2022;54(11):998-1010. doi:https://doi.org/10.1016/j.jneb.2022.08.007
- 80 Harper K, Lewis E, Gittelsohn J. Exploring Accessibility of Culturally Relevant Foods in a Low-Income Neighborhood in Baltimore City. *Current Developments in Nutrition*. 2020;4(Supplement_2):525-525. doi:10.1093/cdn/nzaa046_025
- 81 U.S. Senate. Appropriations. Accessed August 2, 2023. https://www.senate.gov/reference/reference_index_subjects/Appropriations_vrd.htm
- 82 U.S. Congress. The Intersection Between the Hatch Act and Appropriations Laws. Accessed August 2, 2023. <https://www.congress.gov/116/meeting/house/109706/documents/HHRG-116-GO00-20190626-SD012.pdf>
- 83 Consolidated Appropriations Act, 2022. P.L. 117-103. <https://www.congress.gov/bills/117th-congress/house-bill/2471/text/2022>.
- 84 Caspi CE, Pelletier JE, Harnack L, Erickson DJ, Laska MN. Differences in healthy food supply and stocking practices between small grocery stores, gas-marts, pharmacies and dollar stores. *Public Health Nutrition*. 2016;19(3):540-547. doi:10.1017/S1368980015002724
- 85 Minovi D, Munch J, Snyder E. *Soda on Display: A Pilot Study of Sugary Drink Placement and Promotion in Grocery Stores in the Washington, DC Area*. 2021. https://www.cspinet.org/sites/default/files/2022-02/inStoreSSBAAssessment_2_093021.pdf
- 86 McCarthy J, Minovi D, Wootan MG. *Scroll and Shop: Food Marketing Migrates Online*. 2020. https://www.cspinet.org/sites/default/files/2022-02/Scroll_and_Shop_report_0.pdf
- 87 Pomeranz JL, Cash SB, Springer M, Del Giudice IM, Mozaffarian D. Opportunities to address the failure of online food retailers to ensure access to required food labelling information in the USA. *Public Health Nutr*. Jan 24 2022;25(5):1-9. doi:10.1017/s1368980021004638
- 88 U.S. Department of Agriculture Food and Nutrition Service. Retailer Eligibility – Need for Access Consideration for Firms that Fail to Meet Criterion A or B. Retailer Policy and Management Division, SNAP, Policy Memorandum 2018-032020.
- 89 Glanz K, Sallis JF, Saelens BE, Frank LD. Nutrition Environment Measures Survey in Stores (NEMS-S): Development and Evaluation. *American Journal of Preventive Medicine*. 2007/04/01/ 2007;32(4):282-289. doi:https://doi.org/10.1016/j.amepre.2006.12.019
- 90 Castner L, Wakar B, Wroblewska K, Tripp C, Cole N. *Benefit Redemption Patterns in the Supplemental Nutrition Assistance Program in Fiscal Year 2017 Final Report*. 2020. <https://fns-prod.azureedge.us/sites/default/files/resource-files/SNAPEBT-BenefitRedemption.pdf>
- 91 The Agricultural Act of 2014. P.L. 113-79. <https://www.congress.gov/bills/113th-congress/house-bill/2642>
- 92 U.S. Department of Agriculture Food and Nutrition Service. Enhancing Retailer Standards in the Supplemental Nutrition Assistance Program (SNAP) Clarification of Proposed Rule and Extension of Comment Period. <https://fns-prod.azureedge.us/sites/default/files/snap/SNAP-Retailer-Standards-Rule-Extension.pdf2016>.
- 93 U.S. Department of Agriculture Food and Nutrition Service. Enhancing Retailer Standards in the Supplemental Nutrition Assistance Program (SNAP). 7 CFR Parts 271 and 278. <https://www.govinfo.gov/content/pkg/FR-2016-12-15/pdf/2016-29837.pdf2016>.
- 94 Congressional Research Service. *Updated Standards for SNAP-Authorized Retailers*. 2017. https://www.everycrsreport.com/files/20170804_R44650_72842885b20e2bd0f7e16ded3811831fbb0dbe0.pdf
- 95 Powell LM, Singleton CR, Li Y, et al. Changes to SNAP-authorized retailer stocking requirements and the supply of foods and beverages in low-income communities in seven U.S. states. *Translational Behavioral Medicine*. 2019;9(5):857-864. doi:10.1093/tbm/ibz093
- 96 Andreyeva T, Luedicke J, Middleton AE, Long MW, Schwartz MB. Positive Influence of the Revised Special Supplemental Nutrition Program for Women, Infants, and Children Food Packages on Access to Healthy Foods. *Journal of the Academy of Nutrition and Dietetics*. 2012/06/01/ 2012;112(6):850-858. doi:https://doi.org/10.1016/j.jand.2012.02.019
- 97 Karpyn A, DeWeese RS, Pelletier JE, et al. Examining the Feasibility of Healthy Minimum Stocking Standards for Small Food Stores. *Journal of the Academy of Nutrition and Dietetics*. 2018/09/01/ 2018;118(9):1655-1663. doi:https://doi.org/10.1016/j.jand.2017.12.006
- 98 Andres J, Glickman DR, Sarasin L, Veneman AM. *Making Food and Nutrition Security a SNAP: Recommendations for the 2023 Farm Bill*. 2023. https://bipartisanpolicy.org/download/?file=/wp-content/uploads/2023/01/BPC-Health-Nutrition-Brief_Farm-BillV5.pdf
- 99 U.S. Department of Agriculture Food and Nutrition Service. SNAP Online Purchasing Pilot. Accessed April 4, 2023. <https://www.fns.usda.gov/snap/online-purchasing-pilot>
- 100 Zeballos E, Anekew TD. *The Association Between Nutrition Information Use and the Healthfulness of Food Acquisitions*. 2018. <https://ageconsearch.umn.edu/record/276241/>
- 101 Nutrition and Labeling Education Act of 1990. P.L. 101-535. <https://www.congress.gov/101/statute/STATUTE-104/STATUTE-104-Pg2353.pdf>.
- 102 Food Labeling Modernization Act of 2023. https://democrats-energycommerce.house.gov/sites/democrats.energycommerce.house.gov/files/documents/Pallone_Bill_Food%20Labeling%20Modernization%20Act.pdf.
- 103 U.S. Department of Agriculture Food and Nutrition Service. SNAP EBT Modernization Technical Assistance Center (SEMTAC). Accessed May 30, 2023. <https://www.fns.usda.gov/grant/snap-ebt-modernization-technical-assistance-center>
- 104 Food Labeling and Modernization Act sign-on letter. Accessed April 4, 2023. https://www.cspinet.org/sites/default/files/2022-02/FLMA%20sign-on%20letter_for%20website.pdf
- 105 Food Labeling Modernization Act Sign-On Letter. Accessed August 16, 2023. https://www.cspinet.org/sites/default/files/2023-06/FLMA%202023%20sign-on%20letter_final.pdf
- 106 Silberman L. Innovation and Evaluation in SNAP Demonstration Projects, 2018. Accessed May 19, 2023. <https://www.fns.usda.gov/snap/memo-introducing-innovation-and-evaluation-demonstrations>
- 107 U.S. Department of Agriculture Food and Nutrition Service. Fresh Fruit and Vegetable Program. Accessed May 19, 2023. <https://www.fns.usda.gov/ffvp/program-history>
- 108 Food and Nutrition Act of 2008. P.L. 110-246. <https://www.congress.gov/110/plaws/publ234/PLAW-110publ234.pdf>.
- 109 U.S. Department of Agriculture Food and Nutrition Service. Supplemental Nutrition Assistance Program (SNAP): Healthy Incentives Pilot. Accessed May 19, 2023. <https://www.fns.usda.gov/snap/hip#:~:text=The%20Food%2C%20Nutrition%20and%20Conservation,sale%20increase%20the%20purchase%20of>
- 110 Bartlett S, Klerman J, Olsho L, et al. *Evaluation of the Healthy Incentives Pilot (HIP): Final Report*. 2014. <https://fns-prod.azureedge.us/sites/default/files/ops/HIP-Final.pdf>
- 111 Olsho LE, Klerman JA, Wilde PE, Bartlett S. Financial Incentives Increase Fruit and Vegetable Intake among Supplemental Nutrition Assistance Program Participants: A Randomized Controlled Trial of the USDA Healthy Incentives Pilot. *Am J Clin Nutr*. Aug 2016;104(2):423-35. doi:10.3945/ajcn.115.129320
- 112 Gretchen Swanson Center for Nutrition. *Gus Schumacher Nutrition Incentive Program Training, Technical Assistance, Evaluation, and Information Center (GusNIP NTAE): Impact Findings Year 3*. 2023. <https://nutritionincentivehub.org/media/2uwl3ch/gusnip-y3-impact-findings-report.pdf>
- 113 Gordon E, Dawkins-Lyn N, Hogan-Yarbro R, et al. *Approaches for Promoting Healthy Food Purchases by SNAP Participants* 2014. <https://fns-prod.azureedge.us/sites/default/files/ICF-IHC-Final-Report-0714.pdf>
- 114 Buckingham-Schutt L, Johnson J, Schwartz C, Uram J, Daly E, Ramos C. *Strategies to Improve Healthy Eating in SNAP: An Iowa Perspective*. 2021. <https://harkinstitute.drake.edu/wp-content/uploads/sites/103/2021/01/SNAP-in-Iowa.pdf>

- ¹¹⁵ Congressional Research Service. *The USDA Healthy Food Financing Initiative*. 2022. <https://crsreports.congress.gov/product/pdf/IF/IF12214>
- ¹¹⁶ Reinvestment Fund Awards \$22.6 Million to Improve Healthy Food Access in Underserved Communities. 2022. <https://www.investinginfood.com/2021-awards-announcement/>
- ¹¹⁷ U.S. Department of Agriculture National Institute of Food and Agriculture. REQUEST FOR APPLICATIONS The Gus Schumacher Nutrition Incentive Program Competitive Grants Program. Accessed April 13, 2023. <https://www.nutritionincentivehub.org/media/nr0gnzo4/gusnip-2023-rfa-nutrition-incentive.pdf>
- ¹¹⁸ U.S. Department of Agriculture Food and Nutrition Service. Gus Schumacher Nutrition Incentive Program. Accessed May 19, 2023. <https://www.fns.usda.gov/snap/gusnip-grant-program>
- ¹¹⁹ Center for Science in the Public Interest, Healthy Food America. *Towards a More Equitable GusNIP Program*. 2022. <https://www.cspinet.org/resource/towards-more-equitable-gus-schumacher-nutrition-incentive-program-gusnip>
- ¹²⁰ John S, Lyerly R, Wilde P, Cohen ED, Lawson E, Nunn A. The Case for a National SNAP Fruit and Vegetable Incentive Program. *American Journal of Public Health*. 2021;111(1):27-29. doi:10.2105/ajph.2020.305987
- ¹²¹ National Grocers Association. 2023 Farm Bill. Accessed May 4, 2023. https://ci.criticalimpact.com/user/31823/image/2023_NGA_Farm_Bill_Letter_Final.pdf
- ¹²² National Sustainable Agriculture Coalition. Healthy Food Financing Initiative: Improving access to healthy food in underserved areas. Accessed May 4, 2023. <https://sustainableagriculture.net/publications/grassrootsguide/healthy-food-access/healthy-food-financing-initiative/>
- ¹²³ U.S. Department of Agriculture Food and Nutrition Service. SNAP: Monthly Participation, Households, Benefits. Accessed August 2, 2023. <https://fns-prod.azureedge.us/sites/default/files/resource-files/snap-4fymonthly-7.pdf>
- ¹²⁴ Alliance for National Nutrition Incentives. ANNI Statement of Purpose. Accessed June 6, 2023. https://fruitvegincentives.org/wp-content/uploads/sites/5/ANNI-Statement-of-Purpose_.pdf
- ¹²⁵ Alliance for National Nutrition Incentives. 4 Goals for the Farm Bill. Accessed August 28, 2023. <https://fruitvegincentives.org/priorities/#goals>
- ¹²⁶ U.S. Department of Agriculture Food and Nutrition Service. Supplemental Nutrition Assistance Program Education. Accessed June 1, 2023. <https://www.fns.usda.gov/snap/snap-ed>
- ¹²⁷ Healthy, Hunger-Free Kids Act of 2010. In: 111th Congress, editor. S3307. <https://www.congress.gov/bill/111th-congress/senate-bill/3307/2010>
- ¹²⁸ U.S. Department of Agriculture Food and Nutrition Service. Final Rule: SNAP Nutrition Education and Obesity Prevention Grant Program. <https://www.fns.usda.gov/snap/fr-0331162016>
- ¹²⁹ U.S. Department of Agriculture Food and Nutrition Service. SNAP-Ed Final Allocations for FFY 2019. Accessed September 9, 2023. https://snaped.fns.usda.gov/sites/default/files/documents/FY2019SNAP-EdFinalAllocation_3.pdf
- ¹³⁰ U.S. Department of Agriculture Food and Nutrition Service. SNAP-Ed Connection. Accessed July 10, 2023. <https://snaped.fns.usda.gov/>
- ¹³¹ American Public Human Services Association. Recommendations to Strengthen the Impact of SNAP-Ed on Food and Nutrition Security: Perspectives from State SNAP-Ed Agency Leaders. Accessed June 1, 2023. <https://files.constantcontact.com/391325ca001/0e00ba9e-adce-4f8e-9810-6ea3ceafc603.pdf>
- ¹³² Webster J, Trieu K, Dunford E, Hawkes C. Target salt 2025: a global overview of national programs to encourage the food industry to reduce salt in foods. *Nutrients*. Aug 21 2014;6(8):3274-87. doi:10.3390/nu6083274
- ¹³³ Pomeranz JL, Wilde P, Mozaffarian D, Micha R. Mandating Front-of-Package Food Labels in the U.S. - What are the First Amendment Obstacles? *Food Policy*. Jul 2019;86doi:10.1016/j.foodpol.2019.05.005
- ¹³⁴ U.S. Food and Drug Administration. FDA Proposes Updated Definition of 'Healthy' Claim on Food Packages to Help Improve Diet, Reduce Chronic Disease. Accessed May 19, 2023. <https://www.fda.gov/news-events/press-announcements/fda-proposes-updated-definition-healthy-claim-food-packages-help-improve-diet-reduce-chronic-disease>
- ¹³⁵ Guiding Stars. What is Guiding Stars? Accessed May 19, 2023. <https://guidingstars.com/what-is-guiding-stars/frequently-asked-questions/#:~:text=Guiding%20Stars%20is%20an%20objective,the%20more%20nutritious%20it%20is>
- ¹³⁶ Walmart. Great for You. Accessed June 6, 2023. <https://corporate.walmart.com/global-responsibility/hunger-nutrition/great-for-you>
- ¹³⁷ Kroger. OptUp. Accessed June 6, 2023. <https://www.kroger.com/health/pharmacy/optup>
- ¹³⁸ Schwartz M, Levi R, Lott M, Arm K, Seligman H. *Healthy Eating Research Nutrition Guidelines for the Charitable Food System*. 2020. https://healthyeatingresearch.org/wp-content/uploads/2020/02/her-food-bank_FINAL.pdf
- ¹³⁹ O'Hearn M, Gerber S, Cruz SM, Mozaffarian D. The time is ripe for ESG + Nutrition: evidence-based nutrition metrics for Environmental, Social, and Governance (ESG) investing. *European Journal of Clinical Nutrition*. 2022/08/01 2022;76(8):1047-1052. doi:10.1038/s41430-022-01075-9
- ¹⁴⁰ Let's Move! The HealthierUS School Challenge. Accessed May 1, 2023. <https://letsmove.obamawhitehouse.archives.gov/healthierus-school-challenge>
- ¹⁴¹ The HealthierUS School Challenge Application Kit. Accessed May 1, 2023. <https://osse.dc.gov/sites/default/files/dc/sites/osse/publication/attachments/HUSSC%20Application%20Kit%20Part%201.pdf>
- ¹⁴² U.S. Department of Agriculture Food and Nutrition Service. Healthy Meals Incentives Recognition Awards for SFAs. Accessed May 1, 2023. <https://www.fns.usda.gov/cnp/hmi-recognition-awards-for-sfas>
- ¹⁴³ 26 U.S.C. § 162(a).
- ¹⁴⁴ 26 U.S.C. § 162(j).
- ¹⁴⁵ Regan v. Taxation without Representation, 461 U.S. 540 1983.

XI. Appendix A

CONVENING PLANNING

Timeline

Key milestones	May '22	Jun '22	July '22	Aug '22	Sep '22	Oct '22	Nov '22	Dec '22	Jan '23
Convene advisory committee (#1)									
Commission research prework									
Hire trained facilitator									
Convene advisory committee (#2)									
Send invitations									
Complete literature review									
Complete policy report									
Convene advisory committee (#3)									
Conduct survey of SNAP participants									
Convene advisory committee (#4)									
Distribute prework									
Finalize convening agenda, logistics									
Convene advisory committee (#5)									
Hold convening									
Conduct convening postmortem									

Facilitator

CSPI hired a certified Organizational Development trainer to assist with planning and facilitating the meeting. The facilitator helped organize data collected through the prework, set the agenda, design and facilitate the meeting, and summarize meeting outcomes.

SNAP Expert Outreach

As noted above, hearing directly from shoppers who use SNAP was an important component for guiding and informing policies that would make the store environment more supportive to SNAP participants shopping for nutritious options on a budget. CSPI partnered with state- and community-based organizations who work directly with shoppers utilizing SNAP to identify individuals to participate in the convening. An interest form was disseminated, and participants were selected based on availability and whether they used SNAP within the past year. CSPI also selected individuals across a range of ages, geographies, and household sizes. This added a variety of perspectives to the conversation, taking into account that individuals have very different experiences using SNAP and differing access to retail options. CSPI also hosted three pre-meeting sessions for any individuals who wanted to learn more about the topic of healthy retail marketing in advance of the event, and as an opportunity to build comfort and familiarity with CSPI staff and each other. Participants with lived experience with SNAP were also supported with a \$600 stipend for attending the convening and participating in the pre-meetings.

Convening Activities

Day one began with an exercise called “seed the pot” in which participants were asked to pick one of

the promising retail marketing intervention topics and document what opportunities, barriers, and considerations should be taken into account for successful policy development. Participants were sorted into small groups based on the topics they chose, ensuring that individuals from different roles (i.e., retailers, manufacturers, researchers, shoppers) were present in each. The discussions began with considerations from shoppers that use SNAP to root the conversation in their experience with the program. Participants were asked to describe what a healthy retail food environment looked like to them and share strategies to create it. Ideas were then shared back with the full convening group, and there was an opportunity for everyone to provide feedback and note commonalities. The small groups were then asked to take both the initial brainstorm and the feedback and consider what a successful and effective policy for their chosen topic would look like, and what support would be needed. Day one ended with reflections from those in the room who utilize SNAP to gauge their perceptions of proposed policies, as they are the ones most directly impacted by any potential policy.

Day two began with a review of potential policy levers including federal SNAP policy, federal financial policy, federal voluntary opportunities, and other policy avenues. Convening participants also reviewed the legal feasibility analysis shared in the pre-work. In smaller breakout groups, convening participants brainstormed policy ideas and categorized them by policy lever. Each group shared their top three policy ideas with the larger group, and everyone had an opportunity to provide feedback. Convening organizers then grouped top policy ideas into categories. In the last set of breakouts, individuals chose one category and discussed key policy design elements, equity considerations, challenges, and opportunities for concrete recommendations.

After the convening adjourned, participants had an opportunity to share feedback via an online survey about the event structure (e.g., format, facilitation) and to rank which policy opportunities they would prioritize after the two-day event.