

# EAT. UNIVERSITY OF SAVE. ILLINOIS SNAP-ED

Community Network and Social Marketing Campaign Evaluation

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Illinois Extension



UIC



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# Authors and Acknowledgements

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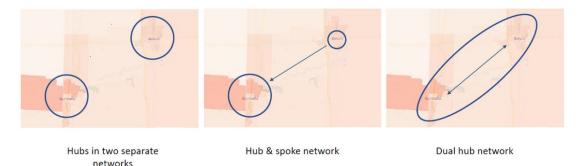
# **Executive Summary**

# **PROGRAM DELIVERY MODEL**

Illinois Supplemental Nutrition Assistance Program (SNAP) Education (IL SNAP-Ed) provides community-based nutrition education for individuals and families eligible for SNAP benefits and works with communities and local partners to make nutritious foods and physical activity accessible for all. The goal of SNAP-Ed is to improve participants' healthy eating and physical activity choices, consistent with the <u>Dietary Guidelines for Americans</u> and <u>Physical Activity Guidelines for Americans</u>, to prevent obesity and reduce the risk of chronic disease. In Illinois, the program is delivered under the Illinois Department of Human Services by the University of Illinois through Illinois Extension and the University of Illinois Health's Chicago Partnership for Health Promotion (CPHP).

IL SNAP-Ed implements a community-based network approach grounded in the <u>Social Ecological</u> <u>Model</u>, a well-established public health framework emphasizing the interconnectedness of personal choices with an individual's environment and community context, in achieving behavior change. Within each SNAP-Ed community network (referred to as "networks" in this report), SNAP-Ed staff deliver nutrition education to eligible audiences and collaborate with local partners and community coalitions on policy, system, and environmental (PSE) interventions, prioritizing the specific needs, opportunities, and readiness of partners and eligible families within the network.

Networks are comprised of hub and spoke communities where eligible individuals live, learn, work, eat, shop, and play. Hubs are population centers where services and eligible individuals are concentrated. Spokes are nearby communities with higher concentrations of eligible individuals who regularly travel to hubs for services. Networks are defined using visualized data from the American Community Survey 5-year estimates of <u>SNAP eligibility</u> (185% of the federal poverty level) and plotted locations of geographically tethering core life services (e.g., Special Supplemental Nutrition Program for Women, Infants, and Children (WIC), employment, groceries, healthcare). Networks are constructed based on how most eligible individuals in an area travel. Some networks contain only hubs, others contain hubs and spokes, and some have dual hubs where travel between two nearby hubs is typical for daily activities related to live, learn, work, eat, shop, and play.



To better understand network characteristics and program factors impacting outcomes of eligible populations living in SNAP-Ed networks, IL SNAP-Ed contracted Altarum to collaboratively plan and implement a comprehensive, multi-component evaluation of the community network approach. The evaluation was conducted from February 2021 through January 2023. During this time, an evaluation of a newly launched statewide social marketing campaign also took place. Full reports can be accessed on the <u>Illinois SNAP-Education Impacts webpage.</u>

# PART 1: DEVELOPMENT OF A NETWORK RANKING SYSTEM

The first step of the network evaluation was to develop a system for ranking identified SNAP-Ed networks by factors that influence obesity prevention in eligible populations with the purpose of understanding similarities and differences of networks across the state. Networks were assessed using external and internal program indicators (i.e., obesity prevention supports) from the 2019-2020 program year and assigned to one of three tiers based on the quantity of supports present in a network. Tier 1 networks had more supports whereas Tier 3 networks had fewer supports. The following steps were used to create a tiered system of networks used for sampling in Parts 2 and 3 of the overall evaluation.

- Step 1: Assign SNAP-Ed program sites to networks. Sites receiving SNAP-Ed programming were assigned to the networks in which they were geographically located.
- Step 2: Determine indicators for classifying networks. Indicators related to SNAP-Ed activities, partnerships, coalitions, and community assets that support obesity prevention were selected.
- Step 3: Summarize indicators by network. Indicators were summed across the network and averaged per 1,000 SNAP-eligible population or percent of SNAP-eligible population.
- Step 4: Standardize measures. Standardized scores were created using z-scores within each fiscal year.
- Step 5: Create a total network score.

A total score for each network was calculated by summing the z-scores. The final score incorporated weighting for different indicators to reflect their impact on obesity prevention; those with the potential for greater impact were assigned greater weights.

Step 6: Rank networks and divide into tiers.
Networks were ranked from highest to lowest using the network total scores.

#### FINDINGS

High population networks appeared in the lower tiers more often than low population networks. This indicates more obesity prevention supports were present per 1,000 eligible individuals for low population networks than for networks with higher populations. This information was used to plan intervention locations for the statewide social marketing campaign "Eat.Move.Save." to increase program dosage for high population networks (see Part 4 below) and monitor staffing placement goals.

# PART 2: CHARACTERIZE NETWORKS, PARTNERSHIPS, AND COALITIONS

Within networks, partnerships and multi-sector collaboratives and coalitions are developed to reach families across settings with a combination of SNAP-Ed activities. To understand the depth and value of how these partnerships and coalitions contribute to SNAP-Ed goals and outcomes, a multi-

component partnership and coalition assessment was conducted. The assessment consisted of four major activities.

- Network partner analysis
- Local partner survey
- ▲ Local partner interviews
- Local SNAP-Ed staff focus groups and survey

## **Analysis of Partner Alignment**

Local SNAP-Ed staff in sample networks completed an assessment that identified network partners and coalitions for federal fiscal year (FFY) 2022. Partners were categorized as direct, parallel, or asset. Direct partners worked directly with SNAP-Ed on obesity prevention strategies, parallel partners worked on obesity prevention strategies independent of SNAP-Ed, and asset partners were present in the network but did not currently work on obesity prevention strategies; however, they contributed to the SNAP-Ed outcomes of interest by the nature of their organization or purpose.

The information was compiled and analyzed to determine if differences were present across networks and partner categories. The categories were ranked as high, medium, or low by the total number of partners and proportion of direct, parallel, and asset partners.

#### FINDINGS

Overall, 1,245 total partners were reported across the selected networks. A total of 231 partners were from urban networks, 621 were micro-urban/suburban, and 393 were rural.

- Across all partners, 41% were considered direct, 21% were considered parallel, and 38% were considered asset.
- The types of organizations most frequently identified were food pantries/meal sites/hunger organizations, schools, grocery stores, and parks and recreation.
- Rural communities reported the greatest proportion of direct partners (52%), followed by urban (44%), and micro-urban/suburban communities (34%). Micro-urban/suburban communities reported the greatest proportion of assets (43%), followed by urban (37%), and rural communities (31%).

### **Partner Survey**

Next, a partner and coalition survey was developed to determine how community organizations and coalitions contribute to healthy eating, active living, and food access in the network via organizational and community-wide strategies and policies. Partner organizations identified in the partner alignment process (n=1,245, including all categories: direct, parallel, and asset) were invited to participate in the online survey. The survey opened in May 2022 and closed in July 2022. The final dataset included 97 responses, with 33 respondents indicating a direct partnership with IL SNAP-Ed (35%).

#### **FINDINGS**

SNAP-Ed partners reported a deep partnership with long-term commitment to joint activities in healthy eating, nutrition, physical activity, food access, or obesity prevention. Partners were notably experienced in supporting healthy behaviors, food access, and obesity prevention efforts within their communities, overwhelmingly agreed their organization can influence community-level prevention efforts and were committed to supporting these types of activities in the future.

- 33 respondents (35%) reported partnering directly with IL SNAP-Ed with nearly half (46%) indicating the partnership had extended four or more years.
- Most commonly, organizations' current efforts included creating environments that promote healthy choices and access to food (83%), providing education on healthy living topics (74%), and participating on coalitions focused on promoting healthy living and access to food (72%).
- Nearly 60% of respondents planned to expand their current efforts to create an environment that promotes healthy choices and access to food.

Partners reported that participation on coalitions provides their organizations opportunity to collaborate with similarly focused agencies around common goals to improve healthy lifestyles and access to food.

- ▲ 42% of respondents reported their organization participated on at least one multi-partner coalition, most commonly focused on increasing food access (65%).
- Respondents' organizations played a lead or organizing role for 26 coalitions.
  - Coalitions led or organized by respondents' organizations most commonly worked to improve the coordination of health or food systems (56%) and the majority of respondents (77%) indicated their coalition's membership was representative of the community served.
- Major accomplishments of the coalitions in the past three years included: increasing access to food throughout communities served, supporting capacity building of other local organizations, and providing educational opportunities related to healthy eating and physical activity.

## **Partner Interviews**

One-on-one interviews were conducted to learn how partners and coalitions contributed to broad community-wide changes and policy implementation to support food access, healthy eating, and active living. A total of nine interviews were conducted between August and October 2022 with various organization types (e.g., food bank/pantry, faith-based, healthcare, government program/agency, early childhood), service areas, and levels of partnership with IL SNAP-Ed.

#### FINDINGS

- Of the nine organizations represented, six indicated they were currently working with IL SNAP-Ed in various capacities such as utilizing existing educational resources, hosting classes, working with SNAP-Ed to create, implement, and assess healthy policies, coordinating with SNAP-Ed to avoid duplication of efforts within the community, collaborating on community coalitions, councils, and committees, and working with SNAP-Ed to disseminate aligned messages in the community.
- Partners reported common challenges when implementing programs, such as limited funding, staffing challenges, volunteer burnout, lack of time, and unclear direction. However, interviewees shared that working in partnership with SNAP-Ed and other community organizations helped address these challenges by providing curriculum and materials, knowledge of resources, parental engagement, and collaborative leadership.
- Interviewees valued their relationship with IL SNAP-Ed noting that, by working towards common goals, both groups expand their reach and make a positive impact on their community.
- A Quotes that represented the type of information gathered:
  - "Our partnership with Extension has really shown that this is a perfect partnership, and

everything that Extension stands for ties directly into what we're trying to do with [other organizations] and addressing social determinants of health in [our community]." – Interviewed partner

 "Their ability to communicate and be on the ground and educate and change, you know, have trust relationships locally and then our ability to have sort of funds and translate local need into state policy and some of that work, it just complements each other."
Interviewed partner

## **Staff Focus Groups and Survey**

The final component of the partnership and coalition assessment consisted of focus groups and a brief survey for local SNAP-Ed staff. Focus group discussions sought to determine how partnerships and coalitions contribute to broad community-wide changes and policy implementation relative to healthy eating, physical activity, food access, and obesity prevention within networks. The survey captured information such as job role and length of employment. A total of 21 local staff members representing a variety of networks participated in either a virtual focus group or a virtual key informant interview, and 16 completed the survey during June and July 2022.

#### **FINDINGS**

- Local staff members had strong relationships with organizations in their networks, especially staff who were in their positions prior to the COVID-19 pandemic.
- The pandemic brought community-wide food access issues to the forefront which resulted in several initiatives being implemented to improve access to food.
- Although SNAP-Ed programming was valued within networks, there was a lack of visibility of program activities. Not all partners were aware of SNAP-Ed programming.
- Staff recommend a continued focus on engaging diverse groups of community members in local and program decisions. Staff agreed that having a more diverse workforce that more accurately reflects the audience being reached would help to engage residents. Additionally, more diversity, equity, and inclusion training and technical assistance may improve outreach efforts to community members.

# PART 3: IMPACT EVALUATION OF THE NETWORK APPROACH

Part 3 of the network evaluation (September 2021–April 2022) focused on determining the ways in which SNAP-Ed programming impacts eligible audiences living in SNAP-Ed networks. A population-level survey was developed to identify relationships between SNAP-Ed program exposure and individual health behaviors in relation to differences in networks, demographics, geography, or other socio-economic characteristics. Population-level indicators measured fruit and vegetable consumption, physical activity, food security, and quality of life. Individual-level indicators measured intent to change behavior and food resource management.

The survey was administered at two time-points, six months apart ("baseline" and "follow-up"), to eligible residents in sample networks as well as to a demographically similar comparison group of people not living within a SNAP-Ed network. A total of 25,000 invitations were mailed to individuals who met SNAP-Ed eligibility criteria; 1,578 individuals completed the baseline survey, and 857 completed the follow-up, of which 572 resided in a community network and 285 resided in comparison communities.

#### **FINDINGS**

- One-quarter (26%) of eligible residents living in community networks reported exposure to SNAP-Ed programming compared to 17% of residents living in comparison communities.
- Exposure within networks was significantly higher among Black, non-Hispanic residents, residents with children in the household, those experiencing food insecurity, those having a BMI classified as overweight or obese, and those participating in assistance programs.
- A majority of network residents (59%) took action after exposure to SNAP-Ed.
  - Those experiencing food insecurity were more likely to take action than their food secure counterparts, and those with an overweight or obese BMI were more likely to take action than those with a normal BMI.
  - The most common actions taken were starting to be more active, starting to eat more fruits and vegetables, and trying new recipes.
- Comparison group residents had significantly higher fruit and vegetable consumption frequencies than network residents at baseline and follow-up. However, likelihood of daily consumption and of increasing frequency of fruit and vegetable consumption were similar between groups.
  - Top barriers to eating more fruits and vegetables in both groups were cost, spoilage, and perceptions of already eating enough fruits and vegetables.
- The comparison group had higher levels of physical activity at baseline and follow-up, but both groups were similar in likelihood of meeting physical activity recommendations, likelihood of increasing physical activity from baseline to follow-up, and readiness to change physical activity.
- Top barriers to being more physically active for both community network and comparison group residents included weather, lack of time, and lack of motivation.

# PART 4: STATEWIDE SOCIAL MARKETING CAMPAIGN OUTCOMES

In October 2021, IL SNAP-Ed launched the Eat.Move.Save. statewide social marketing campaign. The primary goals of the campaign were to increase awareness of the SNAP-Ed program, increase recognition of the Eat.Move.Save. brand, and to increase overall program dosage within networks. Findings from Part 1 of the Community Network Evaluation were used to prioritize networks for campaign implementation. An outcome evaluation of the campaign was completed by surveying randomly selected eligible residents living within zip codes receiving campaign messages. A six-month follow-up survey was sent to the same group of individuals who responded to the initial survey. Additionally, SNAP-Ed staff and local partners were surveyed for feedback about campaign messages, channels of delivery, and perceived audience reach.

The Eat.Move.Save. social marketing campaign assessment consisted of three major activities.

- Population-level survey (pre- and post-)
- ▲ Local partner survey
- ▲ Local staff survey

### **Population-Level Survey, Baseline**

The population-level survey was designed to capture respondents' exposure to the Eat.Move.Save. campaign and behaviors such as fruit and vegetable consumption and physical activity. In April 2022,

25,000 survey invitations were mailed to eligible residents. A total of 1,156 surveys were completed and data was weighted for analysis.

#### FINDINGS

Campaign messages were reaching priority populations in Illinois. Rates of exposure were significantly higher among Illinois residents who identified as Black or African American, who participated in assistance programs, who experienced food insecurity, who had lower levels of educational attainment, or who participated in SNAP.

- 20% of Illinois residents with lower incomes were exposed to the campaign (i.e., recalled seeing the campaign messages).
- Delivery channels most frequently identified by those reporting exposure were billboards, at grocery stores, and at bus stops.
- ▲ 66% of Illinois residents who saw the campaign reported taking action after seeing the messages.
- Residents exposed to the campaign were more likely to be preparing to eat more fruit and vegetables, more likely to eat vegetables at least once a day, and ate vegetables more frequently than residents who were not exposed.

## **Population-Level Survey, Follow-Up**

In November 2022, respondents who completed the baseline survey were emailed a link to the followup survey designed to capture exposure to the Eat.Move.Save. campaign and behaviors such as fruit and vegetable consumption and physical activity within the past six months. The total number of matched surveys completed included 596 respondents and data was weighted for analysis.

#### FINDINGS

One year after the launch of the Eat.Move.Save. campaign, messages were reaching priority populations with significantly higher exposure rates among those who identified as Black or African American, who had educational attainment levels of a high school degree or less, or who participated in assistance programs.

- Those exposed to other components of the SNAP-Ed program were 9.2 times more likely to be exposed to the campaign than those who were not exposed to SNAP-Ed programming.
- Delivery channels most frequently identified by those reporting campaign exposure were billboards, bus stops, social media, and home delivered letters.
- 93% of exposed residents reported taking action after seeing campaign messages.
  - Residents who were food insecure and from households with children were more likely to take health behavior action after exposure to the campaign.
  - Exposed residents were more likely to increase their physical activity levels and experienced a significantly greater change in the number of days per week they reported being active compared to those who were not exposed.
- Residents exposed to the campaign within the past six months were 1.9 times more likely to make progress towards a behavior change than those who were not exposed.

### **Local Partner Survey**

Additionally, a partner survey was developed to elicit feedback about the Eat.Move.Save. social marketing campaign. Dissemination occurred from October 2022 through November 2022. The final dataset included 94 partner responses.

#### **FINDINGS**

Most partners were aware of the Eat.Move.Save. campaign and agreed that it aligned with their organizations' work. Partners felt the campaign was appropriate, culturally relevant, and effective in reaching lower income households.

- ▲ 62% of partners were aware of the campaign.
- ▲ 65% of partners shared the campaign with their clientele or participants.
- ▲ Most partners (86%) believed the campaign reinforced or supported their organization's work.

### **Local Staff Survey**

A survey was also developed for SNAP-Ed staff to elicit feedback about the Eat.Move.Save. social marketing campaign. The survey opened in August 2022 and closed in September 2022. The final dataset included 82 staff responses.

#### FINDINGS

The campaign was well-received by staff members.

- ▲ 97% of staff were aware of the Eat.Move.Save. campaign.
- ▲ 83% of staff members shared the campaign with participants and 68% shared it with partners.
- Most staff members believed the campaign reinforced direct education (83%) and PSE work (66%), but less than half (42%) thought it was reaching households with lower incomes in their communities.

# **PART 5: RETURN ON INVESTMENT ANALYSIS**

The final component of the network and social marketing campaign evaluation conducted was a return-on-investment analysis measuring whether estimated economic benefits of the SNAP-Ed program exceed the upfront cost of administering the program. SNAP-Ed program data was used to estimate the population receiving various components of the program (direct education, indirect education, social marketing campaign messages, and PSE interventions) and prior literature on the likely impacts was used to predict the number of obesity and food insecurity cases prevented. An economic model was then developed and used to estimate the total value of future health and economic improvements through decreased healthcare spending, improved life expectancy, and increased lifetime earnings.

#### FINDINGS

- An estimated 5,060 cases of obesity and 570 cases of food insecurity were prevented across Illinois children and adults in a single year.
- For a single year of programming, IL SNAP-Ed was estimated to generate total discounted future societal benefits between \$76.0 million and \$135.3 million.
- ▲ These societal benefits accrue from:
  - Expected future reductions in obesity and food insecurity that produce health care cost savings (\$35.7 million-\$65.8 million) and
  - Increased educational outcomes, life expectancy, and lifetime earnings (\$40.3 million-\$69.5 million).
- When compared to the cost of delivering the program (\$14.2 million in the study year), SNAP-Ed programming returned between \$5.36-\$9.54 per dollar spent.
- Across program components, the largest benefits were generated by:
  - Social marketing activities (\$25.3 million-\$45.4 million),

- Followed by PSE activities (\$23.9 million-\$42.2 million),
- Direct education (\$11.3 million-\$20.2 million), and
- Indirect education activities (\$15.5 million-\$27.6 million).
- For a single year of programming, IL SNAP-Ed was estimated to generate future benefits for:
  - The federal government between \$23.9 million and \$43.5 million,
  - State and local governments between \$5.4 million and \$9.4 million, and
  - Households and the private sector between \$46.7 million and \$82.4 million.