

## O22 (continued)

vent early childhood obesity. Technology has become an integral part of continuing services as a result of COVID-19, yet no standardized digital curriculum targeting childhood obesity prevention currently exists.

**Objective:** To determine the perceptions and barriers of key stakeholders on using technology to enhance home visitation programs, as well as preferred digital learning formats related to the development of a digital nutrition education curriculum.

**Study Design, Setting, Participants:** Key stakeholders of the Maternal, Infant, and Early Childhood Home Visiting (MIECHV) Program (N=27) in Florida participated in a one-time, 30-minute qualitative interview via Zoom with a trained researcher using a semi-structured script based on the Technology Acceptance Model.

**Measurable Outcome/Analysis:** Interviews were audio-recorded, transcribed verbatim, and coded by two researchers using an inductive thematic approach.

**Results:** Since the onset of the COVID-19 pandemic and implementation of virtual home visits, participants expressed positive attitudes surrounding the use of technology, such as greater flexibility in scheduling and increased access to readily available information for both parents and home visitors. Further, they were receptive to continued virtual programming opportunities, but identified several barriers, including limited access to smartphones and internet access, privacy concerns, and lack of personal connection to parents. Recommendations included providing families with technology devices, using secure platforms, and developing brief digital nutrition education modules with interactive and personalized features.

**Conclusions:** Perceptions surrounding the use of technology for nutrition education in home visitation programs were positive. This promising formative research will be used to determine future directions for the development steps of a technology-based home visitation early childhood obesity prevention curriculum.

**Funding:** University of Florida Mowery Innovative Research Fund.

### O23 Perceived Stress in Rural and Suburban Dwelling Participants After a Meal Kit Intervention

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**Background:** Stress is associated with unhealthy eating behaviors, which increases risk for chronic disease. People with low income face many stressors, such as decreased access to healthy food. Recent research suggests that providing healthy meal kits may decrease perceived stress (PS)

of main preparers of food with low income, but more research is needed.

**Objective:** To evaluate the impact of a healthy, meal kit intervention on PS of main preparers of food from diverse families with low income in different communities.

**Study Design, Setting, Participants:** Two waves of participants from rural (N=23) and suburban (N=36) communities completed a six-week meal kit intervention that provided three meals per week. Demographic data were collected at baseline, and PS surveys were collected at baseline and post-intervention.

**Measurable Outcome/Analysis:** Demographic data were analyzed using descriptive statistics. Frequency statistical analysis evaluated changes in PS overall and per site. Paired sample t-tests were run to ascertain if there was a significant difference in PS from baseline to post-intervention.

**Results:** Participants were primarily female (89.8%), on average  $46.21 \pm 13.1$  years old, primarily non-Hispanic (98.3%) and black (37.3%) or white (33.9%) with an average household size of  $4.4 \pm 1.6$ . Most (98.3%) fell below 200% of the federal poverty line for a household size of four. At post-intervention, most participants (67.8%) reported a decrease in overall PS. Participants experienced a decrease in PS from baseline ( $19.17 \pm 7.34$ ) to post-intervention ( $16.17 \pm 6.85$ ),  $t(58)=3.964$ ,  $P < 0.001$ . When split by community, suburban participants (72.2%) had a higher reduction of PS than rural participants (60.9%). There was no difference in PS between communities.

**Conclusions:** The overall reduction of PS from baseline to post-intervention suggests that the meal kit intervention positively impacted PS and did so similarly between the two communities. Future research should seek to explore the mechanism behind the decrease in PS.

**Funding:** Walmart Foundation.

### O24 Today's Mom: HappyHealthy Baby: Transforming a Traditional Nutrition Education Curriculum Into an Online Course for SNAP-Ed

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**Objective:** To develop, deliver, and evaluate a SNAP-Ed program using technology to reach pregnant moms.

**Use of Theory or Research:** Transformational learning theory was used to integrate key information, skill building, and affective engagement.

**Target Audience:** Limited resource pregnant moms and Extension educators trained to deliver the course.

**Program Description:** Today's Mom: HappyHealthy Baby, was developed as an online course for pregnant moms, adapted from the face-to-face Today's Mom curriculum using the 6-D model of project management. The

*Continued on page S13*

## O24 (continued)

course uses multiple technology elements focused on skill-building and participant engagement while addressing common barriers to face-to-face program participation. Each of the six lessons features videos with Extension educators and relatable moms delivering nutrition messages, recipe videos, a physical activity video, games to practice, tips to apply between lessons, and goal-setting activities. Extension educators were trained to facilitate the course and engage pregnant moms.

**Evaluation Methods:** Key informant interviews were used with limited resource moms throughout the development process; focus groups and journals were used to collect data among Extension educators who taught the course pilot. Data were reviewed for themes.

**Results:** Interviews with limited resource moms (n = 10) throughout the development process suggested ways to improve the course experience (e.g., clarifying the enrollment process and improving usability). Interviewees validated the course could be completed on mobile phones and found the course look/feel and content to be relevant. In fall 2021, the course was piloted with pregnant moms (n = 4) and mothers who had recently delivered babies (n = 6). Formative data collected among Extension educators during the pilot suggest a need for building trust and engagement between educators and limited resource moms.

**Conclusions:** Continued evaluation is needed to inform further course development and means of engaging the audience. Learning about processes used to adapt SNAP-Ed nutrition education curricula for digital delivery may provide a framework for others desiring to develop technology-based nutrition education.

**Funding:** Supplemental Nutrition Assistance Program - Education.

## Integrating Technology Into Nutrition Education and Behavior

### O25 Evaluation of Commercially Available Infant Feeding Mobile Applications Using the App Quality Evaluation Tool

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**Background:** Mobile applications (apps) are a promising tool for healthful infant-feeding (IF) promotion among low-income mothers, helping establish healthy dietary patterns in children with high obesity risk. Mothers frequently use health apps, but the quality of existing IF apps is unknown. The App Quality Evaluation Tool (AQEL) is a valid and reliable tool for evaluating nutrition app quality.

**Objective:** Assess the quality of commercially available IF apps and their appropriateness for a low-income audience using the AQEL.

**Study Design, Setting, Participants:** Researchers used an iterative process to selected apps for evaluation, only including free apps with breastfeeding and solid foods information. Registered dietitians, lactation consultants, and healthcare providers (n = 10) who work with low-income mothers of infants were recruited to complete the AQEL for each selected app.

**Measurable Outcome/Analysis:** Five standard AQEL domains (behavior change potential, knowledge support, skill development potential, app functionality, and meeting intended purpose) and two modifiable domains (appropriateness for low-income audience and relevance for those seeking IF information or support). Each domains' score ranged between 0-10 with score > 8 considered high quality. Average scores for each domain were calculated for every app. Interrater reliability was assessed using interclass correlation coefficients (ICC; ICC > 0.6 considered good agreement).

**Results:** Researchers selected six apps for evaluation: WebMD Baby, Baby+, Text4Baby, BabyCenter, What to Expect, and The Bump. All evaluators were white, female, with a bachelor's degree or higher. Evaluators highly rated app function and app purpose for WebMD Baby (8.0+1.8 and 8.2+0.9) and Baby Center (8.0+2.1 and 8.0+2.6). For other apps, no domains were rated highly. For appropriateness for low-income audiences, no apps were rated highly (range: 5.7-7.7). There was good agreement (ICC > 0.6) across evaluators for all apps.

**Conclusions:** Commercially available IF apps are of limited quality and may not be appropriate for low-income audiences. This indicates a need for developing apps that effectively support healthful IF behaviors among low-income mothers.

**Funding:** Northern Illinois University.

### O26 "These Texts Really Changed My Life": Outcome Evaluation Findings of a Text Message Intervention for Low-Income Adults

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**Objective:** The objective of this program was to evaluate a SNAP-Ed mobile text message intervention to encourage low-income adults to drink more water and less sugar-sweetened beverages (SSBs).

**Use of Theory or Research:** A comprehensive needs assessment, including a literature review and qualitative focus groups and interviews with low-income adults informed the development of the intervention, including

*Continued on page S14*