

Husky Nutrition Programs

Husky Reads: Outcome Evaluation Report

SNAP-Ed Annual Report, FY 2018

Name: Husky Reads

The Husky Reads curriculum includes a series of 10 lessons designed to introduce preschool-age children to MyPlate while improving fruit and vegetable literacy. The lessons, each delivered on a weekly basis, include reading at least one children's book, an activity or game, and food tasting to complement learning objectives.

Type of Evaluation: Outcome Evaluation

Questions

- Do the odds of correctly identifying specified fruits and/or vegetables increase after participating in Husky Reads?
- Does reported liking of specified fruits and/or vegetables increase after participating in Husky Reads?

Approach: The Evaluation Team designed an outcome evaluation to measure whether a child's ability to name specified fruits, vegetables, and their reported liking of specified fruits and vegetables increases after participation in Husky Reads. To do this, we obtained permission to adapt a fruit and vegetable recognition tool originally created and validated by Carraway-Stage and colleagues (2014). The Carraway-Stage tool uses a five face pictorial scale for children to rate a food as super yucky, yucky, just ok, yummy or super yummy. The Husky Reads version of the Fruit and Vegetable Preference Tool incorporates 16 pictures of produce items (9 fruits and 7 vegetables). The pictures were preloaded onto a tablet and the interview was administered 1:1 with the child. As part of the interview, children were shown a picture of a fruit/vegetable and asked three questions: 1) What is this called? 2) Have you eaten it before? and 3) How much do you like / don't like it? Preparation for the interview included a classroom visit for an orientation activity that introduces children to Carraway-Stage and colleagues' pictorial liking scale (Carraway-Stage et al, 2014).

Two large early childcare programs participated in the outcome evaluation conducted for the fall 2017 Husky Reads cycle. Thirteen classrooms participated. A total of 159 children participated in the pre-test interview, 89% of whom also completed the post-test interview. Information packets were sent home to the children in these classrooms and parents were given the option to opt their child out of the evaluation. Pre-test interviews were conducted prior to the start of Husky Reads and follow-up interviews were completed within two weeks of the end of the program. The research protocol has UConn Health IRB approval and is a registered clinical trial (NCT 03338257).

Demographics of children participating in the evaluation were similar across control and intervention sites (respectively: mean age = 3.9, 3.8; female = 55%, 52%; Black or African American = 88%, 85%).

Prior evaluation:

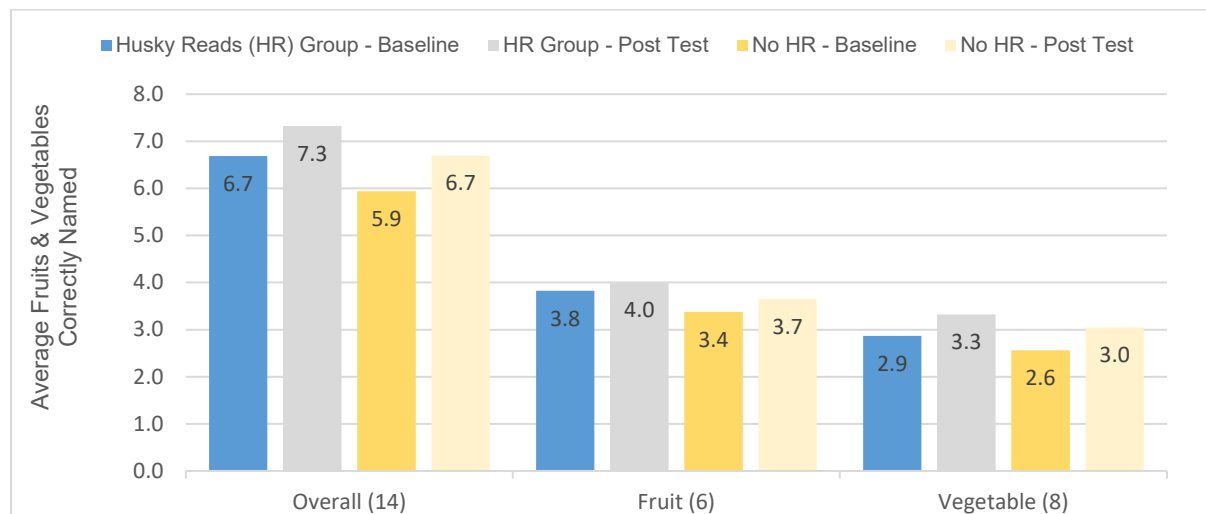
- USDA Higher Education Challenge Grant (2005-2010) supported early development of the Husky Reads curriculum and its delivery method. (Poehlitz, Pierce MB, and Ferris 2006; Pierce et al, 2012).
- Coleman A, Coleman S, Ferris AM, Book-based nutritional literacy effects preschoolers' nutritional knowledge and willingness to consume fruits and vegetables: 2013 American Public Health Association National Conference, Boston, MA Paper #289287.

Use of SNAP-Ed Priority Indicators: Not applicable due to age of target population.

Results.

Figure 1 shows results at baseline and post-test for children who participated in the fall 2017 Husky Reads program compared to those who did not participate. After the Husky Reads program ended, children who participated correctly named an average of 3.3 out of the 8 vegetables and 4 out of the 6 fruits. Correct naming of vegetables increased significantly from an average of 2.9 to 3.3 items. Correct naming of fruit increased from 3.8 to 4.0, but the increase was not statistically significant. Children described an average of 8.2 of the 14 produce items as ok, yummy or super yummy. Reported liking did not change significantly compared to baseline.

Figure 1. Husky Reads Intervention: Change in Correctly Named Fruits & Vegetables



Children in classrooms without fall 2017 Husky Reads exposure experienced a similar rate of improvement for correctly naming more fruits and vegetables than at baseline. The average number of correctly named fruits increased significantly by 0.28 (p=.01) and correctly named vegetables increased significantly by 0.48 (p<.001). The early

childcare program participating as the “control classrooms” did not receive Husky Reads during the fall but has participated during other semesters, is engaged in the Husky Nutrition ECE policy improvement initiative, and also has an active teacher-implemented nutrition education curriculum that may have contributed to their success.

Figures 2-4 provide additional details about how the proportion of children who correctly named specific fruits and vegetables changed among children participating in the fall 2017 Husky Reads program. Figure 2 summarizes if the percent of children who correctly named specific fruits and vegetables changed after participation in Husky Reads. The largest improvements were observed for snap pea (12%), blueberry (11%), kiwi (10%), and pineapple (7%). For four foods (banana, carrot, orange and strawberry), the percent of children correctly naming the food decreased.

Figure 2. Change in Percent of Children Correctly Naming Produce Item after Husky Reads Participation

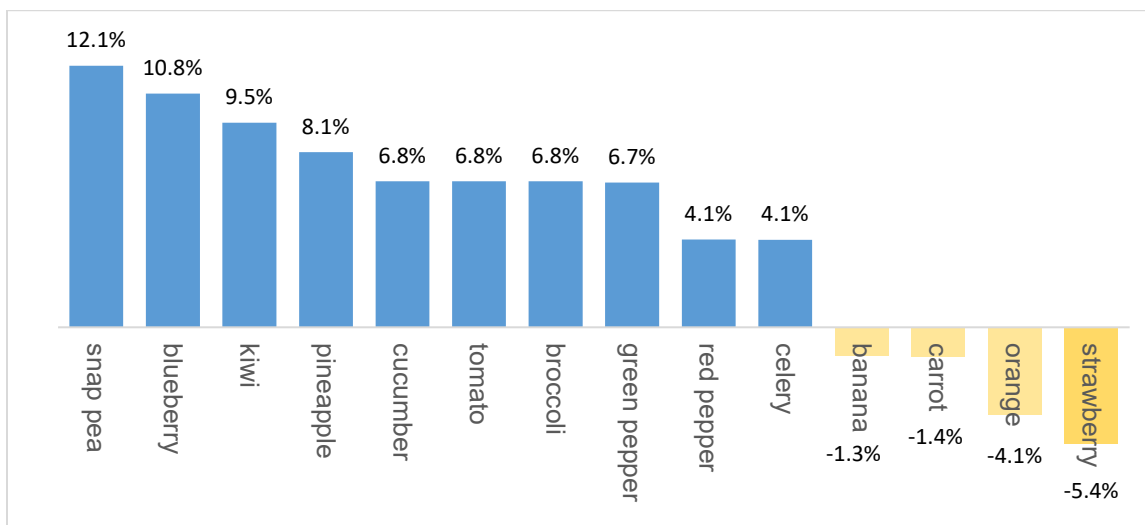


Figure 3 shows the percent of children at baseline and post-test who correctly named the six fruits and Figure 4 shows baseline and post-test results for the eight vegetables. As shown in the figures, at baseline, more than 90% of children correctly named banana (97%), orange (92%), strawberry (93%), and carrot (95%).

Figure 3. Percent of Children Who Correctly Named Fruits Before & After Husky Reads Participation

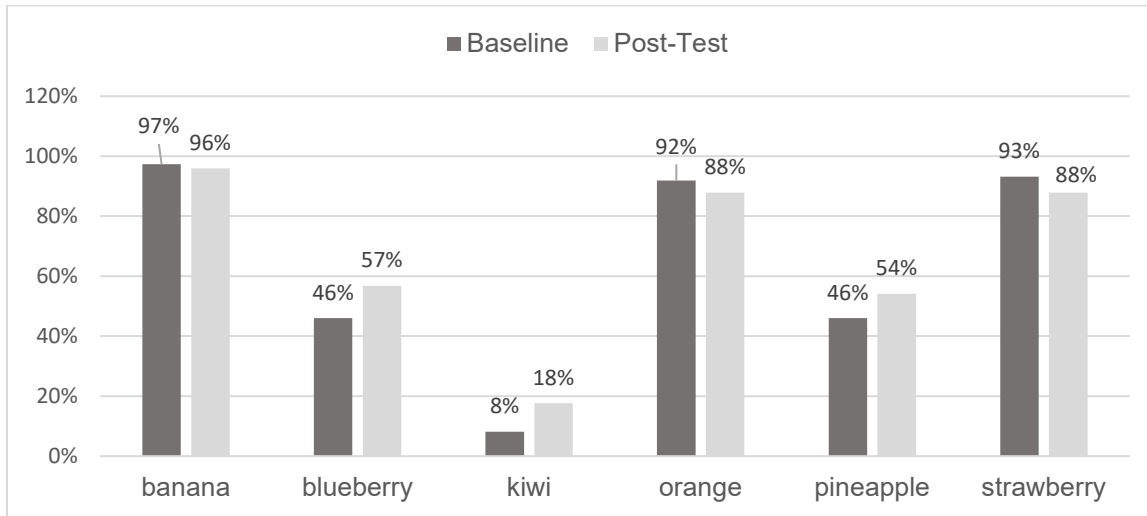


Figure 4. Percent of Children Who Correctly Named Vegetables Before & After Husky Reads Participation

