

Expanding School Breakfast Participation, 2017-2018

Catherine Tkatch, Data Analyst; Ebru Erdem-Akcay, Policy Research Analyst; Erin Cassar, Senior Research Associate

Key Findings:

- Schools that offered Breakfast in the Classroom (BIC) to all students had an average breakfast participation rate of 73%, the highest of all breakfast models.
- Schools targeted for alternative models in 2017-2018 *that also joined the 2017 Philadelphia School Breakfast Challenge* had a larger increase in breakfast participation rates as compared to other schools.

Breakfast Initiatives in SDP

The School District of Philadelphia's (SDP) Division of Food Services offers alternatives to traditional breakfast service in the cafeteria before the school day begins. For example:

- **Breakfast in the Classroom (BIC)** gives students the chance to eat together in their classrooms after the start of the school day.
- **Grab-n-Go carts** are located in hallways or other common areas so that students can get breakfast items from the cart on their way to class.

During the 2016-2017 school year, breakfast participation across the district averaged 42%. As part of a district-wide effort to increase breakfast participation to 70% of attending students, SDP implemented two breakfast-related initiatives in the 2017-2018 school year: targeting 30 schools to implement alternative breakfast models and implementing a breakfast challenge.

Initiative 1: Schools Targeted for Alternative Models

Thirty schools were selected by Food Services to implement alternative breakfast models for the first time in 2017-2018, with extra supports that included staff time and materials. "Targeted schools" were selected by the Division of Food Services because they had low participation rates while offering traditional cafeteria breakfast service in 2016-2017. To participate, the principal had to agree to adopt a new model.

Initiative 2: Philadelphia School Breakfast Challenge

Forty-one schools signed up for the Philadelphia School Breakfast Challenge sponsored by the Coalition Against Hunger, which offered prizes to schools with the largest breakfast participation increases from Fall 2016 to Fall 2017. Of schools that joined the Challenge, 17 also participated in the breakfast model initiative described above, meaning they implemented an alternative breakfast model for the first time in 2017-2018. Of the remaining 24 schools, 17 already had alternative breakfast models, while seven had cafeteria breakfast.

The Office of Research and Evaluation (ORE) analyzed breakfast participation data for Fall 2016 and Fall 2017 in order to answer the following research questions:

1. Did breakfast participation rates differ in schools that implemented different breakfast delivery models?
2. What happened to breakfast participation rates: a) in schools targeted by Food Services to adopt alternative breakfast delivery models in 2017-2018, b) in schools that participated in the 2017 Philadelphia School Breakfast Challenge, and c) in schools that implemented both?

Why is breakfast participation important?

- **Students learn better when they are well-fed.** Research shows that eating breakfast at school is associated with improved academic performance, as well as better attendance and punctuality.¹
- **About one-quarter of Philadelphians are food insecure.**² This means that, at times, they lack access to enough food or enough nutritious food. Pennsylvania's food insecurity level is 12.5%. School breakfast offers every child in Philadelphia a free meal to start the day.

Findings

Breakfast participation was highest in schools that offered Breakfast in the Classroom (BIC) to all students (73% of attending students). This includes all schools with school-wide BIC, regardless of whether they participated in either of the two breakfast initiatives. Breakfast participation averaged 52% in schools that offered BIC to some—but not all—classrooms, 30% in schools with cafeteria service, and 27% in schools with cafeteria service plus a Grab-n-Go cart (Figure 1).

Although Grab-n-Go carts were expected to increase breakfast participation by allowing students to receive breakfast even if they arrive too late to eat in the cafeteria, we found that schools with Grab-n-Go carts in addition to traditional cafeteria service had comparable breakfast participation rates to schools with cafeteria service only. However, most Grab-n-Go carts (64%) were implemented in high schools, which had significantly lower breakfast participation than elementary schools in general (elementary and K-8 schools had 50% breakfast participation during the fall of 2017 compared to 27% in high schools).

How is breakfast participation calculated?

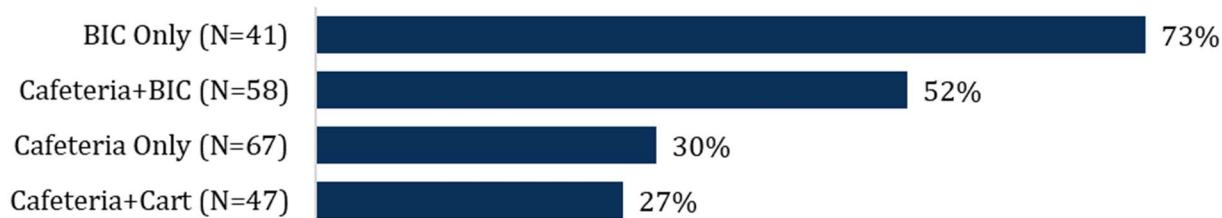
Daily breakfast participation is calculated as the number of meals served at a school divided by the number of students in attendance. For fall rates, we average monthly participation rates for September through December across all schools.

¹ Murphy, J.M., Pagano, M., Nachmani, J., Sperling, P., Kane, S., and Kleinman, R. (1998). The relationship of school breakfast to psychosocial and academic functioning: Cross-sectional and longitudinal observations in an inner-city sample. *Archives of Pediatric and Adolescent Medicine*, 152, 899-907.

² Gundersen, C., Dewey, A., Crumbaugh, A., Kato, M., & Engelhard, E. *Map the Meal Gap 2018: A Report on County and Congressional District Food Insecurity and County Food Cost in the United States in 2016*. Feeding America, 2018.

Relatedly, the vast majority of school-wide BIC models (95%) were implemented in elementary and K-8 schools. Therefore, because breakfast participation differs between elementary/K-8 schools and high schools, participation rates in Figure 1 are not solely explained by having an alternative breakfast model.

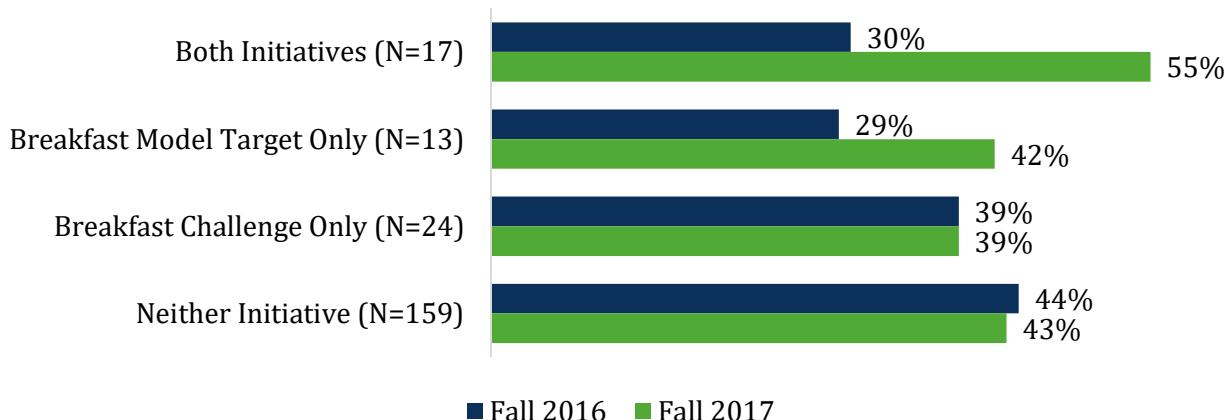
Figure 1: Breakfast Participation by Model, Fall 2017



Schools targeted by Food Services to adopt an alternative model in 2017-2018 that *also joined the Breakfast Challenge increased breakfast participation more than schools who participated in a single initiative or neither initiative*. Schools that participated in both initiatives increased participation by 25%, from 30% in Fall 2016 to 55% in Fall 2017 (Figure 2).

Schools who were targeted by Food Services but did *not* join the Breakfast Challenge increased participation by 13%, from 29% to 42%. Neither schools that joined the Breakfast Challenge only nor schools that did not participate in any initiative increased breakfast participation during this period.

Figure 2: Change in Breakfast Participation by Initiative, Fall 2016 to Fall 2017



These findings suggest that supporting schools in implementing Breakfast in Classroom models may be an effective way to increase breakfast participation, especially when schools also join an incentive program like the Breakfast Challenge.

For a summary of this information presented at the 2018 Research, Policy, and Practice (R2P) Conference, see poster titled [Expanding Breakfast Participation in the School District of Philadelphia](#).

This work was supported by funding from the Pennsylvania (PA) Department of Human Services through PA Nutrition Education Tracks, a part of the USDA's Supplemental Nutrition Assistance Program (SNAP).