

FIRST ANNUAL REPORT | 2017

Ending Hunger in Our Classrooms





Expanding "After the Bell" Breakfast Programs for Massachusetts Students

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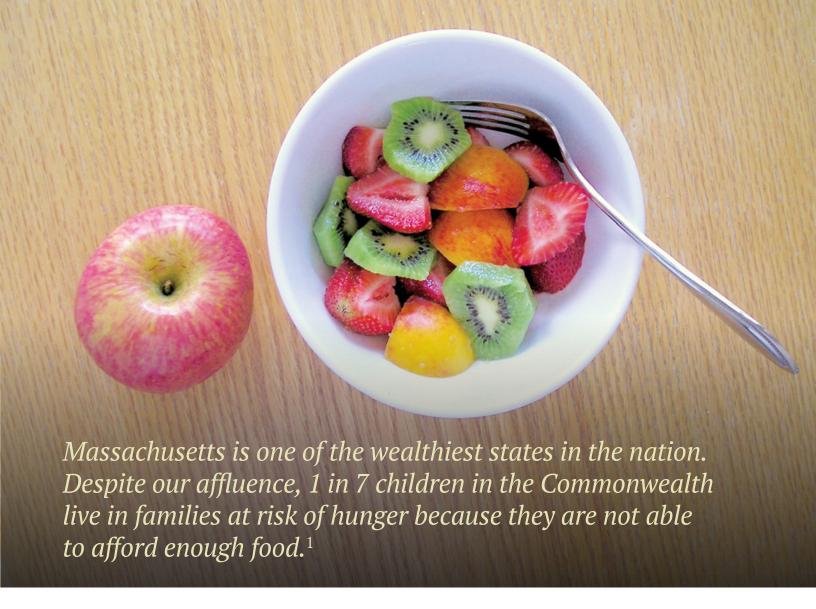
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Special Thanks

Children's HealthWatch and the Eos Foundation would like to thank the Massachusetts Department of Elementary and Secondary Education, and Children's HealthWatch staff Richard Sheward, Justin Pasquariello, and Stephanie Ettinger de Cuba for their assistance with this report. We also would like to recognize school breakfast champions across the state for their commitment to increasing school breakfast participation, including the Department of Elementary and Secondary Education, New England Dairy & Food Council, the Child Nutrition Outreach Project at Project Bread, the Massachusetts Chapter of the School Nutrition Association, the Food Bank of Western Massachusetts, the Worcester County Food Bank, the Greater Boston Food Bank, the Merrimack Valley Food Bank, Project Bread, the Massachusetts Law Reform Institute, the Food and Research Action Center, Share our Strength, and Advocates for Children of New Jersey.

Photo credit: Dave Roback, Republican Newspaper of Springfield, MA. Photos pages 2 and 13.





Schools are on the front lines of alleviating child-hood hunger, and our federal and state funded school breakfast and lunch programs provide the nourishment low-income children cannot always get at home. Statewide, 44 percent — or 400,000 students — enrolled in Massachusetts public schools qualify for free (F) and reduced (R) price meals. In

Schools are on the front lines of alleviating childhood hunger. the state's high poverty schools, the percentage jumps to an alarming **87 percent** of students in need.

While over two-thirds of children in high poverty schools participate in

lunch, only half participate in breakfast. Morning visits to the school nurse for stomachaches and headaches suggest that students are hungry and not to able access breakfast because it is served before school starts.

A small yet growing number of schools across the Commonwealth have identified a solution: free "breakfast after the bell" for all students, regardless of family income level. Breakfast after the bell allows students to eat in their classroom for the first 10-15 minutes of the school day, which counts as time on learning. Eating breakfast in the classroom dramatically increases participation rates and, most importantly, ensures that students are fed and fueled to learn.

In 2015, Commissioner Chester, of the Massachusetts Department of Elementary and Secondary Education, issued policy guidance that breakfast eaten after the bell and in the classroom with teacher instruction can count toward student learning time.¹

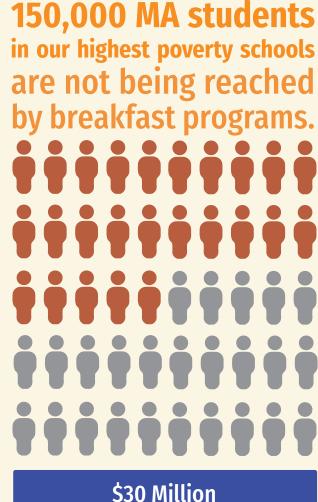
This first annual Massachusetts School Breakfast Report Card focuses on our state's highest poverty schools, those with 60 percent or more of their students qualifying for free (F) or reduced (R) price meals. Nearly 300,000 children attending these schools were eligible for a free breakfast in 2016. Roughly half of students received school breakfast, leaving 150,000 children unserved. For no cost to the state, all high poverty schools

Under the Commonwealth's new "economically disadvantaged" metric, the free (F) and reduced (R) priced meal eligibility rate as an indicator of poverty remains largely unchanged. As such, all calculations in this report are based on F/R meal eligibility data as reported by school districts to the Massachusetts Department of Elementary and Secondary Education. Refer to Appendix B for an in-depth explanation.

can launch after the bell breakfast programs, reach 80 percent participation rates, and leverage over **\$30 million**² in USDA reimbursements each year — money currently forfeited due to low breakfast uptake.

By taking a closer look at the data, we seek to highlight the hunger that exists in our schools, inspire new partnerships committed to combat this problem, and expand adoption of free after the bell school breakfast programs. Working together, we can eliminate morning hunger and optimize all students' potential to succeed.





\$30 Million USDA Reimbursments

AVAILABLE FOR EFFECTIVE SCHOOL BREAKFAST PROGRAMS

In order for these children to get the nutrition their growing bodies need, and for schools to be able to draw down additional USDA funding,

these programs need to be **MORE Effective** so participation will increase.

Why Breakfast Matters: Closing the achievement gap and improving child health

Health researchers have long reported the benefits of breakfast. Children who eat breakfast perform better academically and research shows breakfast consumption is associated with positive cognitive performance, enhanced attention spans, improved ability to complete problem solving tasks, and better logical reasoning skills.3,4,5,6

Students who participate in school breakfast have:

- Lower rates of absences and tardiness.^{7, 8, 9}
- Improved test scores. 10, 11, 16, 17 In one study, math scores of school breakfast eaters were reported to increase by 17.5 percent compared to children who did not eat school breakfast.12
- Fewer visits to the school nurse.13
- Improved dietary intake. 14, 15, 16, 17
- · Better health outcomes, and, specifically, lower body mass index.^{18, 19}

Longitudinal data show that when children participate in school breakfast they have better psychosocial functioning, including fewer behavior problems and less anxiety, depression and hyperactivity.²⁰ These changes are crucial in creating a school environment that promotes learning.

The research and educator testimony are clear: school breakfast supports improved academic achievement and improved child health and wellbeing.21

- **66** The first year we introduced BIC there was a 24% decrease in nursing visits attributed to greater breakfast participation. This equates to an increase of approximately 18,000 minutes of learning time for our students."
 - PRINCIPAL MIKE BYRON. PARKER MIDDLE SCHOOL, TAUNTON

RESEARCH-BASED BENEFITS OF BREAKFAST



Test scores



Dietary intake



Tardiness & absences



Visits to nurse



√√✓ Health outcomes improved

> including lower body mass index

66 We know that children who are hungry cannot focus on learning. After the bell breakfast not only ensures higher breakfast participation, but begins the day positively and with a sense of classroom community. Administrators and teachers have made this program work through a team effort and a mindset of finding simple solutions while keeping the needs of kids in the forefront. Students in high needs districts come through our classroom doors with so many challenges. This program eliminates the morning hunger challenge and provides an even playing field for kids whose basic needs go unmet throughout the Commonwealth."

 SUPERINTENDENT PIA DURKIN, **NEW BEDFORD PUBLIC SCHOOLS**

School Breakfast By the Numbers:

Greatest need and opportunity for impact

The highest poverty schools in Massachusetts, those with 60 percent or more of their students eligible for free or reduced price meals, educate nearly 300,000 students across 98 districts. The majority of these schools reside in 33 districts where the need and opportunity for impact are greatest. In 2016, data show that breakfast participation varied greatly by district:

from 18 percent to 68 percent, depending on whether breakfast was served before school or after the bell.

Table 1 ranks these districts by their average breakfast participation. In total, we see an average of 49 percent of students participating in breakfast. That means over half are not.

Table 1: Rank Order of 33 High Poverty School Districts by Breakfast Participation²²

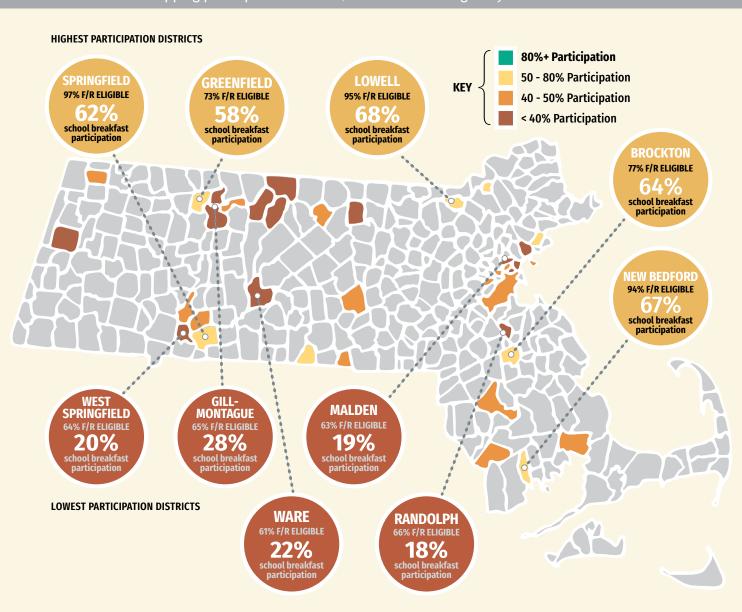
District	Enrollment	# schools =>60% F/R Populations	Average Free & Reduced (F/R) Population Across the District	Average Breakfast Participation Rate Across the District	Rank
Lowell	14,507	27	95%	68%	1
New Bedford	12,925	25	94%	67%	2
Brockton	16,881	19	77%	64%	3
Springfield	25,757	53	97%	62%	4
Greenfield	1,661	4	73%	58%	5
Salem	4,124	9	78%	56%	6
Lawrence	13,833	18	89%	53%	7
Southbridge	2,149	4	83%	53%	8
Wareham	2,475	5	80%	50%	9
Chicopee	7,722	13	78%	50%	10
Holyoke	6,039	11	81%	49%	11
Worcester	26,743	48	86%	48%	12
Erving	300	2	75%	48%	13
Boston	55,634	102	85%	48%	14
Fall River	10,238	16	83%	48%	15
Gardner	2,508	5	71%	47%	16
North Adams	1,629	4	77%	45%	17
Somerville	4,903	7	65%	44%	18
Everett	7,730	9	72%	43%	19
Webster	1,892	2	70%	42%	20
Taunton	8,096	6	63%	41%	21
Lynn	15,485	23	77%	40%	22
Fitchburg	5,244	8	93%	40%	23
Revere	7,218	11	75%	40%	24
Orange	609	2	90%	38%	25
Athol-Royalston	1,394	6	91%	38%	26

(Continued from the previous page)

Chelsea	7,202	5	71%	33%	27
Pittsfield	5,646	8	75%	28%	28
Gill-Montague	928	2	65%	28%	29
Ware	1,284	2	61%	22%	30
West Springfield	4,028	4	64%	20%	31
Malden	6,704	4	63%	19%	32
Randolph	2,858	5	66%	18%	33

Of note: These 33 districts represent 79 percent of all high poverty schools in the Commonwealth. The remaining 21 percent of high poverty schools are outlined in Appendix A.

WHERE IS THE NEED? Mapping participation and free/reduced lunch elegibility



80 percent target participation rate for high poverty schools. In Massachusetts, after the bell programs that are well planned and managed, are known to consistently reach 80 percent or higher participation. This should be every high poverty schools' breakfast participation goal. In 2016, 105 schools counted this level of participation, leaving 484 high poverty schools yet to get there.

How does after the bell breakfast work?

After the bell breakfast allows all students to eat a free, nutritious meal for 10-15 minutes in their classrooms as part of the school day. There are two primary modes of operation.

COMPARING AFTER THE BELL PROGRAMS

Grab-and-Go

Grab-and-Go (G&G) to eat in the classroom increases access and boosts participation rates, just not to the level of BIC (right).

How it works



1. Students grab a breakfast from a kiosk in a hightraffic location.



2. Students take to eat in the classroom while completing an assignment.



3. Students clean up after themselves and breakfast trash is picked up before lunch.

In the Classroom

Breakfast in the Classroom (BIC) is the gold standard of After the Bell

models for boosting access and participation in breakfast.

How it works



Meals are delivered to the classroom in insulated hot/ cold coolers.



2. Students eat while completing a designated assignment.



3. Students clean up after themselves and breakfast trash is picked up before lunch.

Average participation

63% nationally 26

To boost participation, schools offering after the bell G&G tend to do so in addition to offering a before school cafeteria option.

A few schools that operate G&G consistently reach 80 percent or higher participation; the majority of G&G programs, however, do not.²⁷

Average participation 74% nationally 24



The majority of Massachusetts schools that consistently reach 80 percent or higher participation in breakfast do so via BIC.²⁵ Over 100 MA schools consistently exceed this national average with this model.

Central High in Springfield was the first high school in the state to operate BIC. Central consistently reaches 80 percent participation rates.

Participation Is Linked to Access: Increase access, and participation will soar

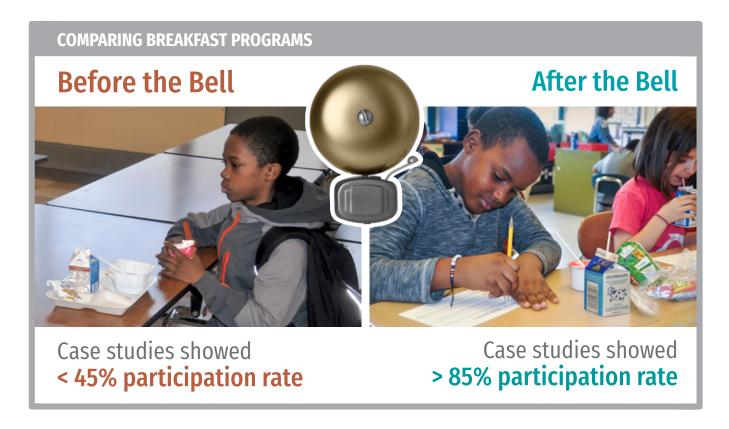
While all high poverty schools are required to operate a breakfast program, most still do so before school starts. Rushed morning schedules, crowded and intimidating cafeteria lines, and limited time to get food and eat before the bell rings, are among the well-documented barriers to participation.²³

Yet, when students are given access and time for breakfast by making it available to eat after the bell and in their classroom, participation rates skyrocket, as outlined in the examples below.

Table 2: Examples of the increase in breakfast participation when it is served after the bell

School	Enrollment	Breakfast before school, in the cafeteria	Breakfast after the bell, in the classroom
Hyannis West Elementary HYANNIS, MA	360	39%	93%
Brookfield K-8 BROCKTON, MA	712	44%	94%
Parker Middle School TAUNTON, MA	454	26%	95%
Springfield Central High SPRINGFIELD, MA	1909	20%	86%

^{*} All schools listed here operate after the bell BIC.





- classroom may initially sound like an inconvenience for the adults in the building. Really, they are expressing their fear of change and the unknown. But once BIC is up and running, the benefits speak for themselves. BIC quickly becomes the new normal. Most important, it's what's best for kids!"
 - TEACHER BOB HALL, GREYLOCK ELEMENTARY SCHOOL, NORTH ADAMS PUBLIC SCHOOLS
- for 90 percent participation in breakfast at our highneed schools because our kids don't always receive the nutrition they need to be at their best; we understand that hungry kids don't learn easily."
 - KAREN PAPPA, SCHOOL NUTRITION DIRECTOR, TAUNTON
 PURLIC SCHOOLS
- breakfast in my classroom and worried about all of the logistics. But, after establishing a routine, the students got the hang of it and took responsibility for almost all aspects of BIC. They are in charge of setting up the coolers when they walk in, cleaning up any messes, and preparing the coolers for pick-up at the end of breakfast. With BIC, I'm actually seeing better morning time on learning with students who are more alert and focused. It is a great program for kids and teachers!"
 - TEACHER TRISHE BELLOMA, MORGAN SCHOOL, HOLYOKE PUBLIC SCHOOLS

Classroom Impact

When students are not in the classroom they are not learning. After the bell breakfast results in increased time on learning by improving attendance and tardiness rates, and eliminating hunger-related morning visits to the nurse. In a state-wide survey, a majority of teachers surveyed affirmed that students' readiness to learn improved once after the bell breakfast in the classroom was implemented, with three-quarters reporting fewer hunger related nurse visits or complaints.²⁸

Additionally, schools operating after the bell breakfast in the classroom programs demonstrate an increased sense of classroom community, and with everyone eating, the stigma that only low-income students participate in school breakfast is eliminated. 29, 30

Teachers and school leaders across the state also credit the program as a strong social/emotional check-in tool.

COMMON MYTHS ABOUT SCHOOL BREAKFAST

MYTH #1 School breakfast is unhealthy.

FACT: School breakfast is healthier now more than ever. The 2010 Healthy, Hunger Free Kids Act significantly updated nutrition standards for meals served in schools. Today, breakfasts include whole grain cereals, yogurt, warm egg sandwiches, fresh fruit, juice, and milk. Variety is available for after the bell programs including cafeteria baked muffins made with local, and school garden-sourced ingredients.

MYTH #2 | Eating in the classroom will make a mess.

FACT: Teachers establish breakfast routines and cleaning protocols; students learn their roles and clean up after themselves. Custodians are also involved to identify school-specificclean-upprotocols. With the need to clean the cafeteria between breakfast and lunch eliminated, custodians have time to remove classroom trash.

MYTH #3

School breakfast, especially breakfast in the classroom, is disruptive, and takes away valuable teaching time.

FACT: Breakfast in the classroom has proven to be a successful model in many schools across the nation. Some teachers report they have gained instructional time due to fewer disruptions such as visits to the school nurse, tardiness, and absenteeism. They now take attendance, engage students in "chew and do" and housekeeping activities during classroom breakfast time. In addition, teachers report that the quality of instruction improves when students eat breakfast because the children are more alert and ready to learn.

My school has many students with MYTH #4 | allergies and so we cannot serve breakfast in the classroom.

FACT: Managing food allergies in the classroom is no different than managing food allergies in the cafeteria. School nutrition staff work with school nurses and teachers to ensure allergies are identified and appropriate steps, such as special meal labels for students with allergies, are taken.

MYTH #5 | Eating in the classroom will bring pests.

FACT: Schools have not reported an increase in pests due to breakfast eating in the classroom. If a classroom had pests before implementing an after the bell eat in the classroom program and does not address the problem before implementation, those pests will remain. Teachers are known to establish cleanliness. routines and teach students to follow them.



- 66 All the research proves that proper nourishment is an important part of the learning process, especially in children. For the third year in a row, our students' academic achievements in English Language Arts and Math have exceeded their peers throughout the state, our attendance rate is higher than it's ever been, and our graduation rate is on the rise. Providing breakfast as part of the school day is a key contributor to this success."
 - DANIEL WARWICK, SUPERINTENDENT OF SPRINGFIELD PUBLIC SCHOOLS

Cost: The Dollars and Cents of Breakfast



Springfield's leadership on After the Bell, BIC is making a big impact. Springfield is among the first districts in the Commonwealth on a path to operate after the bell BIC district-wide. Since piloting the program at Brightwood Elementary in school year 2012/2013:



- Two-thirds of the district's schools operate after the bell BIC,
- 5,000 more students are participating in breakfast each school day,
- USDA breakfast reimbursements increased from \$2.5 million to \$5.7 million, and
- 35 jobs with benefits have been created in this Gateway City.

Increased revenues are being invested into a 21st Century Culinary and Nutrition Center that will support scratch cooked and baked meals across the district and region, expand farm to school operations, provide student-learning and co-op opportunities, and create an additional 15 full time benefited positions.

In high poverty schools operating after the bell breakfast, increased student participation greatly increases revenue. Springfield Public Schools alone have brought in an additional \$3.2 million annually in USDA reimbursements since 2013 (see below for a look at Springfield's breakfast initiative).

The School Breakfast Program is a federally funded meal program available to public and nonprofit private schools. Districts are reimbursed by the U.S. Department of Agriculture (USDA) based on meals served by student eligibility category [i.e., free (F), reduced (R), or paid].

High poverty schools qualify for "severe need" reimbursement rates. In school year 2015/2016, "severe need" schools were reimbursed by the USDA \$1.99 for each free breakfast served, \$1.69 for each reduced breakfast, and \$0.29 for each full price breakfast.

Looking at our state's highest poverty schools, nearly 300,000 children were eligible for a free breakfast in 2016. Roughly 150,000 students received school breakfast, leaving half of their peers unserved. If these schools operated after the bell breakfast programs and reached 80 percent participation rates, they would down an additional \$30 million in USDA reimbursements each year.

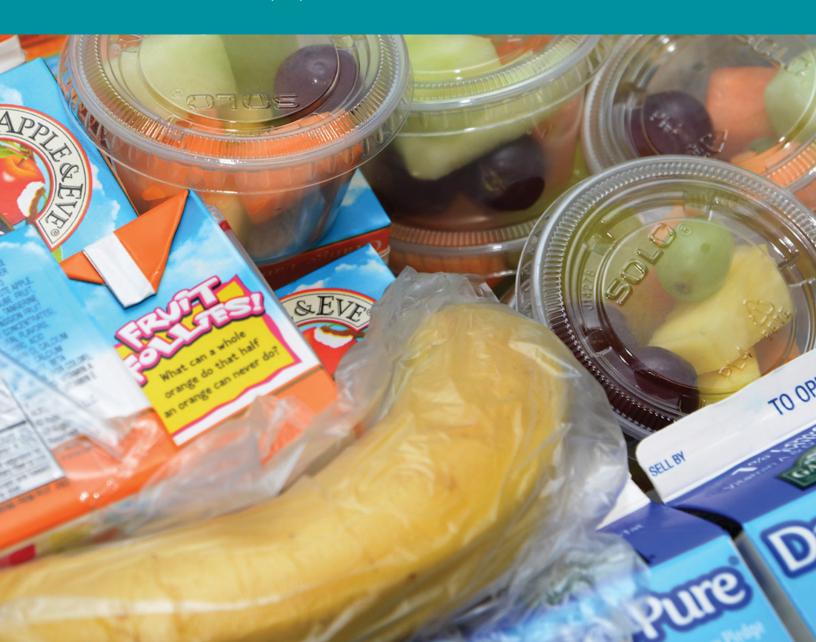
- (BIC) is helping us close the achievement gap. We were a Level 3 school and now we're a Level 1. BIC was the only intervention we made during the year it took to make this change. No new curriculum, no more specialists, we just fed kids and that has made all the difference."
 - PRINCIPAL GINGER COLEMAN, GENERAL JOHN J.
 STEFANIK SCHOOL, CHICOPEE PUBLIC SCHOOLS



Resources

Funding and technical assistance to help launch after the bell breakfast is available from the following organizations. Refer to Appendix C for more information.

- Eos Foundation eosfoundation.org
- The New England Dairy & Food Council (NEDFC) newenglanddairycouncil.org
- Fuel Up to Play 60 newenglanddairycouncil.org/schools/fuel-up-to-play-60
- Massachusetts School Breakfast Challenge maschoolbreakfast.org/Funding-Opportunities.php
- Child Nutrition and Outreach Program (CNOP) at Project Bread meals4kids.org/about-cnop
- Massachusetts Department of Elementary & Secondary Education (DESE) doe.mass.edu/cnp/nprograms
- School Nutrition Association (SNA) schoolnutrition.info



Recommendations

The problem is simple and so is the solution: hunger impedes learning and achievement in our schools, and transitioning to after the bell breakfast programs is a game-changer for children in high need schools. For a state that invests heavily in public health and education programs, expanding after the bell breakfast programming makes sense.

By coordinating efforts, our Commonwealth can provide a better future for children in the state. Stakeholders including superintendents, school nutrition directors, principals, teachers, parents, advocates, and legislators all have a role to play.

What can you do?

School leaders including: Superintendents, Principals, Teachers, Nurses, School Nutrition Directors, & School Committee Members

- Adopt after the bell programming.
- Visit a school operating after the bell and talk with your peers in that district about their experience.
- Identify school-based teams to develop an implementation plan in each high poverty school in your district.
- Tap into the available grant dollars and technical support to launch your after the bell program.

Parents and Caregivers

- Advocate for after the bell breakfast.
- Volunteer to help launch or operate after the bell programs in your child's school.

Legislators

- If you represent a low-income district, ask your school leaders if they offer free after the bell breakfast at all schools, including high schools.
- Five states and Washington, D.C. have already used legislation to boost school breakfast participation and improve outcomes for kids: CO, IL, NM, NV, and WV.

APPENDIX A: Qualifying populations

Nearly 600 schools across the Commonwealth have student populations in which 60 percent or more of their students qualify for free or reduced price meals or operate the Community Eligibility Provision (CEP). The majority of these schools operate in the 33 poverty districts listed earlier in this report, with 123 schools operating in the districts and charter schools listed below.

Table 2: By public district, schools with greater than 60 percent populations qualifying for free and reduced price meals.

Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Adams-Cheshire Regional Schools			
C.T. Plunkett Elementary School	453	71.03%	29.97%
Amherst-Pelham Regional Schools			
H.E.C. Academy	31	67.74%	56.64%
South East Campus	14	100.00%	88.60%
Barnstable Public Schools			
Hyannis West Elementary	360	100.00%	92.53%
Bellingham Public Schools			·
Primavera Educational Center	36	80.56%	71.53%
Beverly Public Schools			
Northshore Academy Lower School	42	61.90%	67.14%
Northshore Academy Upper School	118	88.98%	13.16%
Cambridge Public Schools			
Fletcher Maynard Academy	253	64.82%	68.56%
High School Extension Program (HSEP)	22	68.18%	27.32%
Putnam Avenue Upper School	252	62.70%	17.26%
Dennis-Yarmouth Regional Schools			
Marguerite E. Small Elementary School	230	66.09%	40.08%
Dudley-Charlton Regional Schools			
Southern Worcester County Education Collaborative	75	72.00%	49.28%
Framingham Public Schools			
Barbieri Elementary School	694	66.28%	27.11%
Brophy Elementary School	526	70.53%	51.61%
Cameron Middle School	533	62.85%	22.79%
Framingham High School Thayer Campus	48	89.58%	79.07%
Fuller Middle School	471	64.12%	18.47%
McCarthy Elementary School	592	61.15%	25.06%
Woodrow Wilson Elementary School	578	84.95%	34.83%
Greater Lowell Regional District			
Greater Lowell Technical High School	2172	60.64%	22.68%

Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Greater New Bedford Regional District			
Greater New Bedford Regional Vocational Technical High School	2143	85.81%	22.47%
Greater Lawrence Technical School			
Greater Lawrence Technical School	1392	80.39%	38.39%
Haverhill Public Schools			
Bartlett School	158	62.66%	12.36%
Consentino Middle School	1017	69.03%	32.60%
Dr. Paul Nettle Middle School	502	65.14%	19.91%
Golden Hill Elementary School	554	71.48%	32.78%
Halt High School and Middle School	32	96.88%	65.60%
Pentucket Lake Elementary School	523	65.39%	38.99%
Tilton School	533	79.17%	37.03%
Hawlemont Regional School District			
Hawlemont Regional Elementary School	102	83.33%	11.18%
Leominster Public Schools			
Northwest Elementary School	669	62.48%	20.31%
Priest Street School	123	69.11%	39.80%
Southeast Elementary School	570	67.54%	83.48%
Medford Public Schools			
Curtis-Tufts Alternative School	18	61.11%	13.68%
North River Collaborative			
North River School	53	100.00%	44.80%
Peabody Public Schools			,
William A. Welch Elementary	351	71.51%	60.34%
Plymouth Public Schools	'		,
Hedge Elementary School	201	67.66%	27.38%
Provincetown Public Schools	'		
Provincetown Schools	102	60.78%	22.28%
Quaboag Regional School District	'		
Warren Community Elementary School	500	75.20%	31.01%
Quincy Public Schools	,		,
F.W. Parker Elementary School	303	75.58%	16.49%
Quincy High School (GOALS program)	31	61.29%	53.78%
Lincoln-Hancock Community School	468	61.97%	17.84%
Point Webster Middle School	344	61.34%	12.54%
Reay E. Sterling Middle School	338	64.20%	17.23%

Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate	
Snug Harbor Elementary School	296	88.18%	43.17%	
South Middlesex Regional Vocational Technical				
Joseph P Keefe Technical High School	710	64.37%	36.69%	
Stoughton Public Schools				
West Elementary School	361	70.08%	25.29%	
Wales Public Schools				
Wales Elementary School	169	82.25%	60.45%	
Waltham Public Schools				
Henry Whittemore Elementary School	419	94.03%	37.28%	
Westfield Public School District				
Abner Gibbs Elementary School	217	67.74%	24.60%	
Franklin Avenue Elementary School	240	72.50%	36.87%	
Highland Elementary School	411	72.51%	32.20%	
Woburn Public Schools				
Shamrock Elementary School	239	62.34%	21.15%	

Table 3: Charter public schools with greater than 60 percent populations qualifying for free and reduced price meals.

Charter Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Abby Kelley Foster Regional Charter School			
Abby Kelley Foster Elementary School	596	69.30%	57.54%
Abby Kelley Foster High School	349	61.03%	13.98%
Abby Kelley Foster Middle	482	62.24%	23.08%
Academy of Strategic Learning Charter			
Academy of Strategic Learning Charter	28	100.00%	66.67%
Alma Del Mar Charter School			
Alma Del Mar Charter School	284	99.30%	63.25%
Argosy Collegiate Charter School			
Argosy Collegiate Charter School	204	61.76%	34.10%
Baystate Academy Charter Public School			
Baystate Academy Charter Public School	299	100.00%	55.17%
Benjamin Benneker Charter School			
Benjamin Benneker Charter Public School	348	93.39%	34.44%
Boston Preparatory Charter School			

Charter Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Boston Preparatory Charter School	411	64.48%	3.86%
Boston Renaissance Charter School			
Boston Renaissance Charter Pub	944	81.25%	52.89%
Bridge Boston Charter School			
Bridge Boston Charter School	115	100.00%	0.93%
Bridge St. Marks	115	100.00%	0.91%
City on a Hill Charter Public Schools			
City on a Hill New Bedford	132	84.09%	27.55%
City on a Hill Dudley Square	243	69.14%	24.01%
City on a Hill Circuit Street	283	72.44%	50.49%
Codman Academy Charter School	'		
Codman Academy Charter Public School	139	79.14%	50.04%
Codman Academy Lower School	177	77.97%	70.69%
Community Charter School	•		
Community Charter School of Cambridge	403	84.62%	24.46%
Community Day Charter Public School			
Community Day Charter R. Kingman Webster ELC	127	100.00%	49.25%
Community Day Charter R. Kingman Webster LS	114	100.00%	72.52%
Community Day ELC - Hampshire Street	119	100.00%	34.97%
Community Day Charter Public LS/US - Prospect	298	100.00%	22.11%
Community Day Gateway LS - Pleasant Street	116	86.21%	37.39%
Community Day Charter Gateway ELC	124	100.00%	66.28%
Dudley Street Neighborhood Charter School			
Dudley Street Neighborhood Charter	268	90.67%	52.97%
(Edward) Brooke Charter Schools		l	l
Brooke Roslindale	508	78.74%	30.81%
Brooke Mattapan	496	77.22%	39.62%
Brooke East Boston	500	80.40%	37.70%
Excel Academy Charter Schools			l
Excel Academy East Boston	224	76.79%	24.12%
Excel Academy Charter High School	115	78.26%	46.28%
Excel Academy Orient Heights	228	77.63%	17.58%
Excel Academy Chelsea	224	89.29%	48.26%
Global Learning Charter School			
Global Learning Charter Public School	504	68.65%	21.75%
Hampden Charter School of Science			

Charter Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Hampden Charter School of Science	422	100.00%	29.95%
Helen Y. Davis Leadershp Academy Charter Public School			
Helen Y. Davis Leadership Academy	218	93.58%	49.74%
Holyoke Community Charter School			
Holyoke Community Charter School	702	96.01%	92.95%
KIPP Academy Boston Charter School			
KIPP Academy Boston Middle School	285	81.75%	49.16%
KIPP Academy Boston Elementary	146	90.41%	28.28%
KIPP Academy Lynn Charter Schools			
KIPP Academy Lynn Middle	478	84.94%	23.97%
KIPP Academy Lynn Collegiate	420	82.86%	22.70%
KIPP Academy Lynn Elementary	121	85.12%	59.24%
Lawrence Family Development Charter School			
Academy for Early Academic Preparation	247	84.62%	35.54%
Lower School	223	92.83%	46.91%
Upper School	229	94.32%	56.51%
Lowell Community Charter Public School			
Lowell Community Charter Public School	820	98.66%	58.00%
Lowell Middlesex Academy Charter School			
Lowell Middlesex Academy Charter School	103	100.00%	6.30%
Martin L. King, Jr. Charter School of Excellence			
Martin L. King, Jr. Charter School of Excellence	362	100.00%	97.57%
Match Charter Public School			
Match High School	291	100.00%	10.46%
Match Middle School	229	95.63%	35.64%
Match Community Day	387	70.28%	59.74%
Match Next	143	91.61%	47.48%
Neighborhood House Charter School			
Neighborhood House Charter School	400	61.50%	41.93%
Paulo Freire Social Justice Charter School			
Paulo Freire Social Justice Charter School	315	65.40%	30.78%
Phoenix Charter Academy			
Phoenix Charter Academy - Chelsea	200	95.50%	3.96%
Phoenix Charter Academy - Springfield	223	100%	21.69%
Phoenix Charter Academy - Lawrence	123	100%	21.67

Charter Public Schools	Enrollment	Free & Reduced Population	Breakfast Participation Rate
Prospect Hill Academy Charter School			
Prospect Hill Academy Early Childhood	356	72.19%	29.56%
Prospect Hill Academy Upper Elementary	290	72.07%	19.08%
Roxbury Preparatory Charter School			
Mission Hill Campus	332	84.04%	38.10%
Dorchester Campus	316	92.09%	53.64%
Roxbury Prep High School	164	88.41%	9.09%
Lucy Stone Campus	324	88.27%	24.50%
SABIS® International Charter School of Springfield			
SABIS® International Charter School	1564	63.68%	29.45%
Seven Hills Charter Public School			
Seven Hills Charter Public School	687	90.83%	93.67%
Springfield Prep Charter School			
Springfield Prep Charter School	108	89.81%	55.17%
Veritas Preparatory Charter School			
Veritas Prep	298	83.22%	25.70%

APPENDIX B: Categorizing students as "free," "reduced," or "paid"

School meal eligibility, counting and claiming, is largely unchanged by the new economically disadvantaged metric. High poverty districts can either continue to collect free (F) and reduced (R) price meal applications from students' families, or they can adopt the Community Eligibility Provision (CEP) to determine student meal eligibility.

CEP is a powerful tool to both improve child nutrition and reduce administrative burdens at the school levels. USDA and the Massachusetts Department of Elementary and Secondary Education (DESE) strongly support CEP, which gives students the opportunity to learn and thrive by ensuring that every child receives healthy school breakfast and lunch at no charge. Increasingly high need districts are enrolling in CEP to relieve the administrative burden of collecting applications and boost the bottom line for their nutrition departments.

Here is how each works.

Meal Application Collection

Students categorized as "free," "reduced," or "paid"

Some schools continue to collect meal applications that identify students for "free," "reduced," or "paid" meals based on household income.

The number of "free" and "reduced" applications at these schools determines each school's free and reduced population percentage. For example: Lafayette Elementary School in Everett: enrollment 966, a total of 673 applications identified students to receive "free" meals, and 114 students were identified to receive "reduced" price meals. When combined. we see a free and reduced rate of 81.5 percent at this school.

Community Eligibility Provision (CEP)

Students categorized as "free" or "paid"

- CEP eliminates the reduced meal category, and students and the meals they eat are categorized as either "free" or "paid."
- The percentage of students that fall into the "free" and "paid" categories is determined by each school's Identified Student Percentage or ISP rate.

Determining an "Identified Student Percentage" (ISP) rateAn ISP rate is the number of students either:

- Directly certified or enrolled in free school meals based on their registration for SNAP, TAFDC, and some categories of MassHealth, or
- 2) Designated in Head Start, foster care, as migrant, runaway, or homeless.
- The USDA has assigned a 1.6 multiplier to each school's ISP rate to determine the percentage of "free" and "paid" students in each school (up to 100 percent). Meal claims are matched to this same "free" and "paid" student percentage. For example: Bates Elementary School in Salem, enrollment 307, has an ISP rate of 56.3. Multiplying 56.3 by 1.6 results in a 90 percent ISP rate. This is the school's "free" enrollment rate, and means that 90 percent of students at the school receive "free" meals. The F/R data in this report card is predicated on this methodology.
- When a district submits their meal claims, the total meals are divided by the established ISP rate. So, if 5,000 breakfasts were served in one month, 90 percent - or 4,500 breakfasts – would receive reimbursement at the "free" rate, and the remaining would be reimbursed at the "paid" rate.

APPENDIX C: Resources: funding and technical assistance to help launch After the Bell Breakfast

Opportunities for funding and technical assistance to increase school breakfast participation are available to schools and districts in Massachusetts through support from:

- **Eos Foundation eosfoundation.org**: Eos funds high-poverty schools and districts eager to make breakfast part of the school day by implementing after the bell BIC programming. One-time grants of up to \$10,000 are available along with tailored technical assistance to support BIC launch efforts. Eos also celebrates school breakfast success at the annual Healthy Start Awards Ceremony which recognizes schools with 80% participation rates in school breakfast with a \$500 unrestricted grant award.
- Fuel Up to Play 60 and the New England Dairy & Food Council (NEDFC) newenglanddairycouncil.org/schools/fuel-up-to-play-60: Fuel Up to Play 60 is an in-school nutrition and physical activity program launched by the National Dairy Council and the NFL, in collaboration with the USDA. In Massachusetts, the New England Dairy & Food Council and the New England Patriots support and celebrate Fuel Up to Play 60 grants which encourage youth to fuel up with healthy foods and be active for 60 minutes every day. Grants are available for any school that operates a breakfast program. Supported by dairy farmers of New England and Eastern New York, NEDFC also offers grants and technical assistance to boost school breakfast and summer participation across Massachusetts.
- Massachusetts School Breakfast Challenge maschoolbreakfast.org/Funding-Opportunities.php:
 Since 2013, the Challenge has worked to raise visibility for school breakfast, encouraged strategies to
 increase participation, and recognized schools across Massachusetts for their efforts to boost breakfast
 participation. Challenge partners include all groups listed here as well as the Massachusetts Department
 of Agricultural Resources. The Challenge website is a central resource that highlights grant and technical
 assistance opportunities for schools interested to improve breakfast participation.
- Child Nutrition and Outreach Program (CNOP) at Project Bread meals4kids.org/about-cnop: Funded by the Massachusetts Department of Elementary and Secondary Education (DESE) and administered by Project Bread, CNOP has been supporting school nutrition directors, superintendents, principals, and school personnel since 1994 to improve participation in school breakfast and summer meals across Massachusetts. CNOP staff work with school teams to identify and implement school breakfast participation improvements including adoption of after the bell programs.
- Massachusetts Department of Elementary and Secondary Education (DESE) doe.mass.edu/cnp/ nprograms: Within DESE, the Office for Food and Nutrition Programs is responsible for ensuring school meal program integrity, managing USDA and state reimbursements for school meals, administering USDA and state grants that support school meal programs, and serving as a resource for school nutrition directors across the state.
- School Nutrition Association (SNA) schoolnutrition.info: SNA of Massachusetts is a state affiliate of the national School Nutrition Association. The organization brings information, services and continuing education to school nutrition professionals in Massachusetts including information on strategies to boost school breakfast participation at all schools across the Commonwealth. Numerous SNA MA members have launched after the bell BIC programs and serve as resources to their peers.



Children's HealthWatch is a nonpartisan network of pediatricians, public health researchers, and children's health and policy experts. Our network is committed to improving children's health in America. We do that by first collecting data in urban hospitals across the country on infants and toddlers from families facing economic hardship. We then analyze and share our findings with academics, legislators, and the public. These efforts help inform public policies and practices that can give all children equal opportunities for healthy, successful lives.



The Eos Foundation is a private philanthropic foundation committed to breaking the cycle of poverty by investing in children's futures. Eos is a longtime funder of anti-hunger organizations. Since 2013, the Foundation has been a proud funder of free, after the bell breakfast in the classroom (BIC) programming across Massachusetts. Eos provides start-up grants of up to \$10,000 to help schools launch after the bell BIC, and also celebrates school breakfast excellence with a \$500 grant to schools with 80% participation rates in breakfast at an annual Healthy Start Awards Ceremony event in Boston. For more information about the Eos Foundation please visit www.EosFoundation.org.

References

- Feeding America. Map the Meal Gap: Massachusetts. 2014. Available: http://map.feedingamerica.org/county/2014/child/massachusetts
- This reimbursement total is based on the ambitious, but achievable goal of reaching 80 percent participation in school breakfast.
- Mahoney CR, Taylor HA, Kanarek RB, and Samuel P. Breakfast composition on cognitive processes in elementary school children. Physiology and Behavior, 2005;85. 635-645.
- Wesnes KA, Pincock C, Richardson D, Helm G, Hails S. Breakfast reduces declines in attention and memory over the morning in schoolchildren. Appetite. 2003;41(3):329-31.
- Pollitt E, Leibel RL, Greenfield D. Brief fasting, stress, and cognition in children. Am J Clin Nutr. 1981 Aug;34(8):1526-33.
- Murphy JM. Breakfast and Learning: An Updated Review. Journal of Current Nutrition and Food Science 3.1 (2007):3-36.
- Bartfeld JS, Ahn HM. Breakfast and the Achievement Gap Among Urban Minority Youth. J Sch Health. 2011; 81(10):635-640.
- Kleinman RE, Hall S, Green H, Korzec-Ramirez D, Patton K, Pagano ME, Murphy JM. Diet, Breakfast, and Academic Performance in Children. Annals of Nutrition & Metabolism 2002; 46 (suppl 1):24-30.
- Murphy JM. "Breakfast and Learning: An Updated Review." Journal of Current Nutrition and Food Science, 2007; 3(1): 3-36.
- Basch, CE. Breakfast and the Achievement Gap Among Urban Minority Youth. J Sch Health, 2011: 81 (10):635-640.
- Murphy JM, Pagano M, Bishop SJ. Impact of a Universally Free, In-Classroom School Breakfast Program on Achievement: Results from the Abell Foundation's Baltimore Breakfast Challenge Program. Massachusetts General Hospital, Boston, MA. Interim report; 2001.
- Share Our Strength and Dolitte. Ending Childhood Hunger: A Social Impact Analysis. Available at: https://www.nokidhungry.org/pdfs/school-breakfast-brochure.pdf
- Bernstein LS, McLaughlin JE, Crepinsek MK, Daft LM. Evaluation of the School Breakfast Program Pilot Project: Final Report. Nutrition Assistance Program Report Series, CN-04-SBP. Alexandria, VA: U.S. Department of Agriculture, Food and Nutrition Service, Office of Analysis, Nutrition, and Evaluation. 2004. (The findings on school nurse visits were only observed for the 2001-2002 school year in this report.)
- Basiotis PP, Lino M, Anand RS. Eating Breakfast Greatly Improves Schoolchildren's Diet Quality. Nutrition Insight, 15. Alexandria, VA: U.S. Department of Agriculture, Center for Nutrition Policy and Promotion. 1999.
- Bhattacharya J, Currie J, Haider SJ. Breakfast of Champions? The School Breakfast Program and the Nutrition of Children and Families. Journal of Human Resources. 2006;41 (3), 445-466.
- Clark MA, Fox MK. Nutritional Quality of the Diets of U.S. Public School Children and the Role
 of the School Meal Programs. J Am Diet Assoc. 2009: 109 (2 Supplement 1). S44-S56.
- Robinson-O'Brien R, Champoux B, Haines J, et al. Associations Between School Meals Offered Through the National School Lunch Program and the School Breakfast Program and

- Fruit and Vegetable Intake Among Ethnically Diverse, Low-Income Children. J Sch Health. 2010;80 (10): 487-492.
- Gleason PM, Dodd AH. School Breakfast Program but Not School Lunch Program Participation is Associated with Lower Body Mass Index. J Am Diet Assoc. 2009; 109 (2 Supplement 1), S118-S128.
- Millimet DL, Tchernis R, Husain M. School Nutrition Programs and the Incidence of Childhood Obesity. Journal of Human Resources. 2010;45 (3), 640-654.
- Murphy JM, Pagano ME, Nachmani J, Sperling P, Kane S, Kleinman RE. The Relationship
 of School Breakfast to Psychosocial and Academic Functioning: Cross-sectional and
 Longitudinal Observations in an Inner-city School Sample. Archives of Pediatrics and
 Adolescent Medicine. 1998;152 (9), 899-907.
- Bartfiel JS, Ahn HM. The School Breakfast Program Strengthens Household Food Security among Low-income Households with Elementary School Children. J. Nutr. 2011;141

 (3):470-475.
- 22. Massachusetts Department of Elementary and Secondary Education. January 2016. Under the Commonwealth's new "economically disadvantaged" metric, the free (F) and reduced (R) meal eligibility rate as an indicator of poverty remains largely unchanged. As such, all calculations in this report are based on F/R meal eligibility data as reported by school districts to the Massachusetts Department of Elementary and Secondary Education. Refer to Appendix A for an in-depth explanation.
- McDonnell E, Probart C, Weirich E, Hartman T, Birkenshaw P. School Breakfast Programs: Perceptions and Barriers. Journal of Child Nutrition & Management. 2004;28 (2). Available at: https://schoolnutrition.org/uploadedFiles/5_News_and_Publications/4_The_Journal_of_Child_Nutrition_and_Management/Fall_2004/4-mcdonnell.pdf
- Share our Strength. Innovative Breakfast Delivery Options. Available at: https://bestpractices.nokidhungry.org/sites/default/files/resources/innovative_breakfast_delivery_options.pdf
- 25. Eos. 2017 Healthy Start Award applications.
- Share our Strength. Innovative Breakfast Delivery Options. Available at: https://bestpractices.nokidhungry.org/sites/default/files/resources/innovative_breakfast_delivery_options.pdf
- 27. Eos. 2017 Healthy Start Award applications.
- 28. Eos. Survey of Teachers in Massachusetts. 2015.
- Haesly B, Nanney MS, Coulter S, Fong S, Pratt RJ. Impact on Staff of Improving Access to the School Breakfast Program: A Qualitative Study. J Sch Health. 2014; 84 (4): 267-274.
- Bailey-Davis L, Virus A, McCoy TA, Wojtanowski A, VenderVeur SS. Middle School Student and Parent Perceptions of Government Sponsored Free School Breakfast and Consumption: A Qualitative Inquiry in an Urban Setting. Journal of the Academy of Nutrition and Dietetics. 2013;113 (2):251-257.

