

Cohort 2008 Five-Year Graduation Rates – State Results

The Massachusetts Department of Elementary and Secondary Education (ESE) calculates and reports graduation rates as part of overall efforts to improve educational outcomes for all students. In addition, reporting graduation rates is required by the federal No Child Left Behind Act and by a National Governors Association compact that Massachusetts has signed.

The 2008 five-year cohort graduation rate is calculated as follows:

$$\frac{\text{\# of students in cohort (denominator) who graduate in 5 years or less}}{[\text{\# of 1st time entering 9th graders in 2004-05}] - \text{transfers out/deaths} + \text{transfers in}}$$

The 2008 five-year cohort graduation rate for Massachusetts public high schools was 84.2 percent which represented an increase of 3.0 percentage points when compared to the 2008 four-year rate and 0.2 percentage points when compared to the 2007 cohort five-year graduation rate.

All student subgroups had a higher 2008 five-year rate as compared to the 2008 four-year rate including students with limited English proficiency and Hispanic students achieving the largest gains of 7.0 and 6.1 percentage points respectively. While significant gaps in the graduation rates among different subgroups remain, the additional year did narrow the margin between the highest and lowest racial and ethnic groups (Asian and Hispanic) from 28.4 percentage points at the end of four years to 25.2 percentage points after five years.

Additional critical findings of the report include:

- African American males graduated at a rate that was 6.8 percentage points higher than their four-year rate and represented the largest increase of race and gender combination.
- Students in urban school districts graduated at a rate of 7.6 percentage points higher than the four-year rate.¹
- Students receiving special education services and students from low income families both had increases of over five percentage points in their five-year graduation rate.
- Students who attended more than one Massachusetts public high school had large increases in their five-year graduation rate as compared to their four-year rate.
- 73.1 percent of school districts and 64.2 percent of high schools had a higher five-year graduation rate than the state average of 84.2 percent.

¹ The Urban group includes all students in the 24 districts that participate in the Department's Urban Superintendent Network (Boston, Brockton, Cambridge, Chelsea, Chicopee, Everett, Fall River, Fitchburg, Framingham, Haverhill, Holyoke, Lawrence, Leominster, Lowell, Lynn, Malden, New Bedford, Pittsfield, Quincy, Revere, Somerville, Springfield, Taunton and Worcester).

The following tables and graphs further summarize the five-year results for the 2008 cohort. The results are based on data submitted to the ESE by school districts through the Department's Student Information Management System.

Table 1. Graduation Results for All Students and Student Subgroups²

| | 2008 Cohort # ⁴ | Graduates | | Non-Graduates ³ | | | | |
|-----------------------|----------------------------|-------------|----------------------|----------------------------|---------------------------------|------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference | Still in School | Non-Grad Completer ⁵ | GED | Dropped Out | Expelled |
| All Students | 77,383 | 84.2% | +3.0 | 2.1% | 0.9% | 3.0% | 9.8% | 0.1% |
| Female | 37,761 | 87.0% | +2.3 | 1.5% | 0.7% | 2.6% | 8.1% | 0.1% |
| Male | 39,622 | 81.5% | +3.5 | 2.6% | 1.0% | 3.3% | 11.4% | 0.2% |
| LEP ⁶ | 4,511 | 62.8% | +7.0 | 4.3% | 4.9% | 1.3% | 26.6% | 0.1% |
| Special Education | 14,629 | 69.6% | +5.5 | 7.4% | 2.3% | 3.0% | 17.5% | 0.1% |
| Low Income | 25,311 | 69.9% | +5.1 | 3.5% | 1.5% | 4.8% | 20.0% | 0.2% |
| African American | 6,877 | 74.1% | +5.7 | 4.5% | 2.1% | 2.9% | 16.1% | 0.4% |
| Asian | 3,349 | 89.6% | +2.9 | 1.6% | 1.0% | 1.7% | 6.1% | 0.1% |
| Hispanic | 9,871 | 64.4% | +6.1 | 3.9% | 2.1% | 4.0% | 25.3% | 0.3% |
| Multi-race, Non-Hisp. | 942 | 83.6% | +3.1 | 1.6% | 1.2% | 3.7% | 9.8% | 0.1% |
| Native American | 225 | 71.1% | +4.4 | 2.2% | 1.3% | 4.9% | 20.4% | 0.0% |
| Pacific Islander | 91 | 73.6% | +3.3 | 4.4% | 3.3% | 5.5% | 13.2% | 0.0% |
| White | 56,028 | 88.6% | +2.0 | 1.5% | 0.5% | 2.8% | 6.5% | 0.1% |
| Urban | 24,035 | 71.2% | +7.6 | 3.8% | 1.6% | 4.4% | 18.8% | 0.2% |

² Due to rounding, row percentages may not equal 100 percent.

³ In the reporting of aggregate results, students are included in the first column (from left to right) for which they qualify. For example, students who dropped out or were expelled, but earned a GED, are included in the GED category. Students are only reported in one category.

⁴ The cohort count is as of the end of 2007-08 school year. The status (e.g. graduate, enrolled) is updated as of October 1, 2009.

⁵ Non-Grad Completer includes 1) students who earned a certificate of attainment, 2) students who met local graduation requirements but the district does not offer certificates of attainment, 3) students with special needs who reached the maximum age (22) but did not graduate and 4) students that transferred after the cohort freeze

⁶ The limited English proficient, special education, and low income subgroups include all students that were reported in those categories at least once in high school. Students can be counted in more than one group.

Table 2. Graduation Results for Race/Ethnicity Groups by Gender

| | 2008 Cohort # | Graduates | | Non-Graduates | | | | |
|-------------------------|---------------|-------------|----------------------|-----------------|--------------------|-------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference | Still in School | Non-Grad Completer | GED | Dropped Out | Expelled |
| African American Female | 3,404 | 78.7% | +4.5 | 3.2% | 2.0% | 2.5% | 13.5% | 0.1% |
| African American Male | 3,473 | 69.5% | +6.8 | 5.7% | 2.1% | 3.3% | 18.7% | 0.6% |
| Asian Female | 1,595 | 91.5% | +2.2 | 1.1% | 0.9% | 1.4% | 5.1% | 0.1% |
| Asian Male | 1,754 | 87.8% | +3.4 | 1.9% | 1.0% | 2.1% | 7.0% | 0.2% |
| Hispanic Female | 4,759 | 69.8% | +5.4 | 2.9% | 2.0% | 3.9% | 21.2% | 0.1% |
| Hispanic Male | 5,112 | 59.3% | +6.7 | 4.9% | 2.2% | 4.2% | 29.1% | 0.4% |
| Multi-race Female | 476 | 87.6% | +3.1 | 1.1% | 0.8% | 4.2% | 6.3% | 0.0% |
| Multi-race Male | 466 | 79.6% | +3.2 | 2.1% | 1.5% | 3.2% | 13.3% | 0.2% |
| Native American Female | 106 | 75.5% | +5.7 | 2.8% | 0.0% | 2.8% | 18.9% | 0.0% |
| Native American Male | 119 | 67.2% | +3.3 | 1.7% | 2.5% | 6.7% | 21.8% | 0.0% |
| Pacific Islander Female | 40 | 62.5% | +2.5 | 5.0% | 0.0% | 10.0% | 22.5% | 0.0% |
| Pacific Islander Male | 51 | 82.4% | +4.0 | 3.9% | 5.9% | 2.0% | 5.9% | 0.0% |
| White Female | 27,381 | 90.8% | +1.5 | 1.1% | 0.4% | 2.5% | 5.2% | 0.0% |
| White Male | 28,647 | 86.6% | +2.5 | 1.9% | 0.6% | 3.2% | 7.6% | 0.2% |

Table 3. Graduation Results for Students Receiving Special Education Services by Gender

| | 2008 Cohort # | Graduates | | Non-Graduates | | | | |
|--------------------|---------------|-------------|-----------------------|-----------------|--------------------|------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference. | Still in School | Non-Grad Completer | GED | Dropped Out | Expelled |
| Special Ed. Female | 5,269 | 72.3% | +4.9 | 7.0% | 2.1% | 2.8% | 15.8% | 0.0% |
| Special Ed. Male | 9,360 | 68.1% | +5.9 | 7.7% | 2.4% | 3.2% | 18.5% | 0.2% |

Table 4. Graduation Results for Limited English Proficient Students by Gender

| | 2008 Cohort # | Graduates | | Non-Graduates | | | | |
|----------------------------------|---------------|-------------|----------------------|-----------------|--------------------|------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference | Still in School | Non-Grad Completer | GED | Dropped Out | Expelled |
| LEP Female | 2,165 | 67.2% | +6.5 | 3.8% | 5.3% | 1.5% | 22.2% | 0.0% |
| LEP Male | 2,346 | 58.8% | +7.6 | 4.7% | 4.6% | 1.1% | 30.6% | 0.2% |
| LEP in Original Cohort | 1,827 | 64.2% | +4.7 | 4.1% | 2.8% | 1.5% | 27.1% | 0.1% |
| LEP Entered Cohort after 10/1/04 | 1,007 | 60.4% | +11.0 | 4.4% | 8.5% | 0.8% | 25.6% | 0.1% |

Table 5. Graduation Results for Race/Ethnicity by Limited English Proficient Status

| | 2008 Cohort # | Graduates | | Non-Graduates | | | | |
|--------------------------|---------------|-------------|----------------------|-----------------|--------------------|------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference | Still in School | Non-Grad Completer | GED | Dropped Out | Expelled |
| African American LEP | 760 | 69.7% | +9.3 | 3.8% | 9.1% | 0.1% | 17.2% | 0.0% |
| African American Non-LEP | 6,117 | 74.6% | +5.2 | 4.6% | 1.2% | 3.2% | 15.9% | 0.4% |
| Asian LEP | 680 | 82.6% | +8.6 | 2.5% | 2.9% | 1.2% | 10.6% | 0.1% |
| Asian Non-LEP | 2,669 | 91.3% | +1.3 | 1.3% | 0.4% | 1.9% | 4.9% | 0.1% |
| Hispanic LEP | 2,382 | 53.4% | +6.7 | 5.4% | 4.8% | 1.6% | 34.6% | 0.2% |
| Hispanic Non-LEP | 7,489 | 67.8% | +5.8 | 3.5% | 1.2% | 4.8% | 22.3% | 0.3% |
| Multi-race LEP | 23 | 52.2% | +4.4 | 0.0% | 17.4% | 0.0% | 30.4% | 0.0% |
| Multi-race Non-LEP | 919 | 84.4% | +3.1 | 1.6% | 0.8% | 3.8% | 9.3% | 0.1% |
| Native American LEP | 10 | 70.0% | 0.0 | 0.0% | 0.0% | 0.0% | 30.0% | 0.0% |
| Native American Non-LEP | 215 | 71.2% | +4.7 | 2.3% | 1.4% | 5.1% | 20.0% | 0.0% |
| Pacific-Islander LEP | 6 | 83.3% | 0.0 | 0.0% | 16.7% | 0.0% | 0.0% | 0.0% |
| Pacific Islander Non-LEP | 85 | 72.9% | +3.5 | 4.7% | 2.4% | 5.9% | 14.1% | 0.0% |
| White LEP | 650 | 68.6% | +4.4 | 2.6% | 2.2% | 1.7% | 24.9% | 0.0% |
| White Non-LEP | 55,378 | 88.9% | +2.0 | 1.5% | 0.4% | 2.8% | 6.2% | 0.1% |

Table 6. Graduation Results for Non-Mobile and Mobile Students⁷

| High Schools Attended | 2008 Cohort # | Graduates | | Non-Graduates | | | | |
|-----------------------|---------------|-------------|----------------------|-----------------|--------------------|------|-------------|----------|
| | | 5-Year Rate | 2008 4-Yr Difference | Still in School | Non-Grad Completer | GED | Dropped Out | Expelled |
| One School | 65,287 | 88.3% | +2.1 | 1.4% | 0.7% | 2.2% | 7.3% | 0.1% |
| Two Schools | 9,678 | 66.1% | +7.4 | 4.9% | 1.4% | 6.5% | 20.8% | 0.3% |
| Three Schools | 1,814 | 48.6% | +10.9 | 8.6% | 1.5% | 8.7% | 31.7% | 0.8% |
| Four or More Schools | 604 | 38.7% | +10.1 | 11.6% | 1.3% | 8.3% | 39.1% | 1.0% |

Table 7. Competency Determination Status for Select Non-Graduates after Five Years

| | Still in School | | | Dropped Out | | |
|-----------------------|-----------------|-------|-------|-------------|-------|-------|
| | Number | CD | No CD | Number | CD | No CD |
| All Students | 1,612 | 32.7% | 67.3% | 7,573 | 33.6% | 66.4% |
| Female | 580 | 29.5% | 70.5% | 3,039 | 34.7% | 65.3% |
| Male | 1,032 | 34.5% | 65.5% | 4,534 | 32.8% | 67.2% |
| LEP | 192 | 28.1% | 71.9% | 1,199 | 13.3% | 86.7% |
| Special Education | 1,082 | 17.3% | 82.7% | 2,564 | 27.1% | 72.9% |
| Low Income | 891 | 35.5% | 64.5% | 5,053 | 27.8% | 72.2% |
| African American | 307 | 35.8% | 64.2% | 1,105 | 27.1% | 72.9% |
| Asian | 52 | 44.2% | 55.8% | 204 | 31.9% | 68.1% |
| Hispanic | 389 | 36.0% | 64.0% | 2,497 | 20.3% | 79.7% |
| Multi-race, Non-Hisp. | 15 | 40.0% | 60.0% | 92 | 35.9% | 64.1% |
| Native American | N<6 | | | 46 | 34.8% | 65.2% |
| Pacific Islander | N<6 | | | 12 | 58.3% | 41.7% |
| White | 840 | 29.0% | 71.0% | 3,617 | 44.6% | 55.4% |

⁷ Mobility refers to the number of different high schools that the student attended within the Commonwealth. Students who never moved or moved in from another state or a private school and attended one public high school in Massachusetts are represented in the “One School” row.

Table 8. Distribution of Graduation Rates in the Aggregate for Districts⁸

| 2008 Five-Year Graduation Rate | Number of Districts Four-Year Rate | Number of Districts Five-Year Rate | Percentage of Five-Year Rate |
|---------------------------------------|---|---|-------------------------------------|
| < 50% | 9 | 5 | 1.8 |
| 50 - <60% | 5 | 4 | 1.4 |
| 60 - <70% | 12 | 9 | 3.2 |
| 70 - <80% | 43 | 31 | 11.0 |
| 80 - <85% | 33 | 32 | 11.3 |
| 85 - <90% | 65 | 53 | 18.7 |
| 90 - <95% | 81 | 83 | 29.3 |
| 95 – 100% | 36 | 66 | 23.3 |
| Total | 284 | 283 | 100 |

Table 9. Distribution of Graduation Rates in the Aggregate for Schools⁹

| 2008 Five-Year Graduation Rate | Number of School Four-Year Rate | Number of Schools Five-Year Rate | Percentage of Five-Year Rate |
|---------------------------------------|--|---|-------------------------------------|
| < 50% | 37 | 28 | 7.9 |
| 50 - <60% | 21 | 13 | 3.7 |
| 60 - <70% | 19 | 16 | 4.5 |
| 70 - <80% | 50 | 38 | 10.7 |
| 80 - <85% | 30 | 33 | 9.3 |
| 85 - <90% | 68 | 57 | 16.1 |
| 90 - <95% | 80 | 87 | 24.5 |
| 95 – 100% | 58 | 83 | 23.4 |
| Total | 363 | 355 | 100 |

⁸ Includes districts with at least six students in the cohort District analyses include charter schools, regional school districts and vocational/technical high schools.

⁹ Includes schools with at least six students in the cohort