



2017 Mathematics Results



The National Assessment of Educational Progress (NAEP) measures the progress of our nation's fourth- and eighth-graders in mathematics, reading, and various other subjects.

National results **flat overall**

Growing gap between lower- and higher-performing students at grade 8

NAEP mathematics scores are reported on a scale of 0–500. Scores are reported as a national average at grades 4 and 8. Compared to 2015, there was no significant change in the average score for mathematics at either grade. Scores were higher than those recorded in 1990, the first year of the assessment.

NAEP scores are reported at five selected percentiles to show the progress made by lower- (10th and 25th percentiles), middle- (50th percentile), and higher- (75th and 90th percentiles) performing students. Scores in mathematics decreased for lower-performing fourth-grade students and increased for higher-performing eighth-grade students compared to 2015.

Grade 4
◆ **240**

Grade 8
◆ **283**

- ◆ No significant score change since 2015
- ▲ Score increase since 2015
- ▼ Score decrease since 2015

		Grade 4	Grade 8
<i>Higher Performer</i>	90 th Percentile	◆	▲
	75 th Percentile	◆	▲
<i>Middle Performer</i>	50 th Percentile	◆	◆
<i>Lower Performer</i>	25 th Percentile	▼	▼
	10 th Percentile	▼	◆

Average scores for most states **unchanged** compared to 2015

NAEP reports average mathematics scores across the 50 states, the District of Columbia, Puerto Rico, and the Department of Defense (DS) schools to provide a closer look at where changes in student performance occurred. Results are also reported based on three achievement levels: *Basic*, *Proficient*, and *Advanced*. It should be noted that the NAEP *Proficient* achievement level does not represent grade-level proficiency, but rather competency over challenging subject matter.

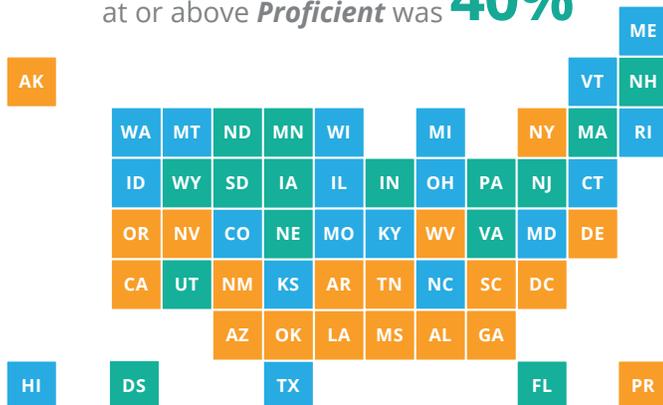
Grade 4

Score Changes	▲	FL, PR
	▼	AK, AZ, DE, LA, NC, NH, OR, SC, TN, VT

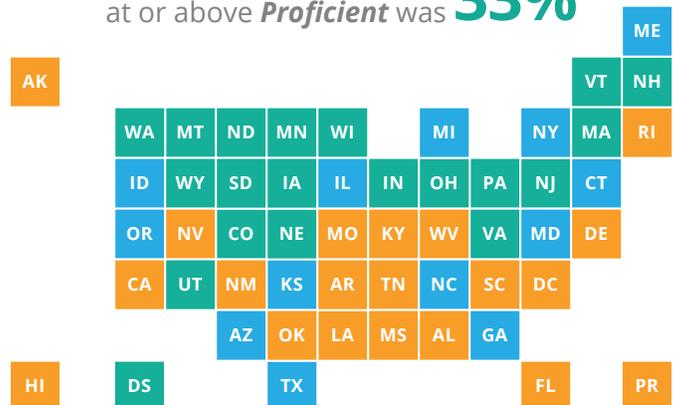
Grade 8

Score Changes	▲	DS, FL
	▼	AK, RI, VT

The 2017 **nation (public)** percentage at or above *Proficient* was **40%**



The 2017 **nation (public)** percentage at or above *Proficient* was **33%**



■ Higher percentage than nation (public)
 ■ Percentage not significantly different from nation (public)
 ■ Lower percentage than nation (public)

Few score changes in districts compared to 2015

NAEP measures student progress in America's urban districts through the Trial Urban District Assessment. Fourth- and eighth-graders in 27 urban districts participated in the mathematics and reading assessments in 2017. Changes in performance are reported for the 21 districts that also participated in 2015. The average performance of public school students in cities with a population of 250,000 or more is represented by "large city."

Grade 4 Score Changes

▲	Duval County (FL), Fresno, Miami-Dade, San Diego
▼	Charlotte-Mecklenburg, Cleveland, Dallas, Detroit

Grade 8 Score Changes

▲	None
▼	Philadelphia

% Scoring at or Above Basic	Grade 4	Grade 8
80-89	Miami-Dade, Duval County (FL), Hillsborough County (FL), Charlotte-Mecklenburg, Austin	
70-79	Nation (public), large city , Guilford County (NC), Dallas, Houston, San Diego, Boston, Chicago, Fort Worth, Clark County (NV), Jefferson County (KY)	Charlotte-Mecklenburg
60-69	New York City, Albuquerque, Atlanta, District of Columbia (DCPS), Denver, Shelby County (TN), Los Angeles, Fresno	Nation (public), large city , Austin, San Diego, Hillsborough County (FL), Boston, Duval County (FL), Chicago, Miami-Dade, Guilford County (NC), New York City, Houston
50-59	Baltimore City, Milwaukee	Clark County (NV), Denver, Jefferson County (KY), Albuquerque, Fort Worth, Dallas, Los Angeles
40-49	Cleveland, Philadelphia	Atlanta, District of Columbia (DCPS), Philadelphia, Cleveland, Shelby County (TN), Fresno, Milwaukee
30-39		Baltimore City
20-29	Detroit	Detroit

Insights into achievement and student experiences

As part of NAEP assessments, students, teachers, and school administrators answer survey questionnaires. These questionnaires provide information about students' educational experiences and factors related to students' learning both in and outside of the classroom. Results are available for the nation, states, and participating districts.

In 2017, fourth-grade students who reported working in pairs or small groups once or twice a month to once or twice a week had a higher average score than their peers who did so less or more frequently. At grade 8, students who reported working in pairs or small groups every day or almost every day scored higher than their peers who did so less frequently.

Work in pairs or small groups to talk about mathematics

