Measuring Status and Change in NAEP Inclusion Rates of Students With Disabilities

HAWAII Fact Sheet

NAEP
NATIONAL ASSESSMENT OF EDUCATIONAL PROGRESS

Key terms for tables and figures

Benchmark: a predicted inclusion rate for a state computed from the probability of inclusion of each student in that state based on the student's disability characteristics.

Nation-based approach: uses national averages to set benchmark inclusion rates for each type of student.

Jurisdiction-specific approach: uses averages in each jurisdiction to set benchmark inclusion rates for each type of student for that jurisdiction.

Status: the inclusiveness of a state or jurisdiction is measured by the difference between its actual inclusion rate and its nation-based benchmark inclusion rate in a given year.

Change: measured by change over time in the difference between a state's actual and benchmark inclusion rate. If a state is 1 point above its benchmark for inclusion in 2007 and 5 points above its benchmark in 2009 (and that change, 4 points, is statistically significant from zero) it is said to have become more inclusive from 2007 to 2009.

For additional information, refer to the report and documentation at:
http://nces.ed.gov/nationsreportcard/studies/inclusion/.

Table 1. Nation-based change measures for the inclusion of public school students with disabilities who are not English language learners in Hawaii: 2005-07, 2007-09, and 2005-09

Mathematics Grade 4	2005	2007	2009
Actual inclusion rate	85.2	90.5	88.7
Benchmark inclusion rate	82.3	84.3	83.1
Status	2.9	6.2	5.6
Change: 2005-07, 2007-09		3.3	-0.6
Change: 2005-09		2.7	

Reading Grade 4	2005	2007	2009
Actual inclusion rate	82.5	77.1	86.9
Benchmark inclusion rate	70.4	72.9	70.5
Status	12.1	4.3	16.5
Change: 2005-07, 2007-09		-7.9*	12.2*
Change: 2005-09		4.3	

Mathematics Grade 8	2005	2007	2009
Actual inclusion rate	86.1	90.8	89.5
Benchmark inclusion rate	80.4	82.8	81.2
Status	5.7	8.0	8.3
Change: 2005-07, 2007-09		2.3	0.3
Change: 2005-09		2.6	

Reading Grade 8	2005	2007	2009
Actual inclusion rate	82.4	87.6	88.6
Benchmark inclusion rate	73.7	78.1	76.1
Status	8.7	9.5	12.5
Change: 2005-07, 2007-09		0.8	3.0
Change: 2005-09		3.8	

* Statistically different from zero ($p < .05$)
NOTE: A supporting table containing the information in this exhibit can be found at http://nces.ed.gov/nationsreportcard/studies/inclusion/table1.asp
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP) 2005, 2007, and 2009 Mathematics and Reading Assessments.

Table 2. Jurisdiction-specific change measure for the inclusion of public school students with disabilities who are not English language learners in Hawaii: 2005-07, 2007-09, and 2005-09

Mathematics Grade 4	2005-07	2007-09	2005-09
Change	7.4	-1.5	5.8

Reading Grade 4	2005-07	2007-09	2005-09
Change	-4.8	7.8	3.0

Mathematics Grade 8	2005-07	2007-09	2005-09
Change	2.6	-0.8	1.7

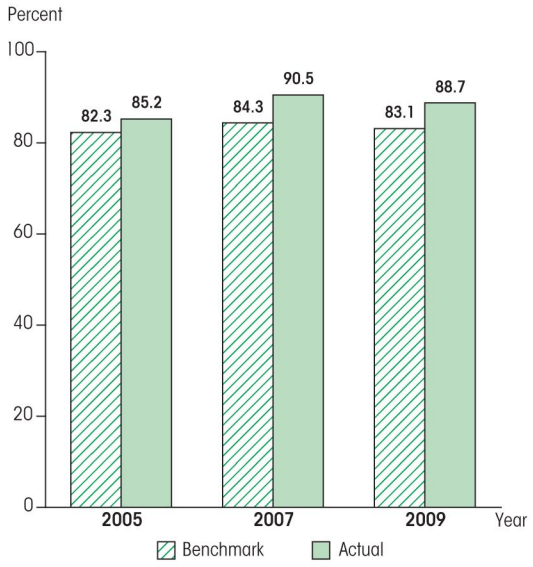
Reading Grade 8	2005-07	2007-09	2005-09
Change	2.9	2.4	5.3

* Statistically different from zero ($p < .05$)
NOTE: A supporting table containing the information in this exhibit can be found at http://nces.ed.gov/nationsreportcard/studies/inclusion/table2.asp
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP) 2005, 2007, and 2009 Mathematics and Reading Assessments.

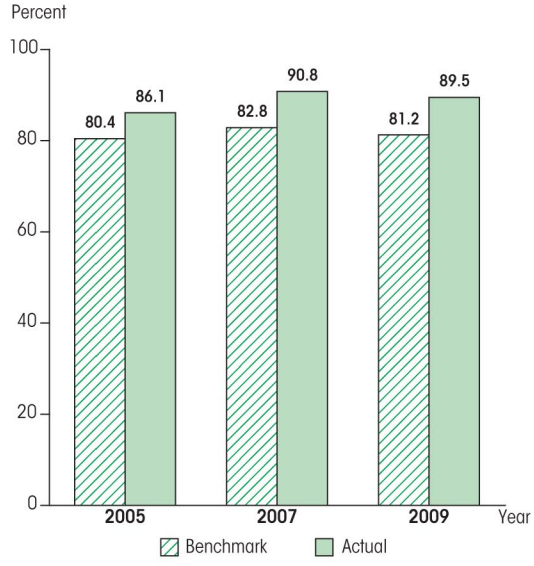
Nation-based Approach—Mathematics Results

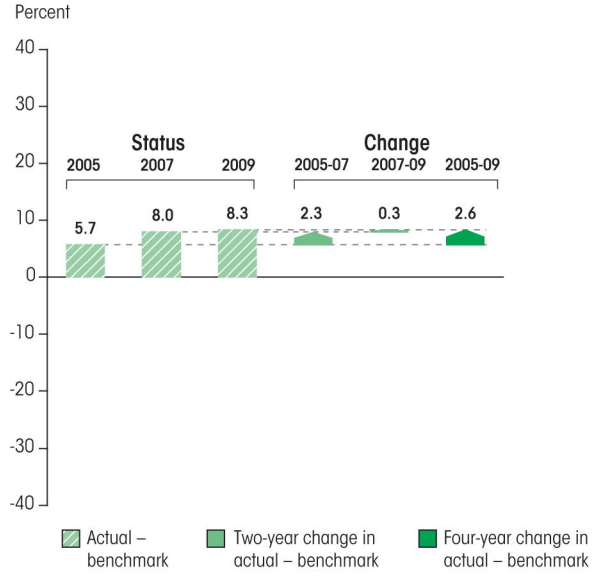
Figure 1. Nation-based benchmark and actual inclusion rates, status and change measures of public school students with disabilities who are not English language learners in Hawaii, mathematics: 2005, 2007, and 2009

Grade 4



Grade 8





* Statistically different from zero ($p < .05$)

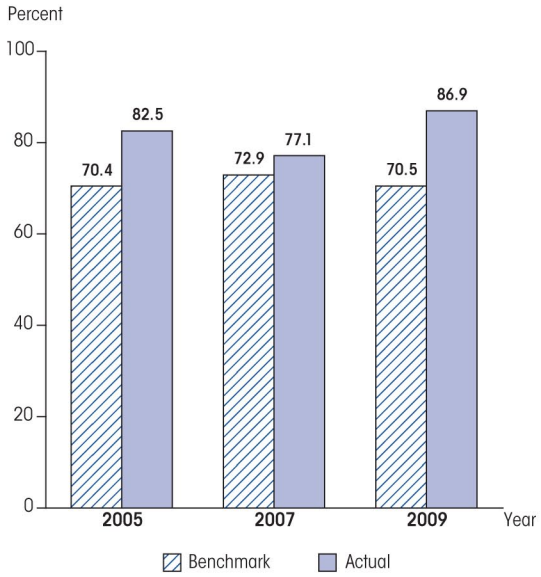
NOTE: Significance tests were performed only for the change measures. A supporting table containing the information in this exhibit can be found at http://nces.ed.gov/nationsreportcard/studies/inclusion/table1.asp

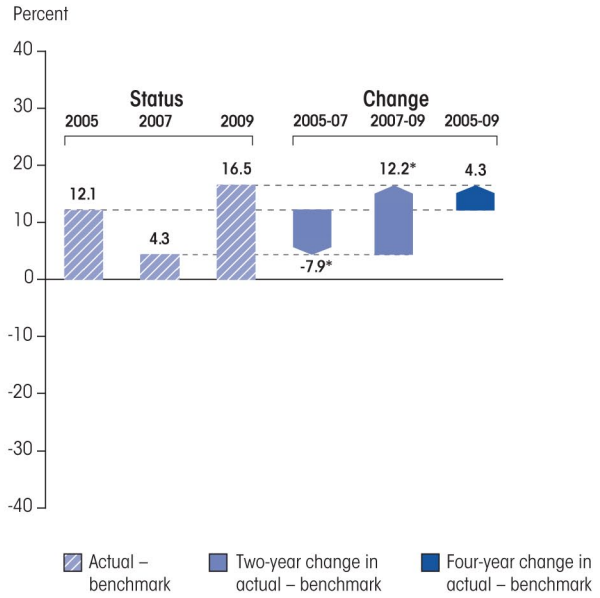
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP) 2005, 2007, and 2009 Mathematics Assessments.

Nation-based Approach—Reading Results

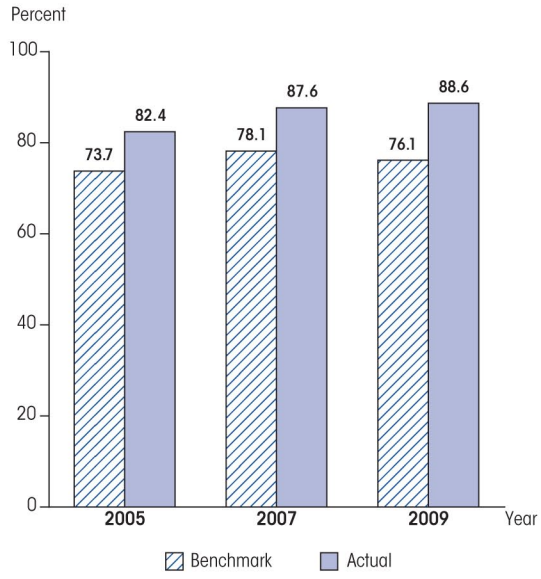
Figure 2. Nation-based benchmark and actual inclusion rates, status and change measures of public school students with disabilities who are not English language learners in Hawaii, reading: 2005, 2007, and 2009

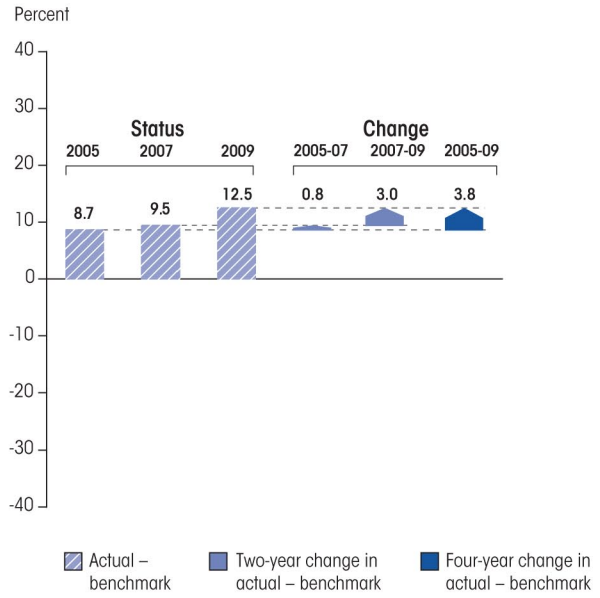
Grade 4





Grade 8





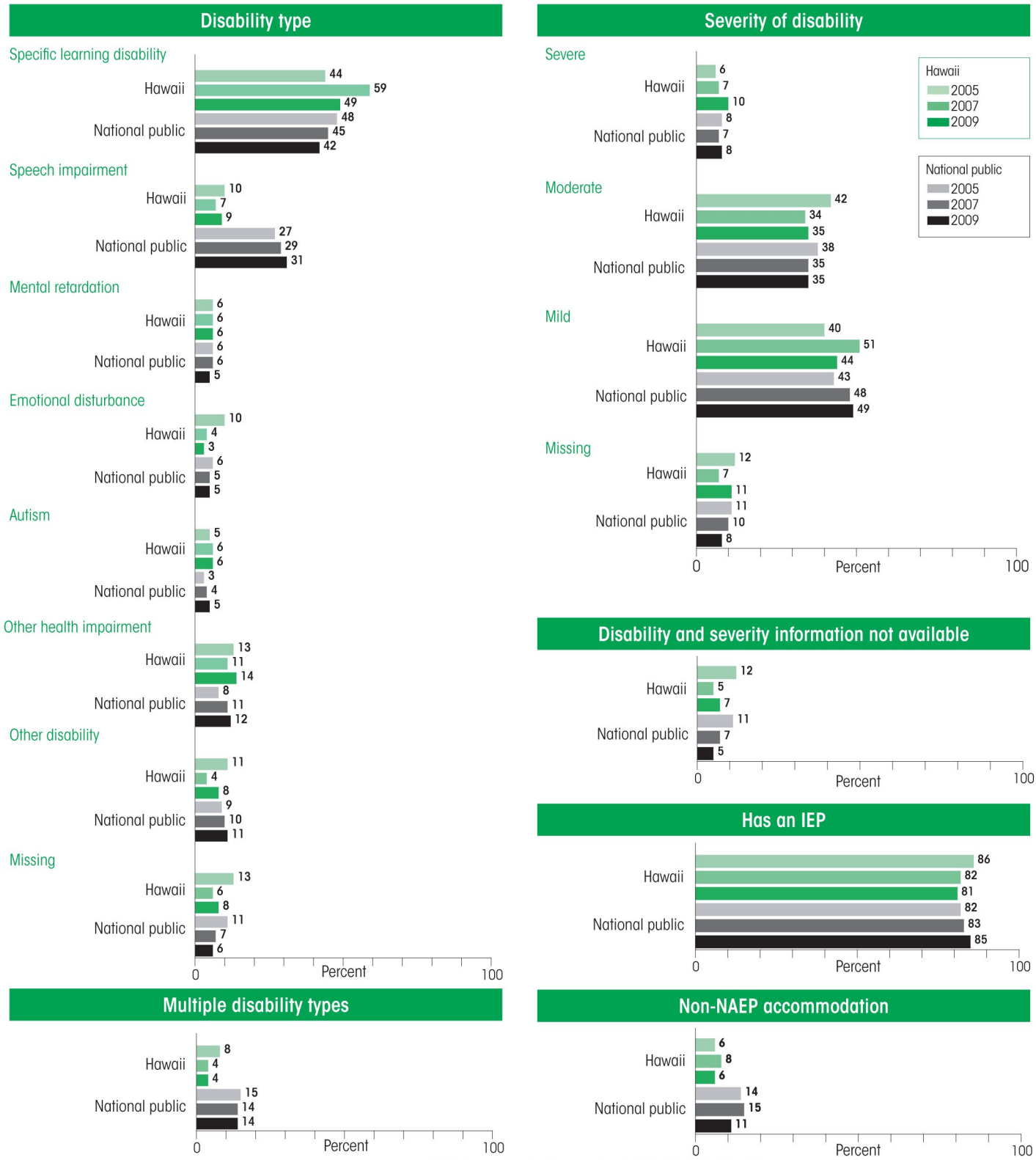
* Statistically different from zero ($p < .05$)

NOTE: Significance tests were performed only for the change measures. A supporting table containing the information in this exhibit can be found at http://nces.ed.gov/nationsreportcard/studies/inclusion/table1.asp

SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP) 2005, 2007, and 2009 Reading Assessments.

Student Characteristics

Figure 3. Percentage of public school students with disabilities who are not English language learners identified with a given characteristic in Hawaii compared to those in the nation, mathematics grade 4: 2005, 2007, and 2009



NOTE: A supporting table containing the information in this exhibit can be found at http://nces.ed.gov/nationsreportcard/studies/inclusion/figure3.asp
SOURCE: U.S. Department of Education, Institute of Education Sciences, National Center for Education Statistics, National Assessment of Educational Progress (NAEP) 2005, 2007, and 2009 Mathematics Assessments.