



# Patterns and Trends in Grade Retention Rates in the United States, 1995–2010

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Although grade retention may be consequential for a number of important educational and socioeconomic outcomes, we know surprisingly little about the actual rate at which students are made to repeat grades. We build on Hauser, Frederick, and Andrew's 2007 measure of grade retention using data from the 1995 through 2010 Current Population Surveys. We make technical improvements to their measure, provide more recent estimates, and validate the measure against external criteria. Our measure describes large disparities in grade retention rates by sex, race/ethnicity, geographic locale, and students' socioeconomic circumstances. However, both absolute retention rates and disparities in retention rates have declined markedly since 2005. We conclude by describing how our measures might be used to model the impact of economic and policy contexts on grade retention rates.

**Keywords:** descriptive analysis; educational policy; elementary schools; measurements; retention

Grade retention—having a student repeat a grade in school due to a lack of academic progress—is a familiar but controversial educational practice in the United States. Although we argue below that we know far too little about how often grade retention occurs, the practice may be consequential for a variety of outcomes. Retaining a student in grade may or may not impact students' academic achievement (Entwisle, Alexander, & Olson, 2003; Hong & Raudenbush, 2005; Hong & Yu, 2007; Jacob & Lefgren, 2004; Mariano & Martorell, 2013). It is equally unclear whether retention impacts students' chances of graduating from high school or of attending college (Allen, Chen, Willson, & Hughes, 2009; Andrew, in press; Jacob & Lefgren, 2004; Jimerson, 2001; Ou & Reynolds, 2010).

Ambiguity in the literature is at least partly predicated on issues related to the measurement of grade retention. For example, some studies limited to measures of grade retention in early grades come to different conclusions about its impacts on high school completion than other studies limited to measures of grade retention in later grades (Andrew, in press; Jacob & Lefgren, 2004; Ou & Reynolds, 2010). Consistent measures of grade retention at different points in the educational career and across cohorts of students would help solve such empirical ambiguity. For all its familiarity, reliable and consistent measures of grade retention over time for the national student body and subgroups of that body are difficult to come by.

In this paper, we describe an improved method of measuring individual students' retention in grade at different points in the educational career and across cohorts of students using readily available national data from the Current Population Survey (CPS). Our method was first introduced by Hauser, Frederick, and Andrew (2007; see also Frederick & Hauser, 2008). We offer a number of technical improvements, provide estimates for a more recent and wider range of years, and validate the resulting measure against administrative record data. Our estimates provide reliable, student-level estimates of grade retention rates for a sample that allows disaggregated results by grade, by student-level socioeconomic and demographic variables, and by geography. Although our goal in this paper is to describe and validate our measure and to report descriptive patterns of grade retention in recent years, our measure can be used in future research to model grade retention as a function of student-level and policy variables and to answer important questions about who is retained and the implications of such retentions for later outcomes.

We begin by reviewing currently available methods for quantifying the retention rate. We then describe our method and data. Next we present descriptive findings about grade retention

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rates based on univariate and multivariate (logistic regression) techniques. Finally, we validate our measure by comparing rates to those from other data resources.

### How Many Students Are Retained?

In a perfect world, all states would report grade-specific retention rates at the end of each academic year, and they would use data and measures that are comparable across states and over time. Unfortunately, most states do not report retention rates at all; those that do use quite different methods for calculating them (Warren & Saliba, 2012). Consequently, researchers and policy analysts have typically made do with other sources of information.

The National Center for Education Statistics (NCES) has conducted several large longitudinal studies of single cohorts of students that have been used to study the correlates of retention (e.g., Hong & Raudenbush, 2005; Hong & Yu, 2007; Rumberger & Larson, 1998; Stearns, Moller, Blau, & Potochnick, 2007). Studies beginning with high school-age students (e.g., *High School & Beyond*) ask retrospective questions about elementary grade retention; the validity of these retrospective reports is not clear. Studies beginning with younger students (e.g., the *Early Childhood Longitudinal Study*) allow for prospective retention reports—but only through the early grades. Most importantly, all of the NCES studies suffer from sampling and attrition biases, and each can speak only to the experiences of single cohorts of students. What is more, these longitudinal surveys are fielded only about every 10 years or so. For these reasons, NCES longitudinal surveys are not a good way to monitor grade retention rates on an ongoing basis.

In several different years, the CPS and the National Household Education Survey have included retrospective questions about people's previous experiences with retention (Child Trends, 2013). Such measures are available only at widely spaced intervals, and the quality of such retrospective information is unknown.

Warren and Saliba (2012) used information about enrollments and population size to calculate national and state-level retention rates for several academic years. Their estimates closely mirrored states' reported rates based on longitudinal student tracking systems. Although useful for aggregate, descriptive purposes, their state-level rates do not facilitate analyses of individual students' chances of being retained. Their rates also cannot be disaggregated by students' social, economic, or demographic characteristics.

Several scholars have used proxies for retention based on the distribution of students' grades of enrollment conditional on their ages (e.g., Bianchi, 1984; Frederick & Hauser, 2008; Hauser et al., 2007; Hauser, Pager, & Simmons, 2004; Heubert & Hauser, 1999). These proxies begin by observing whether students are enrolled in a grade below that which is modal for their age. Retention rates are inferred by subtracting the percentage of students below the modal grade for their age in one year from the percentage below the modal grade for their age the previous year. For example, if 6% of 8-year-olds were enrolled below their modal grade (third grade) in the fall of Year *X* and 5% of 7-year-olds were enrolled below their modal grade (second grade) in the fall of Year *X* - 1, then we would infer a 1% second-grade retention rate at the end of Year *X*.

Because both age and grade of enrollment are observed annually in the CPS since 1968 and the American Community Survey since 2008, it is thus possible to produce this measure at the national level, in each year since the late 1960s, and for broad subgroups of students (e.g., by students' race/ethnicity). However, such measures can only be used to describe aggregate rates of retention—they cannot be used to infer which students were actually retained. If we know (to continue the above example) that 1% of second graders were retained, we cannot know which individual students were retained. This prevents subsequent analyses that model the individual- and macrolevel predictors of this educational practice. This measure also suffers from a few conceptual problems. First, there are typically two modal ages for each grade (and thus two modal grades for each age). Second, changes over time in the ages at which students start school will influence inferred retention rates. These issues raise questions about the validity of empirical patterns based on this measure.

Hauser et al. (2007) first developed student-level indicators of grade retention using CPS data. The October supplement to the CPS measures (a) the grade in which students are currently enrolled and (b) the grade in which they were enrolled last year. By cross-classifying these two variables, Hauser et al. inferred which individual students did not progress normally from one grade to the next across years. Although no other researchers have made use of this CPS measure, we think it is potentially useful in a number of respects. First, it can be produced annually going back to 1995 and going forward indefinitely. Second, the CPS sample is large enough to report retention rates separately for subgroups of students. Third, unlike measures like "below modal grade for age," Hauser et al.'s method can identify which individual students were retained (and thus facilitate models of retention).

Although we think the Hauser et al. (2007) method for measuring grade retention rates is potentially useful, Hauser and colleagues neither (a) address some important technical issues nor (b) validate their rates against information external to the CPS. In this paper, we make a number of technical improvements to this method, update descriptive results through 2010, and validate the measure against external information.

### Data and Measures

The CPS—conducted jointly by the U.S. Census Bureau and the Bureau of Labor Statistics—is representative of the civilian, household-based population of the United States. In recent years, each monthly CPS has included about 140,000 individuals living in about 60,000 households. Occupants of sampled households are interviewed in 4 consecutive months, are rotated out of the panel for 8 months, and are then reinterviewed in 4 consecutive months. Because the CPS samples housing units, not people, individuals who move out of CPS households are not followed and new people who subsequently move into CPS households are included in the panel.

The basic monthly CPS survey gathers demographic data and extensive information about labor-force activities, occupation and industry, and unemployment for all residents. In most months, the CPS also includes a topical supplement. Since 1968, the October supplement has gathered additional information about school enrollment and educational experiences; this

**Table 1**  
**Cross-Classification of Students' Grade of Enrollment This Year by Their Grade of Enrollment Last Year, 1995 to 2010**

Grade Last Year	Grade This Year										Retained in Grade	Normal Progress	Skipped a Grade	Total
	1st	2nd	3rd	4th	5th	6th	7th	8th	9th	10th				
1st	1,777	26,918	98	0	0	0	0	0	0	0	1,777	26,918	98	28,793
2nd	0	569	26,911	88	0	0	0	0	0	0	569	26,911	88	27,568
3rd	0	0	503	27,356	46	0	0	0	0	0	503	27,356	46	27,905
4th	0	0	0	420	27,340	71	0	0	0	0	420	27,340	71	27,831
5th	0	0	0	0	379	27,374	77	0	0	0	379	27,374	77	27,829
6th	0	0	0	0	0	464	26,957	52	0	0	464	26,957	52	27,473
7th	0	0	0	0	0	0	573	26,921	90	0	573	26,921	90	27,584
8th	0	0	0	0	0	0	0	545	27,806	113	545	27,806	113	28,464
9th	0	0	0	0	0	0	0	0	819	27,862	819	27,862	—	28,681
Total	1,777	27,487	27,513	27,863	27,766	27,908	27,607	27,517	28,715	27,975	6,049	245,446	633	252,128

*Note.* Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight (after normalizing the weight to have a mean of zero).

information includes the grade or level of school that currently enrolled individuals are attending. Since 1995, the October supplement has also included questions about enrollment in the preceding October; this provides information about the grade or level of schooling that individuals were attending 1 year earlier.

Following Hauser et al. (2007), our measure of retention in grade  $g$  is based on a comparison of grade of enrollment across consecutive years. Among students attending grade  $g$  last year, those attending grade  $g$  this year have been retained, those attending grade  $g + 1$  have made normal progress, and those attending grade  $g + 2$  have skipped a grade. In Table 1, we cross-classify grade of enrollment last year by grade of enrollment this year for the 252,128 people who were enrolled in Grades 1 through 9 in the year preceding their interviews in 1995 through 2010. As shown in Table 1, the vast majority of students make normal progress, and only a very small number skip grades.

We make a number of important technical improvements in our measure as compared to that produced by Hauser et al. (2007). First, we exclude students whose grade of enrollment (this year and/or last year) was not actually reported by the CPS respondent. In about one in every seven cases, the CPS imputed values using procedures that are not well documented, that frequently produce implausible values, and that consequently create the impression that many students skipped multiple grades or even moved backward in grade across years. Second, we exclude some cases in which grade of enrollment (this year and/or last year) was reported but appears to be implausible (i.e., because the student appears to skip many grades or move backward in grade). Close inspection of the data leads us to believe that some respondents misunderstand response options (e.g., confusing “first grade” for “first year of high school”). In other cases, it appears that interviewers confuse response options and the computer codes that represent them (e.g., in some years the numeric code 5 represents first grade).

In our analyses, we include individuals currently enrolled in Grades 1 through 10 in the 1995 through 2010 CPS; 10th graders are only included to assess the 9th-grade retention rate. We do

not produce kindergarten retention rates because many students enroll in kindergarten in multiple years despite not being retained. We exclude people whose current or previous grade of enrollment was imputed (for reasons described above), and we exclude the small percentage of cases in which students appear to skip multiple grades or move backward in grade. Students who skip a single grade are counted for our purposes as making normal progress. All of our analyses are weighed by the CPS October supplement weight after renormalizing the weight to have a mean of zero.

## Results

### *Descriptive Patterns by Grade*

In Table 2, we pool across academic years 1994–1995 through 2009–2010 and report first- through ninth-grade retention rates for the full sample, for boys and girls, and for non-Hispanic Whites, non-Hispanic Blacks, and Hispanics. Figure 1 depicts grade-level specific retention rates for the full sample, by sex, by race/ethnicity, by nativity (i.e., for immigrant children, for U.S.-born children of immigrants, and for U.S.-born children of U.S.-born parents), by the highest level of either parent’s schooling (i.e., for children whose best-educated parent was a high school dropout, a high school graduate, a college attendee, or a college completer), by region of the country (i.e., Northeast, South, Midwest, or West), and by urbanicity (i.e., urban, rural, and suburban residence). The values underlying Figure 1 are provided in Table 2 and Appendix Tables A1 and A2.

Grade retention rates are highest in first grade; they are also high in Grade 9. About 2.4% of all students were retained, including about 6.2% of first graders. Retention rates are higher among boys than among girls, especially in later grades (Table 2; Panel A of Figure 1); are highest among Blacks and Hispanics (Table 2; Panel B of Figure 1); and are higher among children who were born outside of the United States (Panel C of Figure 1). They are also higher among children of less well-educated parents (Panel D) and among children in the South and Northeast (Panel

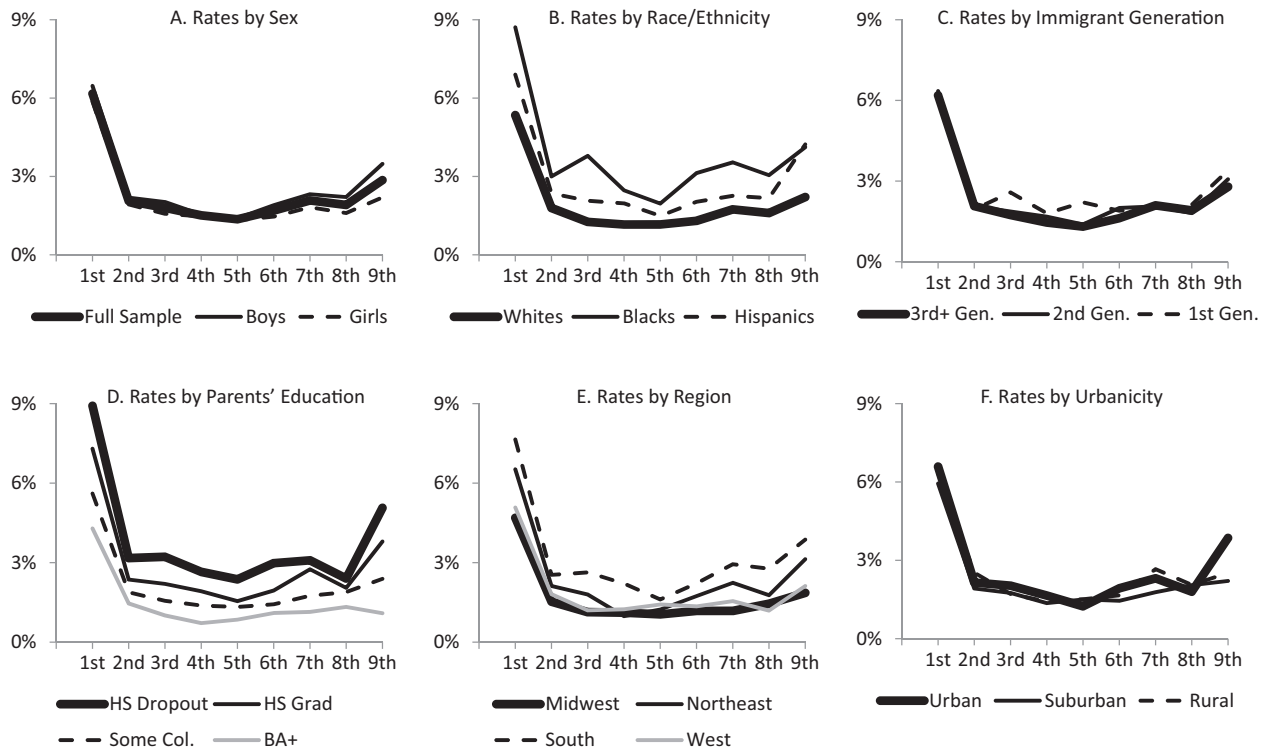


FIGURE 1. First- through ninth-grade retention rates, by demographic, socioeconomic, and geographic variables, 1995 to 2010  
 Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table 2**  
**First- Through Ninth-Grade Retention Rates, by Demographic Variables,**  
**Academic Years 1994–1995 Through 2009–2010**

Grade	n	Full Sample	Sex		Race/Ethnicity		
			Boys	Girls	Non-Hispanic Whites	Non-Hispanic Blacks	Hispanics
1st	28,793	6.2%	6.5%	5.9%	5.4%	8.7%	6.9%
2nd	27,568	2.1%	2.2%	1.9%	1.8%	3.0%	2.4%
3rd	27,905	1.8%	2.0%	1.6%	1.3%	3.8%	2.1%
4th	27,831	1.5%	1.5%	1.5%	1.2%	2.5%	2.0%
5th	27,829	1.4%	1.4%	1.3%	1.2%	2.0%	1.5%
6th	27,473	1.7%	1.9%	1.5%	1.3%	3.1%	2.0%
7th	27,584	2.1%	2.3%	1.8%	1.7%	3.5%	2.3%
8th	28,464	1.9%	2.2%	1.6%	1.6%	3.1%	2.2%
9th	28,681	2.9%	3.5%	2.2%	2.2%	4.1%	4.2%
Total		2.4%	2.6%	2.2%	2.0%	3.8%	2.8%
n	252,128		129,215	122,913	167,620	30,093	36,922

Note. Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

D). The grade-specific patterns—with highest retention rates in first grade and high retention rates in ninth grade—hold among all groups of students and in all geographic areas.

#### Descriptive Patterns by Year

In Table 3, we pool across Grades 1 through 9 and report total retention rates each academic year between 1994–1995 and 2009–2010

for the full sample, for boys and girls, and for non-Hispanic Whites, non-Hispanic Blacks, and Hispanics. Figure 2 depicts grade-level specific retention rates for the full sample, by sex, by race/ethnicity, by nativity, by the highest level of either parent’s schooling, by region of the country, and by urbanicity. The values used to produce Figure 2 are provided in Table 3 and Appendix Tables A3 and A4.

The patterns described in Table 2 and Figure 1—higher retention rates among boys, among Blacks and Hispanics,

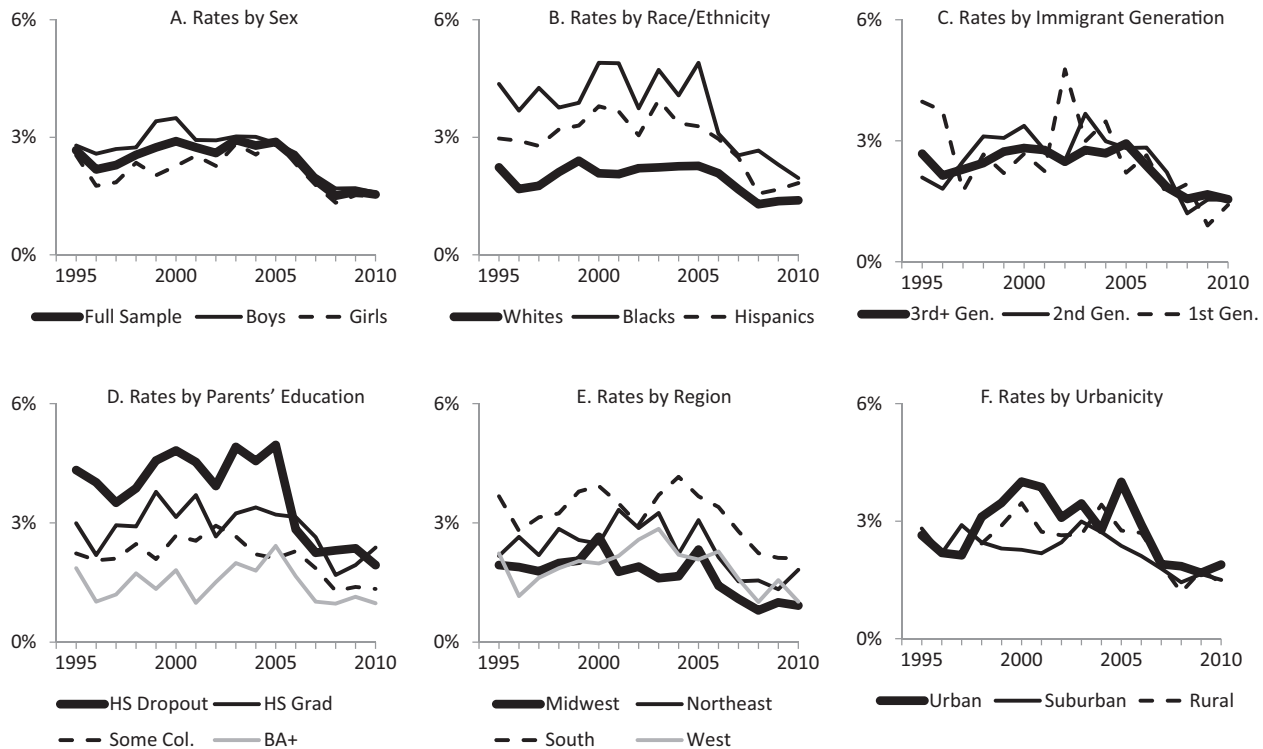


FIGURE 2. Annual retention rates, by demographic, socioeconomic, and geographic variables, 1995 to 2010  
 Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table 3**  
**Annual Retention Rates, by Demographic Variables, Academic Years 1994–1995 to 2009–2010**

Year	n	Sex			Race/Ethnicity		
		Full Sample	Boys	Girls	Non-Hispanic Whites	Non-Hispanic Blacks	Hispanics
1994–1995	15,711	2.7%	2.8%	2.5%	2.2%	4.4%	3.0%
1995–1996	15,588	2.2%	2.6%	1.8%	1.7%	3.7%	2.9%
1996–1997	15,712	2.3%	2.7%	1.9%	1.8%	4.3%	2.8%
1997–1998	16,272	2.6%	2.7%	2.4%	2.1%	3.8%	3.2%
1998–1999	16,009	2.7%	3.4%	2.0%	2.4%	3.9%	3.3%
1999–2000	16,390	2.9%	3.5%	2.3%	2.1%	4.9%	3.8%
2000–2001	16,203	2.7%	2.9%	2.5%	2.1%	4.9%	3.7%
2001–2002	15,471	2.6%	2.9%	2.3%	2.2%	3.7%	3.1%
2002–2003	15,467	2.9%	3.0%	2.8%	2.2%	4.7%	4.0%
2003–2004	16,003	2.8%	3.0%	2.6%	2.3%	4.1%	3.4%
2004–2005	15,940	2.9%	2.9%	2.9%	2.3%	4.9%	3.3%
2005–2006	15,600	2.5%	2.6%	2.3%	2.1%	3.1%	3.0%
2006–2007	15,480	1.9%	2.0%	1.8%	1.7%	2.5%	2.5%
2007–2008	15,544	1.5%	1.7%	1.3%	1.3%	2.7%	1.6%
2008–2009	15,312	1.6%	1.7%	1.5%	1.4%	2.3%	1.7%
2009–2010	15,426	1.5%	1.6%	1.5%	1.4%	2.0%	1.8%
Total		2.4%	2.6%	2.2%	2.0%	3.8%	2.9%
n	252,128		129,215	122,913	167,620	30,093	36,922

Note. Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table 4**  
**Logistic Regression Models of Grade Retention, by Grade, 1995 to 2010**

Variable	Model 1		Model 2		Model 3		Model 4	
	Grades 1–9		Grade 1		Grades 2–8		Grade 9	
	Exp(b)	(SE)	Exp(b)	(SE)	Exp(b)	(SE)	Exp(b)	(SE)
Sex (reference category: female)								
Male	1.23	(0.04)***	1.11	(0.06)	1.22	(0.05)***	1.60	(0.14)**
Race/ethnicity (reference category: non-Hispanic Whites)								
Non-Hispanic Blacks	1.35	(0.06)***	1.29	(0.11)*	1.48	(0.08)***	0.98	(0.12)
Hispanics	1.20	(0.06)**	1.24	(0.12)	1.08	(0.07)	1.44	(0.19)
All others	1.20	(0.09)*	1.32	(0.17)	1.05	(0.10)	1.44	(0.27)
Parent's highest education (reference category: college graduate)								
High school dropout	2.18	(0.12)***	1.90	(0.20)**	2.22	(0.17)***	3.45	(0.58)*
High school graduate	1.73	(0.08)***	1.55	(0.13)**	1.69	(0.10)***	2.90	(0.40)**
Some college	1.36	(0.06)***	1.22	(0.10)*	1.36	(0.08)***	2.08	(0.30)*
Unknown	2.07	(0.15)***	1.77	(0.26)*	2.00	(0.19)***	3.77	(0.69)
Family structure (reference category: two-parent family)								
Single-parent family	1.26	(0.04)***	1.15	(0.08)	1.25	(0.06)***	1.55	(0.15)**
Nativity (reference category: both parents born in United States)								
Immigrant children	0.93	(0.07)	0.88	(0.14)	1.10	(0.10)	0.80	(0.14)
Second generation	0.93	(0.05)	0.84	(0.08)*	0.99	(0.07)	0.79	(0.11)*
Unknown	0.58	(0.17)**	0.80	(0.37)	0.57	(0.21)**	0.03	(0.03)***
Urbanicity (reference category: suburban)								
Rural	0.98	(0.05)	0.95	(0.08)	1.00	(0.06)	0.95	(0.13)
Urban	1.07	(0.04)	1.00	(0.07)	1.00	(0.05)	1.55	(0.17)**
Unknown	0.87	(0.04)**	0.86	(0.09)	0.84	(0.06)**	1.05	(0.15)
Region (reference category: Midwest)								
Northeast	1.40	(0.07)***	1.41	(0.13)**	1.36	(0.09)**	1.59	(0.22)
South	1.75	(0.07)***	1.61	(0.13)***	1.79	(0.10)***	1.96	(0.24)**
West	1.05	(0.05)	1.04	(0.10)	1.09	(0.08)	0.97	(0.14)
Time								
Year –1995	1.12	(0.02)***	1.16	(0.03)***	1.11	(0.02)***	1.10	(0.04)
(Year – 1995) <sup>2</sup>	0.99	(0.00)***	0.99	(0.00)***	0.99	(0.00)***	0.99	(0.00)**
Constant	0.01	(0.00)***	0.03	(0.00)***	0.01	(0.00)***	0.00	(0.00)***
<i>n</i>	252,128		28,302		195,072		28,754	

*Note.* See text for description of sample and measures. All analyses weighted by Current Population Survey supplement weight.  
\* $p < .05$ . \*\* $p < .01$ . \*\*\* $p < .001$ .

among immigrant children, among children of less well-educated parents, and among urban children—hold in each academic year between 1994–1995 and 2009–2010. However, as shown in Figure 2, retention rates declined substantially and steadily after the 2004–2005 academic year. In 2004–2005, 2.9% of all first through ninth graders were retained. By 2009–2010, the retention rate had fallen by about half, to 1.5%. The decline in retention rates is observed among all groups of students and in all geographic areas but may be most pronounced among groups of students with previously higher retention rates. As a result, group differences in retention rates (e.g., by race/ethnicity, parental education, region) also declined. That is,

Figure 2 shows both a decline in overall retention rates and a decline in inequality in retention rates. We leave it to others to explain these notable declines; we suspect that they may have to do with changes in states' accountability policies in conjunction with newly available information from states' longitudinal student-tracking systems.

#### *Multivariate Patterns*

In Table 4, we report the results of logistic regression models predicting retention in Grades 1 through 9 (Model 1), in Grade 1 (Model 2), in Grades 2 through 8 (Model 3), and in Grade 9

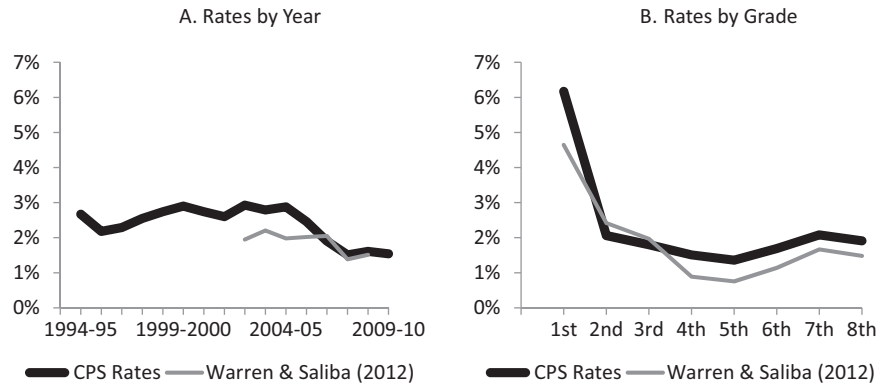


FIGURE 3. Comparison of alternate grade retention rates, by year and grade  
 Current Population Survey (CPS) analyses based on 1995–2010 CPS data, excluding children with imputed values on grade of enrollment this year or last year. The CPS analyses are weighted by the CPS October supplement weight.

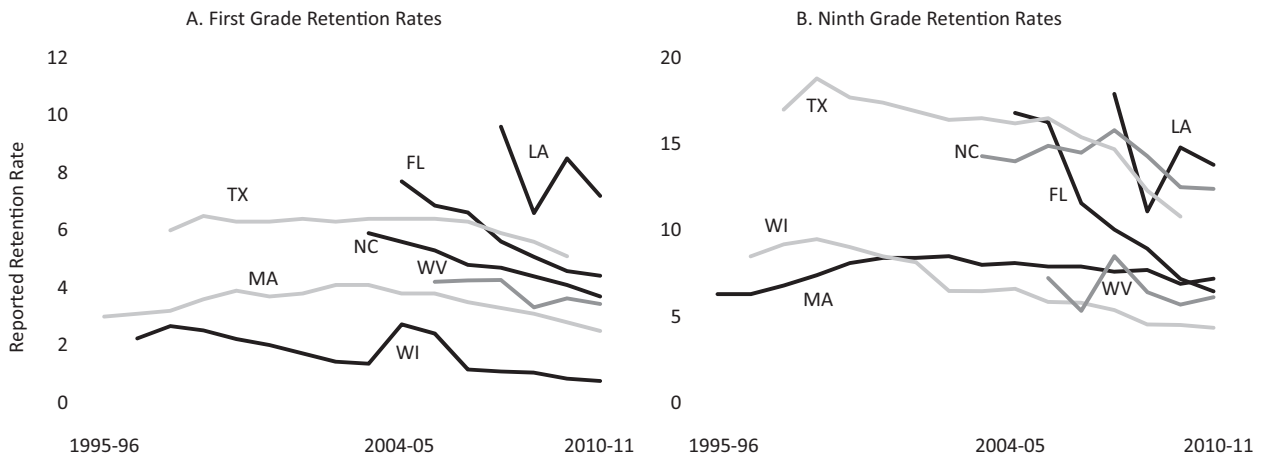


FIGURE 4. First- and ninth-grade retention rates: Florida, Louisiana, Massachusetts, North Carolina, Texas, West Virginia, and Wisconsin, 1995–1996 through 2010–2011  
 States are indicated by their postal abbreviations. Data are derived from information obtained from each state’s department of education website.

(Model 4). In these models, we pool across academic years 1994–1995 through 2009–2010 and include year and year<sup>2</sup> terms; the quadratic term allows the trend in rates to be nonlinear. In these descriptive models, the independent variables include students’ sex, race/ethnicity, parent’s highest education, family structure, nativity, urbanicity, region, and year of observation. All else constant, boys are more likely to be retained at each grade level, non-Hispanic Blacks are more likely to be retained in earlier grades, children are less likely to be retained when their parents completed more schooling and are married, and retention rates at all grade levels are substantially higher in the southern and northeastern states. Consistent with Table 3, predicted values from these models suggest that retention rates were highest in about 2004–2005 and have fallen sharply since then. Models that include interaction terms between independent variables and year and year<sup>2</sup> generally fit worse. This suggests that the decline in retention rates since about 2004–2005 has

occurred across the board and has not been especially pronounced in any region or population subgroups.

#### Validating Our Rates Against External Criteria

How do the rates we have produced compare to other recent estimates? We perform two types of comparisons. First, we compare our first- through eighth-grade CPS-based retention rates to Warren and Saliba’s (2012) retention rates for first through eighth grade for 2002–2003 through 2008–2009; Warren and Saliba did not produce ninth-grade rates. Second, we consider whether the decline in grade retention rates that we observe since 2004–2005 using our CPS-based measure is also apparent in states’ reports of their retention rates.

In Figure 3, we compare our CPS-based measure (the thick black line) to Warren and Saliba’s (2012) measure (the thin gray line). In Panel A, we pool data on Grades 1 through 8 and report retention

rates for each year between 1994–1995 and 2009–2010; however, Warren and Saliba’s rates are available only for 2002–2003 through 2008–2009. In Panel B, we pool data across all available years and report retention rates separately for Grades 1 through 8. In general, trends over time and across grades look very similar using either of these two rates. The downward trend in retention rates after 2004–2005 is apparent using both. The advantage of our CPS-based rate, however, is that it is simpler to produce, is available for more academic years, and is available at the level of individual students.

In Figure 4, we depict trends in states’ first- and ninth-grade retention rates between 2002–2003 and 2009–2010. Annual, grade-specific rates are available online for Florida, Louisiana, Massachusetts, North Carolina, Texas, West Virginia, and Wisconsin. In Figure 4, we report states’ reported retention rates; Panels A and B pertain to first and ninth grades, respectively. In every one of these states, first- and ninth-grade retention rates declined—sometimes substantially—after 2004–2005; figures (not shown) for Grades 2 through 8 look similar. Although this evidence is limited to just seven states, it strongly suggests that the declines in retention rates that we observed in the CPS after 2004–2005 are real and not an artifact of the way we have constructed the measure using CPS data.

### Future Uses of Our Measures

Our CPS-based measure of grade retention should be useful for researchers interested in the social, economic, and political predictors of grade retention. This includes the effects of family, economic, and policy changes on children’s educational progress across grades and how those effects vary by race/ethnicity, gender, nativity, and socioeconomic status (Guo, Brooks-Gunn, & Harris, 1996; Tillman, Guo, & Harris, 2006). The CPS includes detailed information about important family contexts in a given year, such as poverty status, family composition, changes in earnings, sibling grade retention, and parental work and unemployment. For researchers interested in larger economic contexts, it is possible to link students’ observations to the unemployment rate, average earnings, and demographic characteristics of the metropolitan areas in which students live. It is also possible to link students’ records to state and regional education policies, including school finance and testing and accountability policies, as well as specific policies for retention and promotion (Corman, 2003). The measure we describe can be used to better understand the forces that shape retention rates, trends in those rates over time, regional variation in those rates, and inequality in retention practices across groups of students.

### Conclusion

We view our measure as having immediate practical value. Neither the NCES (e.g., in its annual statistic digests) nor any other federal agency or private foundation routinely reports grade retention rates in the United States. What Hauser, Pager, and Simmons (2000: 11) said more than a decade ago is still true: “We doubt that governments currently make important policy decisions about any other social process with so little in the way of sound, basic, descriptive information.” To properly monitor educational outcomes and to design effective policy, we need to

have a way of accurately quantifying grade retention rates and how they vary by grade, across social groups, and over time.

We also view our measure as having longer-term value for sociological and educational policy research on the factors that influence retention rates, on trends over time in those rates, and on the social, economic, demographic, and policy correlates of the practice. Without a student-level measure—based on a large, nationally representative, annually available data resource—such research has been quite limited in scope.

It will not surprise many people that retention rates are highest in Grades 1 or 9 or that they are highest among boys, racial/ethnic minorities, those living in the South, or less advantaged children. It may come as quite a surprise that absolute retention rates and social and regional inequalities in them have declined dramatically since 2004–2005. Regardless which of these descriptive findings are surprising, having a reliable and routinely available student-level measure of retention will facilitate both a better understanding of the correlates of those rates and future efforts to reduce inequalities in them.

### NOTE

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**Appendix**

**Table A1**  
**First- Through Ninth-Grade Retention Rates, by Family Socioeconomic Variables, 1994–1995 to 2009–2010**

Grade	n	Parent's Highest Education					Family Structure		Nativity		
		Full Sample	High School Dropout	High School Graduate	Some College	BA or More	Two Parents	One Parent	Third+ Generation	Second Generation	Immigrant Children
1st	28,793	6.2%	9.0%	7.4%	5.6%	4.3%	5.4%	7.8%	6.2%	6.1%	6.4%
2nd	27,568	2.1%	3.3%	2.4%	1.8%	1.5%	1.7%	2.9%	2.1%	2.1%	2.0%
3rd	27,905	1.8%	3.4%	2.3%	1.6%	1.0%	1.4%	2.6%	1.7%	1.9%	2.6%
4th	27,831	1.5%	2.6%	1.9%	1.4%	0.7%	1.4%	1.8%	1.5%	1.7%	1.8%
5th	27,829	1.4%	2.3%	1.5%	1.3%	0.8%	1.2%	1.7%	1.3%	1.4%	2.2%
6th	27,473	1.7%	3.0%	1.9%	1.5%	1.1%	1.3%	2.6%	1.6%	2.0%	1.9%
7th	27,584	2.1%	3.1%	2.7%	1.8%	1.2%	1.7%	2.9%	2.1%	2.1%	2.0%
8th	28,464	1.9%	2.5%	2.1%	1.9%	1.3%	1.5%	2.8%	1.9%	1.8%	2.1%
9th	28,681	2.9%	5.0%	3.8%	2.5%	1.1%	2.0%	4.5%	2.8%	3.1%	3.4%
Total		2.4%	3.8%	2.9%	2.2%	1.5%	2.0%	3.3%	2.4%	2.5%	2.6%
n	252,128		23,734	61,970	75,547	80,213	173,170	78,958	204,120	34,606	12,287

*Note.* Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table A2**  
**First- Through Ninth-Grade Retention Rates, by Geographic Variables, 1994–1995 to 2009–2010**

Grade	n	Full Sample	Region				Urbanicity		
			Midwest	Northeast	South	West	Urban	Suburban	Rural
1st	28,793	6.2%	4.7%	6.5%	7.7%	5.1%	6.6%	5.9%	6.3%
2nd	27,568	2.1%	1.5%	2.1%	2.5%	1.8%	2.2%	1.9%	2.5%
3rd	27,905	1.8%	1.1%	1.8%	2.6%	1.2%	2.0%	1.8%	1.7%
4th	27,831	1.5%	1.1%	1.0%	2.2%	1.2%	1.7%	1.4%	1.4%
5th	27,829	1.4%	1.1%	1.2%	1.6%	1.4%	1.2%	1.5%	1.5%
6th	27,473	1.7%	1.2%	1.7%	2.2%	1.4%	1.9%	1.5%	1.7%
7th	27,584	2.1%	1.2%	2.2%	2.9%	1.6%	2.3%	1.8%	2.7%
8th	28,464	1.9%	1.5%	1.8%	2.8%	1.2%	1.8%	2.1%	2.1%
9th	28,681	2.9%	1.9%	3.1%	3.9%	2.1%	3.9%	2.2%	2.5%
Total		2.4%	1.7%	2.4%	3.2%	1.9%	2.7%	2.2%	2.5%
n	252,128		62,374	50,767	73,285	65,702	77,543	91,505	47,667

*Note.* Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table A3**  
**Annual Retention Rates, by Family Socioeconomic Variables,  
 Academic Years 1994–1995 Through 2009–2010**

Year	n	Full Sample	Parent's Highest Education				Family Structure		Nativity		
			High School Dropout	High School Graduate	Some College	BA or More	Two Parents	One Parent	Third + Generation	Second Generation	Immigrant Children
1994–1995	15,711	2.7%	4.3%	3.0%	2.2%	1.9%	2.2%	3.7%	2.7%	2.1%	4.0%
1995–1996	15,588	2.2%	4.0%	2.3%	2.1%	1.1%	1.7%	3.4%	2.1%	1.8%	3.7%
1996–1997	15,714	2.3%	3.5%	3.0%	2.1%	1.2%	1.7%	3.5%	2.3%	2.5%	1.8%
1997–1998	16,272	2.6%	3.9%	2.8%	2.4%	1.8%	2.4%	2.9%	2.5%	3.1%	2.7%
1998–1999	16,009	2.7%	4.5%	3.8%	2.1%	1.4%	2.2%	3.9%	2.7%	3.1%	2.2%
1999–2000	16,390	2.9%	4.9%	3.3%	2.7%	1.8%	2.4%	4.0%	2.8%	3.4%	2.7%
2000–2001	16,203	2.7%	4.7%	3.6%	2.6%	1.1%	1.8%	4.6%	2.8%	2.8%	2.3%
2001–2002	15,471	2.6%	4.0%	2.7%	2.8%	1.5%	2.3%	3.3%	2.5%	2.5%	4.8%
2002–2003	15,467	2.9%	5.0%	3.3%	2.7%	2.0%	2.3%	4.3%	2.8%	3.7%	3.0%
2003–2004	16,003	2.8%	4.8%	3.5%	2.2%	1.9%	2.4%	3.9%	2.7%	3.0%	3.5%
2004–2005	15,940	2.9%	5.0%	3.3%	2.1%	2.4%	2.4%	4.0%	2.9%	2.8%	2.2%
2005–2006	15,600	2.5%	2.8%	3.2%	2.4%	1.7%	2.2%	3.1%	2.4%	2.8%	2.6%
2006–2007	15,480	1.9%	2.5%	2.7%	1.9%	1.0%	1.5%	2.7%	1.9%	2.2%	1.7%
2007–2008	15,544	1.5%	2.2%	1.8%	1.2%	1.0%	1.2%	2.2%	1.6%	1.2%	1.9%
2008–2009	15,312	1.6%	2.5%	1.9%	1.4%	1.2%	1.4%	2.1%	1.7%	1.5%	0.9%
2009–2010	15,426	1.5%	1.8%	2.3%	1.3%	1.0%	1.4%	1.9%	1.6%	1.5%	1.4%
Total		2.4%	3.8%	2.9%	2.2%	1.5%	2.0%	3.3%	2.4%	2.5%	2.6%
n	252,128		23,734	61,970	75,547	80,213	173,170	78,958	204,120	34,606	12,287

*Note.* Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.

**Table A4**  
**Annual Retention Rates, by Geographic Variables, Academic Years 1994–1995 Through 2009–2010**

Year	n	Full Sample	Region				Urbanicity		
			Midwest	Northeast	South	West	Urban	Suburban	Rural
1994–1995	15,711	2.7%	1.9%	2.2%	3.7%	2.2%	2.6%	2.8%	0.0%
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1996–1997	15,712	2.3%	1.8%	2.2%	3.1%	1.6%	2.1%	2.9%	5.9%
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1998–1999	16,009	2.7%	2.1%	2.6%	3.8%	2.0%	3.5%	2.3%	2.9%
1999–2000	16,390	2.9%	2.7%	2.5%	3.9%	2.0%	4.0%	2.3%	3.5%
2000–2001	16,203	2.7%	1.8%	3.3%	3.5%	2.2%	3.9%	2.2%	2.7%
2001–2002	15,471	2.6%	1.9%	2.9%	3.0%	2.6%	3.1%	2.5%	2.6%
2002–2003	15,467	2.9%	1.6%	3.3%	3.7%	2.9%	3.5%	3.0%	2.7%
2003–2004	16,003	2.8%	1.7%	2.2%	4.2%	2.2%	2.8%	2.7%	3.4%
2004–2005	15,940	2.9%	2.3%	3.1%	3.7%	2.1%	4.0%	2.4%	2.8%
2005–2006	15,600	2.5%	1.4%	2.1%	3.4%	2.3%	2.9%	2.1%	2.7%
2006–2007	15,480	1.9%	1.1%	1.5%	2.8%	1.6%	1.9%	1.8%	1.9%
2007–2008	15,544	1.5%	0.8%	1.6%	2.2%	1.0%	1.9%	1.4%	1.2%
2008–2009	15,312	1.6%	1.0%	1.3%	2.1%	1.6%	1.7%	1.7%	1.7%
2009–2010	15,426	1.5%	0.9%	1.8%	2.1%	1.0%	1.9%	1.5%	1.4%
Total		2.4%	1.7%	2.4%	3.2%	1.9%	2.7%	2.2%	2.5%
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*Note.* Analysis based on 1995–2010 Current Population Survey (CPS) data. Sample excludes children with imputed values on grade of enrollment this year or last year. Analyses weighted by the CPS October supplement weight.