



INAUGURAL ISSUE

Each quarter, the VDOE will publish a research bulletin on an issue of interest, highlighting published research, Virginia-specific data analytics, and evidence-based strategies for education leaders to consider.

WANT TO KNOW MORE?

The VDOE's 2020 Equity Webinar Series will host a webinar addressing the content of this research brief on Thursday, March 5, 2020 from 3:00 p.m. to 4:30 p.m. To register, contact EdEquityVA@doe.virginia.gov.

CONTACT US

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Research Focus

The Virginia Department of Education (VDOE) is interested in sustainable strategies to reduce out-of-school time due to exclusionary discipline. Is diversifying Virginia's teacher workforce a possible solution? This research bulletin examines the school-level relationship between teachers' race and rates of exclusionary discipline, particularly among Black students.

Summary of the Issue

Use of exclusionary discipline, where students are removed from the classroom as punishment, has received recent significant attention for its negative, cumulative impact on student academic achievement and for its disproportionate use among students of color.^{1,2}

In Virginia, 16 of 132 school divisions reported a rate of suspension for Black students three times higher than rates of suspensions for non-Black students (relative risk of 3.0 or more; see map). **For Black females, 41 school divisions reported similarly disproportionate suspension rates (relative risk of 3.0 or more), compared to just 12 divisions for Black males.**

Research does not support the idea that students of color are more likely to engage in problem behavior.³ Instead, it suggests a multi-faceted approach to address discipline disproportionality through discipline policies, the people that implement those policies, and the influence of the places where these outcomes occur.⁴

Diversifying the teacher workforce is one policy strategy that may reduce exclusionary discipline and boost academic achievement. Teachers of color produce outcomes that are more favorable for students of color on standardized test scores, attendance, advanced course enrollment, and college-going rates.⁵ Students' exposure to same-race teachers is also associated with

reduced rates of exclusionary discipline for Black students.^{6,7}

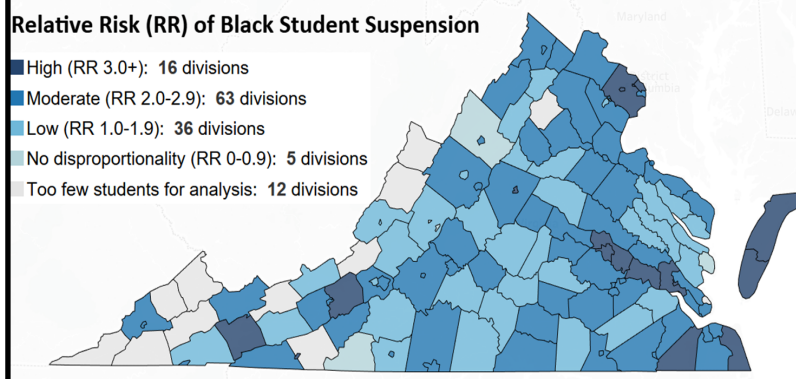
In 2017, the Secretary of Education convened the [Taskforce to Diversify Virginia's Educator Pipeline](#). Recommendations from that task force are represented in the [Virginia Board of Education's Comprehensive Plan for 2018-2023](#) and [Virginia's ESSA State Plan](#), as well as grant funds authorized by the General Assembly to support minority teachers' attainment of full licensure.

While the teacher-student demographic gap in Virginia remains large—82 percent of teachers identify as white while only 48 percent of students do—local diversity has improved. In the past two years, more than half of Virginia's school divisions have improved their minority student-to-teacher ratio. Additionally, the number of school divisions with no non-White teachers has decreased by 33 percent.

Disproportionality among Black Student Suspensions Compared to Non-Black Students

Relative Risk (RR) of Black Student Suspension

- High (RR 3.0+): 16 divisions
- Moderate (RR 2.0-2.9): 63 divisions
- Low (RR 1.0-1.9): 36 divisions
- No disproportionality (RR 0-0.9): 5 divisions
- Too few students for analysis: 12 divisions



CALL TO ACTION

To diversify the teacher workforce, school divisions can:

- Participate in local, regional, or state-wide minority teacher recruitment fairs
- Bolster local induction and mentoring programs to focus on provisionally licensed teachers
- Compensate teachers serving in critical shortage areas, including high-poverty schools
- Support “grow your own” programs, particularly in partnership with Historically Black Colleges and Universities (HBCUs)
- Attract and support prospective teachers through nontraditional pathways into the profession
- Promote successful teacher-school assignment matches
- Provide support to provisionally licensed teachers for licensure assessment preparation
- Promote a culture of inclusion within the school, and seek to improve any deficiencies in teacher working conditions



Racial Diversity and Exclusionary Discipline

Using data on Virginia public schools from the 2018-2019 school year, VDOE developed an analytical model to understand which school characteristics are likely to contribute to higher Black student suspension rates (see Technical Appendix for more information). This model can be used to target resources—professional development, technical assistance, support services—to the most significant and malleable factors contributing to discipline disproportionality. The final model indicates six factors about schools that most often contribute to Black student suspension rates. Schools with higher Black student suspension rates are more likely to have a higher overall student suspension rate, higher student poverty, serve secondary grades, and be located in an urban setting. The model also suggests that schools with lower Black student suspension rates are more diverse. **Schools in Virginia with higher percentages of Black teachers and Black students suspend a fewer percent of Black students.** Specific to teacher race, the model indicates that for every one percent increase in the percentage of Black teachers in a school, the suspension rate for Black students decreases by 0.03 percent. The relationship between exclusionary discipline and teacher and student racial diversity is statistically significant. VDOE also developed analytical models to examine contributing factors for the suspension rate among Black males and Black females, separately. The factors identified as significant in the model for Black males were similar to all Black students. However, teacher race becomes less of a contributing factor in understanding suspension rates among Black females.

A Closer Look through Case Studies

At East Middle School⁸, located in a rural, southwestern Virginia county, 30 percent of students and six percent of teachers are Black. Sixty-one percent of students are also eligible for free- or reduced-price meals. At West Middle School⁸, located in a rural, southeastern Virginia county, twice as many students (76 percent) and seven times as many teachers (45 percent) are Black. Most students are also eligible for free- or reduced-price meals (81 percent). Based on the statistical model, West Middle School, with a significantly higher percentage of Black teachers and Black students, should have a lower Black student suspension rate. Indeed, it does.

Model	East Middle School	West Middle School
Type	Secondary	Secondary
Location	Rural	Rural
Percent of Black Students	30%	76%
Percent of Black Teachers	6%	45%
Percent of Student Poverty	61%	81%
Overall Suspension Rate	11%	11%
Black Student Suspension Rate	17%	13%

Even though both schools have an overall student suspension rate of 11 percent, West Middle School, with more Black teachers, has a Black student suspension rate of 13 percent compared to East Middle School's Black student suspension rate of 17 percent.

Final Thoughts

There is no single solution to reduce discipline disproportionality. Previous research, combined with data from Virginia schools, supports the theory that increasing the racial diversity of the teacher workforce is a promising strategy. Schools and divisions are encouraged to comprehensively examine the local context in which school discipline occurs to identify the most salient leverage points for positive change.



Technical Appendix

VDOE used multiple linear regression analysis to develop three separate analytical models using administrative data from the 2018-2019 school year. This type of analysis is used when the goal is to predict the value of one variable (in this case, the suspension rates) based on the value of two or more other variables. Variables included in the analysis are listed in the table (right) and include the primary variable of interest, percentage of Black teachers, as well as other possible school-level predictors, including measures of student poverty, teacher experience, student demographics, school size, grades served, and school location.

The final analytical model for all Black students (Model 1) suggests that a school's overall suspension rate, percentage of student poverty, percentage of Black teachers, percentage of Black student enrollment, and whether the school serves secondary grades and is located in a city are all significant predictors of the

suspension rate among Black students. Specific to teacher race, the model indicates that for every one percent increase in the percentage of Black teachers in a school, the suspension rate for Black students decreases by 0.03 percent.

For Black males (Model 2), the relationship between teacher race and suspension rate is even stronger. In this model, a one percent increase in the percentage of Black teachers is associated with a 0.05 percent decrease in the suspension rate for Black males. However, for Black females (Model 3), the significance of the relationship between teacher race and suspension rates disappears. In other words, the percentage of Black teachers within a school has no significant impact on suspension rates for Black females. Models 2 and 3 have lower adjusted R^2 values than Model 1, indicating that the variables chosen for these models explain less of the variation in suspension rates among Black males and Black females. This could indicate that there are one or more unmeasured school characteristics not included in these models that may contribute in important ways to understanding student suspension rates among Black students by gender.

Variables	Model 1		Model 2		Model 3	
	Black Student Suspension Rate		Black Male Suspension Rate		Black Female Suspension Rate	
	β	s.e.	β	s.e.	β	s.e.
Constant	0.008	0.009	0.053	0.016	-0.032	0.011
Overall suspension rate	1.233*	0.019	1.466*	0.033	0.987*	0.023
Student poverty	0.016*	0.005	0.014	0.008	0.009	0.006
Black teachers	-0.030*	0.009	-0.049*	0.015	-0.004	0.011
First year teachers	-0.013	0.011	-0.004	0.019	-0.022	0.013
Black principals	0.002	0.002	0.003	0.003	0.001	0.002
First year principals	0.003	0.004	-0.002	0.006	0.001	0.004
Black students	-0.044*	0.007	-0.055*	0.012	-0.039*	0.008
Enrollment size	-0.000	0.000	-0.000	0.000	0.000	0.000
SOL Pass Rates	0.010	0.009	-0.012	0.016	0.036*	0.012
Secondary School	0.020*	0.002	0.012*	0.004	0.023*	0.003
City	0.006*	0.002	0.007*	0.004	0.008*	0.003
Rural	0.003	0.002	0.011*	0.004	0.001	0.002
Adjusted R^2	0.901		0.8331		0.8431	

Note: *denotes a statistically significant finding, $p < .05$

Foot Notes

1. U.S. Department of Justice, Civil Rights Division, & U.S. Department of Education, Office for Civil Rights. (2014 January). Dear colleague letter on the nondiscriminatory administration of school discipline.
2. Morris, E. W., & Perry, B. L. (2016). The punishment gap: School suspension and racial disparities in achievement. *Social Problems*, 63, 68–86.
3. Tefera, A., Siegel-Hawley, G., & Levy, R. (2017). Why do racial disparities in school discipline exist? The role of policies, processes, people, and places. Richmond, VA. Metropolitan Educational Research Consortium.
4. Skiba, R. J., Horner, R. H., Chung, C.-G., Rausch, M. K., May, S. L., & Tobin, T. (2011). Race is not neutral: A national investigation of African American and Latino disproportionality in school discipline. *School Psychology Review*, 40(1): 85–107.
5. Egalite, A., Kisida, B., & Winters, M. A. (2015). Representation in the classroom: The effect of own race teachers on student achievement. *Economics of Education Review*, 45, 44–52.
6. Grissom, J. A., Nicholson-Crotty, J., & Nicholson-Crotty, S. (2009). Race, region, and representative bureaucracy. *Public Administration Review*, 69, 911-919.
7. Lindsay, C. A., & Hart, C. M. D. (2017). Exposure to same-race teachers and student disciplinary outcomes for Black students in North Carolina. *Educational Evaluation and Policy Analysis*, 39, 485-510.
8. Names of schools have been changed.

