Does Culturally Relevant Teaching Work? An Examination From Student Perspectives

Christy M. Byrd[1]

Abstract

Culturally relevant teaching is proposed as a powerful method for increasing student achievement and engagement and for reducing achievement gaps. Nevertheless, the research demonstrating its effectiveness consists primarily of case studies of exemplary classrooms. In addition, most of the research fails to take student perspectives into account. The current study asks whether culturally relevant teaching works by considering student perceptions of classrooms that vary in the amount of culturally relevant practices. The sample was 315 sixth- through 12th-grade students sampled from across the United States (62% female, 25% White, 25% Latino, 25% African American, and 25% Asian) who completed surveys of their experiences of culturally relevant teaching, cultural socialization, opportunities to learn about other cultures, and opportunities to learn about racism. Elements of culturally relevant teaching were significantly associated with academic outcomes and ethnic-racial identity development. The findings provide support for the effectiveness of culturally relevant teaching in everyday classrooms.

The current study seeks to explore how culturally relevant teaching and school racial socialization are associated with the academic and attitudinal outcomes of diverse middle and high school students. Culturally relevant, or culturally responsive, teaching is teaching that draws on the cultural backgrounds and knowledge of students as assets in the classroom (Gay, 2010). School racial socialization refers to messages to students encouraging positive racial attitudes and an understanding of the role of race and culture in society (Hughes et al., 2006). Both have been proposed to promote better outcomes for students, particularly students of color, but there is a greater need for empirical support. The current study uses a diverse, nationwide sample to test the benefits of culturally relevant teaching and positive school racial socialization.

Culturally Relevant Teaching

Research is fairly consistent on the qualities of a culturally relevant teacher. Culturally relevant teaching centers students' culture in teaching practice through three primary approaches: *high expectations*, promoting *cultural competence*, and promoting *critical consciousness* (Dickson, Chun, & Fernandez, 2015; Ladson-Billings, 1995a; Ladson-Billings, 1995b; Morrison, Robbins, & Rose, 2008). In terms of high

expectations, culturally relevant teachers offer a challenging curriculum and scaffold students' learning. They build on students' strengths and take personal responsibility for students' success. Culturally relevant teachers also create classroom climates that are respectful and inclusive and that help students value and understand the cultures of their peers. Cooperative and experiential learning are common methods of instruction.

Second, in terms of cultural competence, teachers first must develop their own cultural competence by understanding their students' communities and home lives. Furthermore, teachers encourage students' understanding of their own and others' cultures by including content from students' homes and communities and by representing people of many backgrounds in materials. Culturally relevant teachers also use students' previous experiences and funds of knowledge gained from their families and communities as assets in the classroom. These teachers create bridges from students' knowledge to the classroom content as way to affirm student

[1]University of California, Santa Cruz, USA

Corresponding Author:
Christy M. Byrd, Psychology Faculty Services, University of California, Santa Cruz, 1156 High Street, Santa Cruz, CA 95064, USA.
Email: cmbyrd@ucsc.edu

identities and values. Culturally relevant teachers also create bridges by bringing the outside world into the classroom and sending students into the community for service learning.

Finally, culturally relevant teachers raise students' critical consciousness by addressing issues of social justice and racial inequality in the classroom. They encourage students to identify problems in their communities and to seek ways to address them. They acknowledge societal oppression and encourage students to notice how those dynamics are evident in their everyday lives. Culturally relevant teachers also empower students in the classroom and give students opportunities to participate in decision making.

In sum, culturally relevant teaching shares the features of constructivist, student-centered, and authentic learning practice (Newmann, Marks, & Gamoran, 1996; Richardson, 2003; Yilmaz, 2008), for example, by connecting course content with students' prior knowledge. However, culturally relevant teaching is also deeply embedded in student's home lives, communities, and cultural funds of knowledge. Some argue that culturally relevant teaching, with its focus on academic success through valuing students' interests and existing knowledge, is just "good teaching," yet these forms of good teaching are less often seen for students of color, and so achievement gaps persist (Ladson-Billings, 1995a; Sleeter, 2012). Scholars propose that true culturally relevant teaching is an important method to reduce achievement gaps and promote positive ethnic-racial identities for students of color (Dickson et al., 2015; Sleeter, 2012). In practice, unfortunately, culturally relevant teaching is often simplified and relegated to little more than occasional group work or celebrating different cultures in ways that disregard individual interests and stereotype students (Sleeter, 2012).

School Racial Socialization

Another way to consider the role of race and culture in the classroom is through school racial socialization. School racial socialization draws on the literatures examining parental racial socialization (e.g., Hughes, McGill, Ford, & Tubbs, 2011; Hughes et al., 2006) and multicultural education (e.g., Bennett, 2001) and focuses on specific messages and practices in classrooms. Recent frameworks identify several dimensions (Aldana & Byrd, 2015; Byrd, 2015), and the current study focuses on four: *cultural socialization, promotion of cultural competence, support for positive interaction*, and *critical consciousness socialization*.

First, cultural socialization refers to opportunities to learn about one's own culture in school. For example, for African American students, cultural socialization can include events during Black History Month and pedagogies such as Afrocentric education. This set of messages focuses on the cultural competence dimension of culturally relevant teaching. Activities and messages classified as promotion of cultural competence give students the opportunity to learn about the history, traditions, and cultures of groups, not their own.

Next, support for positive interaction also promotes cultural competence through norms and messages that encourage students to have friends of different races and to study and interact with students of other races. Finally, critical consciousness socialization addresses the critical consciousness aspect of culturally relevant teaching by focusing on messages that encourage students to be aware of prejudice and discrimination in society.

Review of the Literature

For more detailed reviews of the influence of culturally relevant teaching and school racial socialization, see Aronson and Laughter (2015), Morrison et al. (2008), and Aldana and Byrd (2015). In terms of academic outcomes, there is evidence that culturally relevant teaching promotes academic achievement and engagement (e.g., Christianakis, 2011; Ensign, 2003; Rodriguez, Jones, Pang, & Park, 2004; Tate, 1995). For example, in seventh- and eighth-grade math classrooms, Latino students used real-life information, such as traffic stop data, to understand math concepts and explore racial profiling in their community (Gutstein, 2003). These students gained a greater understanding of mathematical ideas and a greater value for math.

Culturally relevant teaching also promotes a sense of critical consciousness (e.g., Epstein, Mayorga, & Nelson, 2011; Martell, 2013; Morrell & Duncan-Andrade, 2002; Stovall, 2006). In one study of a middle school science classroom, students discussed bias in relation to science practice and connected scientific bias to bias in the larger society (Laughter & Adams, 2012). In another study, students analyzed the pollution of a nearby river and developed ways to become politically active in their communities (Dimick, 2012).

Finally, culturally relevant teaching and school racial socialization can promote a positive ethnic-racial identity and positive attitudes toward others (e.g., Aldana, Rowley, Checkoway, & Richards-Schuster, 2012; Brozo, Valerio, & Salazar, 1996; Dessel, Rogge, & Garlington, 2006; Spencer, Brown, Griffin, & Abdullah, 2008). For example, African American girls in a culturally relevant after-school program scored higher in ethnic-racial identity exploration and commitment compared with a control group. They also were more aware of racism and were more likely to engage in activism (Thomas, Davidson, & McAdoo, 2008).

Limitations in the Literature

Despite these positive findings, there are three major limitations to the extant research. The first is that there are few empirically strong studies showing culturally relevant teachings' effects (Sleeter, 2012). A recent review (B. Aronson & Laughter, 2015) analyzed more than 40 published studies and dissertations; of those, almost all were qualitative case studies exploring the teaching practices in classrooms

specifically selected for their focus on culturally relevant teaching. Only two studies employed pre- and post-tests to measure changes in student outcomes (Bui & Fagan, 2013; Rodriguez et al., 2004), and only one compared the teaching in the culturally relevant program with a matched program. In that study, researchers compared a reading intervention that utilized multicultural literature with one that used traditional literature. The researchers found *no* significant differences in students' reading skills (Bui & Fagan, 2013). In case studies, it is impossible to determine whether student gains were due specifically to culturally relevant teaching or other aspects of the teacher's practices or experience. Estimating the true effects of culturally relevant teaching requires comparing classrooms that use more culturally relevant teaching with those that use less. The current study addresses this limitation by examining variation in culturally relevant practices.

A second limitation is that culturally relevant teaching is primarily determined from the researcher's or teacher's perspective, rather than the students' (Howard, 2001). As most research is based on case studies, researchers generally select teachers known for their good teaching, often with little indication from students of how much they feel teachers engage with their backgrounds and interests. Because valuing student experience is a primary element of culturally relevant teaching, it is essential that research also consider their perspectives. Relatedly, understanding how well teachers are engaging with students' cultures is useful for distinguishing culturally relevant teaching from other student-centered approaches. The current study measures perceptions of culturally relevant practices from students' perspectives and distinguishes between culture-based and general constructivist practices.

The third limitation is that culturally relevant teaching studies generally focus on homogeneous, and often predominantly Black, classrooms (Morrison et al., 2008). There is very little evidence of how culturally relevant teaching relates to outcomes for diverse classrooms, for other students of color, and for White students. The sample in the current study addresses this limitation by including White, Latino, and Asian American students in addition to Black students. The study also draws on students in schools of varying racial compositions.

The Current Study

In sum, the current study advances the literature on student diversity by empirically showing how culturally relevant teaching is important in a racially diverse sample that varies in exposure to the practices. I measure culturally relevant teaching in two ways: through general measures of constructivist teaching practices and cultural engagement, and with specific measures of school racial socialization. By measuring four types of racial socialization messages, the current study can examine greater variability in practices and provide a better sense of what aspects of culturally relevant teaching are most important for student outcomes.

My research question was as follows:

Research Question 1: How are students' perceptions of teachers' use of culturally relevant teaching and school racial socialization related to students' academic outcomes and racial attitudes?

Hypothesis 1: Perceptions of more constructivist teaching practices, cultural engagement, cultural socialization, promotion of cultural competence, support for positive interaction, and critical consciousness socialization would be associated with better academic outcomes and more positive racial attitudes.

Method

Participants

Participants were 315 sixth- to 12th-grade students recruited through a nationwide panel by Qualtrics, an online survey company (Mage = 15.34, SD = 1.75). The sample was 62% female, 25% White, 25% Latino, 25% African American, and 25% Asian.

Measures

Participants self-reported their age, gender, grade, and race.

Culturally relevant teaching. The Student Measure of Culturally Responsive Teaching (Dickson et al., 2015) contained two subscales. The first was Constructivist Teaching Practice, or the degree to which teachers use innovative methods, such as using real-life examples; using videos, pictures, and guests to teach; connecting with previous knowledge; and creating a climate of respect (11 items, α = .92). Example items were "My instructors try to find out what interests me" and "My instructor explains what we are learning in different ways to help students learn." The second subscale was Cultural Engagement, or the degree to which teachers bring students' culture and home life into the classroom (seven items, α = .91). An example item was "My instructors use examples of my culture when they are teaching." All items were on a scale of 1 (*never*) to 5 (*always*).

School racial socialization. The School Climate for Diversity Scale–Secondary was developed by the author (Byrd, under review). All items were on a scale of 1 (*not at all true*) to 5 (*completely true*) and are listed in the appendix. Cultural socialization was indicated by three items measuring opportunities to learn about one's own culture (α = .81). An example item is "At your school, you have chances to learn about the history and traditions of your culture." Promotion of cultural competence consisted of six items indicating opportunities to learn about other cultures and traditions (α = .89). An example

item is "At your school, they encourage you to learn about different cultures."

Support for positive interaction measured norms around positive interracial interaction with four items indicating teacher, principal, and student support for having friends of different races and hanging out with people of different races (α = .77). An example item was "Teachers encourage students to make friends with students of different races/ethnicities." Finally, critical consciousness socialization refers to messages that teach about racial inequality and social justice. The subscale had four items (α = .72). An example item is "In your classes you have learned about how race/ethnicity plays a role in who is successful."

Academic outcomes. First, participants indicated the *grades* they usually get in school with a single-item question ranging from 1 (*mostly Fs*) to 6 (*all or mostly As*). Second, *interest* was measured with three items of enjoying and being interested in school (α = .88) on a scale of 1 (*not at all true*) to 5 (*completely true*). An example item was "I find school interesting." Third, *school belonging* (α = .85) was measured with the Relatedness subscale of the Basic Needs Satisfaction scale adapted for school (Deci & Ryan, 2000). The scale includes eight items asking youth how much they like people at the school and how much others at the school like them, and was measured on a 1 (*not at all true*) to 5 (*completely true*) scale. An example item was "I really like the people at my school." Fourth, adolescents' perceptions of their *academic competence* were assessed with an Academic Self-Concept scale (α = .87) based on a measure by Nicholls (1978). The scale included eight items asking youth to rate themselves on a 1 (*below average*) to 5 (*above average*) scale in several academic subjects, grades, and overall intelligence.

Racial attitudes. The Multigroup Ethnic Identity Measure–Revised (MEIM-R; Phinney & Ong, 2007) measured individuals' self-concepts relating to their membership in an ethnic-racial group. The items on the six-item measure were rated on a 5-point Likert-type scale (1 = *strongly disagree* to 5 = *strongly agree*). The scale was modified to use "racial/ethnic group" in place of "ethnic group." The Commitment subscale (three items, α = .76) measured attachment to the ethnic-racial group, for example, "I have a strong sense of belonging to my own racial/ethnic group." The Exploration subscale (three items, α = .81) measured information seeking about one's ethnic group, for example, "I have often done things that will help me understand my racial/ethnic background better."

The Other Group Orientation scale (Phinney, 1992) measured attitudes and interactions toward ethnic-racial groups other than one's own. The current study included three items from this scale rated on a 5-point scale from *strongly disagree* to *strongly agree* (α = .72). The term *races/ethnicities* was substituted for *ethnic group* to be consistent with other

study measures. An example item was "I like meeting and getting to know people from other races/ethnicities."

A Racism Awareness scale was created based on items from the Colorblind Racial Attitudes Scale (Neville, Lilly, Duran, Lee, & Browne, 2000). The two items assessed beliefs that race plays a role in chances to be successful in society, for example, "Racism may have been a problem in the past, but it is not a problem today" (reverse coded), utilizing a 5-point Likert-type scale with end points of 1 (*strongly disagree*) to 5 (*strongly agree*). Higher scores reflect greater awareness of racism. The correlation between the items was .40.

Procedure

Procedures were approved by the university institutional review board. The survey was delivered to adolescents on select online nationwide panels recruited by Qualtrics based on random assignment and the likelihood that they would meet the eligibility criteria. The first page of the survey described the survey and asked participants to obtain parent consent before continuing. Participants then completed the demographic block of questions. Those who were between the ages of 12 and 18, who were in sixth to 12th grade, and who were White, Black/African American, Asian American, or Latino were allowed to continue; the rest were directed to the end of the survey. Participants were excluded if they completed the survey in less than 5 min or failed one of two attention checks. Sampling continued until 315 participants who met all criteria had completed the survey.

Results

Means and standard deviations are reported in Table 1. Culturally relevant teaching had weak to moderate correlations with most of the outcomes, as did racial socialization. The primary analyses consisted of linear regressions that estimated the relationship between the climate variables and the outcomes, controlling for gender, age, and race. The results are reported in Table 2 and Table 3.

Academic Outcomes

The first model explored the associations of culturally relevant teaching and racial socialization with self-reported grades. The model explained 19% of variance in the outcome, but climate was not significantly associated. The second model tested interest in school: The model explained 22% of the variance in the outcome. Perceptions that teachers used more constructivist practices was related to greater interest in school ($B = 0.384$, $p < .001$). Next, the model for feelings of belonging explained 23% of variance in the outcome. Greater feelings of belonging were predicted by perceptions of more constructivist teaching practices ($B = 0.366$, $p < .001$) and greater promotion of cultural competence

Table 1. Means and Standard Deviations, and Bivariate Correlations Between Study Variables.

Variable	M (SD)	Grades	Interest	Belonging	Academic self-concept	Exploration	Commitment	Other group orientation	Awareness of racism
M (SD)		5.02 (0.74)	3.25 (0.96)	3.54 (0.77)	3.86 (0.74)	3.29 (0.95)	3.48 (0.90)	4.29 (0.75)	2.55 (1.12)
Diverse teaching practices									
r	3.63 (0.73)	.178	.420	.374	.220	.217	.120	.310	−.164
p		.002	<.001	<.001	<.001	<.001	.034	<.001	.004
Cultural engagement									
r	2.75 (0.91)	.079	.346	.214	.158	.250	.188	.141	−.035
P		.161	<.001	<.001	.005	<.001	.001	.012	.537
Support for positive interaction									
r	3.58 (0.88)	.169	.303	.258	.204	.263	.116	.359	−.120
p		.003	<.001	<.001	<.001	<.001	.039	<.001	.033
Promotion of cultural competence									
r	3.49 (0.89)	.164	.392	.326	.203	.276	.160	.232	−.154
p		.004	<.001	<.001	<.001	<.001	.004	<.001	.006
Cultural socialization									
r	3.94 (1.08)	.101	.337	.252	.176	.399	.266	.110	−.018
p		.074	<.001	<.001	.002	<.001	<.001	.051	.747
Critical consciousness									
r	3.04 (0.91)	.119	.280	.103	.174	.336	.248	.119	.113
p		.035	<.001	.068	.002	<.001	<.001	.035	.045

Table 2. Linear Regressions for Culturally Relevant Teaching and School Racial Socialization Predicting Academic Outcomes.

Predictor	Grades			Interest			Belonging			Academic self-concept		
	B	SE	p	B	SE	p	B	SE	p	B	SE	p
Intercept	3.446	0.433	<.001	0.929	0.551	.093	1.773	0.434	<.001	2.287	0.450	<.001
Age	−0.006	0.023	.789	0.004	0.029	.901	0.043	0.023	.064	0.017	0.024	.491
Gender	−0.307	0.083	<.001	0.007	0.105	.945	−0.245	0.083	.003	0.122	0.086	.156
Asian	−0.440	0.117	<.001	0.046	0.149	.757	−0.127	0.117	.279	0.335	0.122	.006
Black	0.092	0.115	.423	0.098	0.147	.504	−0.094	0.116	.417	0.143	0.120	.234
Latino	0.164	0.112	.144	0.004	0.143	.979	−0.155	0.113	.168	0.062	0.117	.598
Constructivist teaching practices	−0.142	0.076	.062	0.384	0.097	<.001	0.366	0.076	<.001	0.143	0.079	.072
Cultural engagement	0.080	0.068	.242	−0.003	0.087	.973	−0.121	0.069	.079	−0.024	0.071	.737
Support for positive interaction	−0.056	0.064	.379	−0.03	0.081	.710	0.032	0.064	.617	0.049	0.067	.460
Promotion of cultural competence	−0.023	0.078	.771	0.174	0.099	.080	0.226	0.078	.004	0.029	0.081	.725
Cultural socialization	−0.087	0.054	.109	0.115	0.069	.096	0.088	0.054	.105	0.078	0.056	.164
Critical consciousness	0.002	0.062	.976	−0.001	0.079	.987	−0.185	0.062	.003	0.009	0.065	.893

($B = 0.226$, $p = .004$). Surprisingly, perception of more critical consciousness socialization were associated with lower feelings of belonging ($B = -0.185$, $p = .003$). Finally, the predictors were not significantly associated with academic self-concept. The model explained 11% of variance. Overall, the hypothesis was partially confirmed: Constructivist practices and promotion of cultural competence were positively associated with academic outcomes.

Racial Attitudes

Perceptions of greater cultural socialization and critical consciousness socialization significantly predicted exploration of ethnic-racial identity ($B = 0.366$, $p < .001$, and $B = 0.168$,

$p = .033$, respectively). The model explained 22% of variance in the outcome. More cultural socialization and critical consciousness socialization also predicted greater commitment to one's identity ($B = 0.188$, $p = .006$, and $B = 0.165$, $p = .036$, respectively), with the model explaining 11% of variance. Next, I examined the model predicting comfort with people who are of a different background. Constructivist teaching practices ($B = 0.212$, $p = .005$) and support for positive interaction ($B = 0.256$, $p < .001$) were both positively associated with outgroup comfort. The model explained 21% of the variance in the outcome. Finally, the model for awareness of racism explained 17% of the variance. Promotion of cultural competence ($B = -0.384$, $p = .001$) was negatively associated with racism awareness, and critical consciousness

Table 3. Linear Regressions for Culturally Relevant Teaching and School Racial Socialization Predicting Racial Attitudes.

Predictor	Exploration			Commitment			Other group orientation			Racism awareness		
	B	SE	p	B	SE	p	B	SE	p	B	SE	p
Intercept	1.306	0.542	.017	2.290	0.544	<.001	2.370	0.426	<.001	2.050	0.656	.002
Age	0.018	0.029	.523	0.022	0.029	.448	0.006	0.023	.779	0.077	0.035	.029
Gender	0.009	0.103	.933	−0.089	0.104	.389	0.239	0.081	.003	−0.119	0.125	.342
Asian	0.407	0.146	.006	0.258	0.147	.080	0.124	0.115	.282	0.552	0.177	.002
Black	0.100	0.144	.491	0.176	0.145	.225	0.289	0.113	.011	0.341	0.175	.052
Latino	0.211	0.141	.136	0.309	0.141	.029	0.078	0.110	.480	0.252	0.170	.140
Constructivist teaching practices	0.102	0.095	.284	0.026	0.096	.785	0.212	0.075	.005	−0.213	0.115	.066
Cultural engagement	−0.050	0.086	.562	0.038	0.086	.655	−0.085	0.067	.207	0.138	0.104	.183
Support for positive interaction	0.070	0.080	.387	−0.034	0.081	.677	0.256	0.063	<.001	−0.107	0.097	.270
Promotion of cultural competence	−0.158	0.098	.106	−0.091	0.098	.357	0.050	0.077	.519	−0.384	0.118	.001
Cultural socialization	0.366	0.068	<.001	0.188	0.068	.006	−0.014	0.053	.790	0.116	0.082	.158
Critical consciousness	0.168	0.078	.033	0.165	0.078	.036	−0.088	0.061	.152	0.329	0.095	.001

socialization (*B* = 0.329, *p* = .001) was positively associated with racism awareness. The hypothesis was mostly confirmed: Cultural socialization, critical consciousness socialization, constructivist teaching practices, and support for positive interaction were positively associated with racial attitudes.

Discussion

The purpose of this study was to investigate the relations of students' perceptions of culturally relevant teaching and school racial socialization with academic outcomes and racial attitudes. This study was unique in that it used a quantitative methodology, had a diverse sample, and focused on student perceptions, compared with existing research that primarily focuses on homogeneous, specially selected classrooms. For the most part, the results supported the hypothesis. Of the two culturally relevant teaching measures, perceptions that teachers used constructivist methods were related to interest in school, greater feelings of belonging, and other group orientation. The other measure of culturally relevant teaching was not directly related to the academic outcomes or racial attitudes, but the more specific school racial socialization measures were predictive for feelings of belonging and racial attitudes.

The finding that diverse teaching practices are associated with better outcomes supports the literature on student-centered, authentic instruction (Newmann et al., 1996; Saye & Social Studies Inquiry Research Collaborative, 2013). When teachers use real-life examples and try to connect to the interests of the students in the classroom, students are more engaged and feel more connected to their schools. Constructivist teaching methods encourage students to be themselves in the classroom and to authentically connect with the teacher and their peers. These personal connections not only lead to better learning, they are key for reduced prejudice and improved intergroup relations (E. Aronson &

Bridgeman, 1979; Pettigrew, 1998; Singh, 1991). Intergroup contact theory (Allport, 1954) indicates that reducing prejudice requires groups to interact under conditions of equal status and interdependence, with support from authority figures. Constructivist teaching practices, even though they may not explicitly engage with race, encourage these conditions.

These findings do lend support to the idea that culturally relevant teaching is "good teaching" (Ladson-Billings, 1995a), but the findings also indicate that a direct focus on race and culture in the classroom is beneficial. Teachers' support for positive interaction, another indicator of the ideal conditions of intergroup contact theory, was related to more positive attitudes toward people of different backgrounds. The findings also suggest that school racial socialization is particularly important for the development of students' ethnic-racial identity, as both cultural socialization and critical consciousness socialization were positively related to identity exploration and commitment, which supports previous research (Thomas et al., 2008). Existing research has shown that a positive ethnic-racial identity is linked to academic achievement and persistence (Rivas-Drake et al., 2014), so school racial socialization also indirectly relates to academic success.

Contrary to the hypothesis, however, promotion of cultural competence was associated with less awareness of racism, and critical consciousness socialization was related to lower feelings of belonging. Multicultural education theorists (Sleeter & Grant, 2011) identify several approaches to integrating diversity into the classroom, and some of the approaches that emphasize respect and tolerance for all individuals may highlight the message that all people are equal to each other without acknowledging present-day racism and discrimination. When controlling for perceptions of critical consciousness socialization, the model extracted the variance associated with a humanitarian message that, according to the current results, may obscure an understanding of racial inequality. It is important that teachers balance celebrations

of diversity with discussions of historical and contemporary racism. When students perceived their teachers as explicitly engaging with social issues and the role of race in society, they were more aware that racism exists. For students of color, this awareness buffers them from negative academic and mental health outcomes when they experience discrimination in school and the community (Chavous et al., 2003; Thomas, Caldwell, Faison, & Jackson, 2009). For example, African American youth who understand that society devalues their group are more likely to notice discrimination, but they also have less negative psychological effects when they experience discrimination (Sellers, Copeland-Linder, Martin, & Lewis, 2006). A positive ethnic-racial identity also buffers against experiences of discrimination (Caldwell, Kohn-Wood, Schmeelk-Cone, Chavous, & Zimmerman, 2004; Mossakowski, 2003; Rivas-Drake et al., 2014). This awareness also helps students to recognize their own implicit bias, particularly for White students (Aldana et al., 2012; Dessel, 2010; Spencer et al., 2008).

It was additionally surprising that critical consciousness socialization was associated with lower feelings of belonging. Being taught about racism in society may highlight for students the racism that exists in their own school environments. Nevertheless, the lower feelings of belonging may be counterbalanced by a more positive sense of ethnic-racial identity and more adaptive responses to the discrimination they inevitably face. At the same time, the findings showed that promotion of cultural competence was associated with greater feelings of belonging, so these findings may also highlight the need to balance learning about other cultures with learning about cultural conflict. Finally, I did not find that school racial socialization was directly associated with grades or academic self-concept. This supports previous work that has also found that these dimensions of racial socialization were not associated with academic self-concept (Byrd, 2015). It may be that socialization is indirectly associated with some academic outcomes through the promotion of a positive ethnic-racial identity.

Some limitations of the study were that the outcomes were all self-reported and the study was cross-sectional. Having official grades or teacher reports of engagement would strengthen the study, as would examining outcomes over time. However, a major strength of the study was that the participants were balanced by racial group and went to schools across the United States, so the results are highly generalizable to the four racial groups included.

Recommendations for Teachers

In sum, when asking whether culturally relevant teaching works, the answer from the current study is a qualified *yes*. Teaching methods that connect with students' real lives and interests and promote understanding of other cultures are associated with better academic outcomes. In addition, encouraging students' understanding of their own culture

and raising awareness about racism and discrimination is related to students' ethnic-racial identity development. The findings point toward several recommendations for practice.

First, get to know students, including their cultural backgrounds, and personalize instruction. Learning about students' backgrounds and experiences is a key high-leverage practice (Teaching Works, n.d.). However, teachers often have a desire to "not see color" and are hesitant to acknowledge race for fear of seeming racist or stereotyping students. Teachers can avoid stereotyping by educating themselves about the differences across and within cultures and by knowing their students on an individual level. For many students of color, their race is an important part of their identity and to ignore it is to miss a potential point of connection. By acknowledging a student's whole self, teachers build better relationships and encourage students to see value in school.

Second, teach about cultural diversity even when the class is not diverse. The sample included students in a wide range of school settings, but the findings were consistent for the entire sample. As the United States becomes more diverse, all individuals will be required to interact across racial and cultural lines to be successful, and even non-diverse schools can prepare students for these interactions.

Third, encourage appreciation for diversity but acknowledge current inequities. Teachers often feel that students are too young to learn about racism, but studies show that even preschool children respond positively to teaching about bias (Bigler & Wright, 2014; Coughran, 2012; Durden, Escalante, & Blitch, 2015). Even more importantly, secondary students have greater cognitive ability to understand and greater interest in social issues and real-world challenges, and perform better when the curriculum is meaningful (Eccles & Roeser, 2009). Opportunities to explore racism and anti-racism in school will help students to see that school is relevant to their everyday lives and can build their sense of agency and civic engagement. Obscuring the truth of racism, however, promotes mistrust of the education system for students who are already aware of discrimination and leaves the others unprepared for the world outside of school. It is true that in many schools, discussions of race and culture, as well as other contentious topics, can be controversial. Teachers are not the sole determiners of what conversations can occur in their classrooms, and so partnerships with administrators and parents are essential. Some useful resources for teaching about privilege and oppression include *Open Minds to Equality* (Schniedewind & Davidson, 2006), *Teaching for Diversity and Social Justice* (Adams, Bell, & Griffin, 2007), and the National Association for Multicultural Education.

In conclusion, culturally relevant teaching remains an important method for promoting achievement and positive identities for students of all races. When measuring teaching practices from student perspectives, it is clear that it is value to combine core principles of good teaching with recognition of the importance of race and culture.

Appendix

Items From School Climate for Diversity Scale–Secondary

Stem: Think about your school. How true are the following questions?

Cultural socialization. At your school, you have chances to learn about the history and traditions of your culture.
At your school, you have participated in activities that teach you more about your cultural background.
In your classes, you have learned new things about your culture.

Promotion of cultural competence. You have learned about new cultures and traditions at school.
You have the chance to learn about the culture of others.
In school, you get to do things that help you learn about people of different races and cultures.
Your classes teach you about diverse cultures and traditions.
Your textbooks show people of many different races/ethnicities.
At your school, they encourage you to learn about different cultures.

Support for positive interaction. Teachers encourage students to make friends with students of different races/ethnicities.
The principals like for students to have friends of different races/ethnicities.
Students here think it is good to study with people of different races/ethnicities.
Teachers and principals say it is good to be a diverse school.

Critical consciousness socialization. Teachers teach about racial inequality in the United States.
In your classes, you have learned about how race/ethnicity plays a role in who is successful.
You have opportunities to learn about social justice.
Your teachers encourage awareness of social issues affecting your culture.
Note: The full scale is available at http://byrdlab.sites.ucsc.edu/research/scale/.

Declaration of Conflicting Interests

Funding

References

Adams, M., Bell, L. A., & Griffin, P. (2007). *Teaching for diversity and social justice*. New York, NY: Routledge.

Aldana, A., & Byrd, C. M. (2015). School ethnic–racial socialization: Learning about race and ethnicity among African American students. *The Urban Review*, *47*(3), 563-576.

Aldana, A., Rowley, S. J., Checkoway, B., & Richards-Schuster, K. (2012). Raising ethnic-racial consciousness: The relationship between intergroup dialogues and adolescents' ethnic-racial identity and racism awareness. *Equity & Excellence in Education*, *45*, 120-137.

Allport, G. W. (1954). *The nature of prejudice*. Boston, MA: Addison-Wesley.

Aronson, B., & Laughter, J. (2015). The theory and practice of culturally relevant education: A synthesis of research across content areas. *Review of Educational Research*, *86*, 163-206. doi:10.3102/0034654315582066

Aronson, E., & Bridgeman, D. (1979). Jigsaw groups and the desegregated classroom: In pursuit of common goals. *Personality and Social Psychology Bulletin*, *5*, 438-446. doi:10.1177/014616727900500405

Bennett, C. (2001). Genres of research in multicultural education. *Review of Educational Research*, *71*, 171-217.

Bigler, R. S., & Wright, Y. F. (2014). Reading, writing, arithmetic, and racism? Risks and benefits to teaching children about intergroup biases. *Child Development Perspectives*, *8*, 18-23. doi:10.1111/cdep.12057

Brozo, W. G., Valerio, P. C., & Salazar, M. M. (1996). A walk through Gracie's garden: Literacy and cultural explorations in a Mexican American junior high school. *Journal of Adolescent & Adult Literacy*, *40*, 164-170.

Bui, Y. N., & Fagan, Y. M. (2013). The effects of an integrated reading comprehension strategy: A culturally responsive teaching approach for fifth-grade students' reading comprehension. *Preventing School Failure*, *57*, 59-69.

Byrd, C. M. (2015). The associations of intergroup interactions and school racial socialization with academic motivation. *The Journal of Educational Research*, *108*(1), 10-21.

Byrd, C. M. (under review). *A Measure of School Racial Socialization and Quality of Intergroup Interactions*. Manuscript under review.

Caldwell, C. H., Kohn-Wood, L. P., Schmeelk-Cone, K. H., Chavous, T. M., & Zimmerman, M. A. (2004). Racial discrimination and racial identity as risk or protective factors for violent behaviors in African American young adults. *American Journal of Community Psychology*, *33*, 91-105. doi:10.1023/B:AJCP.0000014321.02367.dd

Chavous, T. M., Bernat, D. H., Schmeelk-Cone, K., Caldwell, C. H., Kohn-Wood, L., & Zimmerman, M. A. (2003). Racial identity and academic attainment among African American adolescents. *Child Development*, *74*, 1076-1090.

Christianakis, M. (2011). Hybrid texts: Fifth graders, rap music, and writing. *Urban Education*, *46*, 1131-1168. doi:10.1177/0042085911400326

Coughran, M. J. (2012). *Enacting culturally relevant pedagogy: Going beyond heroes and holidays curriculum*. (Doctoral dissertation). Retrieved from http://gradworks.umi.com/15/10/1510828.html

Deci, E. L., & Ryan, R. M. (2000). The "what" and "why" of goal pursuits: Human needs and the self-determination of behavior. *Psychological Inquiry*, *11*, 227-268.

Dessel, A. (2010). Prejudice in schools: Promotion of an inclusive culture and climate. *Education and Urban Society*, *42*, 407-429. doi:10.1177/0013124510361852

Dessel, A., Rogge, M. E., & Garlington, S. B. (2006). Using intergroup dialogue to promote social justice and change. *Social Work*, *51*, 303-315.

Dickson, G. L., Chun, H., & Fernandez, I. T. (2015). The development and initial validation of the student measure of culturally responsive teaching. *Assessment for Effective Intervention*, *41*, 141-154. doi:10.1177/1534508415604879

Dimick, A. S. (2012). Student empowerment in an environmental science classroom: Toward a framework for social justice science education. *Science Education*, *96*, 990-1012. doi:10.1002/sce.21035

Durden, T. R., Escalante, E., & Blitch, K. (2015). Start with us! Culturally relevant pedagogy in the preschool classroom. *Early Childhood Education Journal*, *43*, 223-232. doi:10.1007/s10643-014-0651-8

Eccles, J. S., & Roeser, R. W. (2009). Schools, academic motivation, and stage-environment fit. In R. M. Lerner & L. Steinberg (Eds.), *Handbook of adolescent psychology, Vol. 1: Individual bases of adolescent development* (3rd ed., pp. 404-434). Hoboken, NJ: John Wiley.

Ensign, J. (2003). Including culturally relevant math in an urban school. *Educational Studies: Journal of the American Educational Studies Association*, *34*, 414-423.

Epstein, T., Mayorga, E., & Nelson, J. (2011). Teaching about race in an urban history class: The effects of culturally responsive teaching. *Journal of Social Studies Research*, *35*(1), 2-21.

Gay, G. (2010). *Culturally Responsive Teaching: Theory, Research, and Practice*. New York, NY: Teachers College Press.

Gutstein, E. (2003). Teaching and learning mathematics for social justice in an urban, Latino school. *Journal for Research in Mathematics Education*, *34*, 37-73. doi:10.2307/30034699

Howard, T. C. (2001). Telling their side of the story: African-American students' perceptions of culturally relevant teaching. *The Urban Review*, *33*, 131-149.

Hughes, D. L., McGill, R. K., Ford, K. R., & Tubbs, C. (2011). Black youths' academic success: The contribution of racial socialization from parents, peers, and schools. In N. E. Hill, T. L. Mann, & H. E. Fitzgerald (Eds.), *African American children and mental health: Development and context, prevention and social policy* (Vols. 1 and 2, pp. 95-124). Santa Barbara, CA: Praeger.

Hughes, D. L., Rodriguez, J., Smith, E. P., Johnson, D. J., Stevenson, H. C., & Spicer, P. (2006). Parents' ethnic-racial socialization practices: A review of research and directions for future study. *Developmental Psychology*, *42*, 747-770.

Ladson-Billings, G. (1995a). But that's just good teaching! The case for culturally relevant pedagogy. *Theory Into Practice*, *34*, 159-165.

Ladson-Billings, G. (1995b). Toward a theory of culturally relevant pedagogy. *American Educational Research Journal*, *32*, 465-491.

Laughter, J. C., & Adams, A. D. (2012). Culturally relevant science teaching in middle school. *Urban Education*, *47*, 1106-1134. doi:10.1177/0042085912454443

Martell, C. C. (2013). Race and histories: Examining culturally relevant teaching in the U.S. history classroom. *Theory & Research in Social Education*, *41*, 65-88.

Morrell, E., & Duncan-Andrade, J. M. R. (2002). Promoting academic literacy with urban youth through engaging hip-hop culture. *English Journal*, *91*(6), 88-92.

Morrison, K. A., Robbins, H. H., & Rose, D. G. (2008). Operationalizing culturally relevant pedagogy: A synthesis of classroom-based research. *Equity & Excellence in Education*, *41*, 433-452.

Mossakowski, K. N. (2003). Coping with perceived discrimination: Does ethnic identity protect mental health? *Journal of Health and Social Behavior*, *44*, 318-331. doi:10.2307/1519782

Neville, H. A., Lilly, R. L., Duran, G., Lee, R. M., & Browne, L. (2000). Construction and initial validation of the Color-Blind Racial Attitudes Scale (CoBRAS). *Journal of Counseling Psychology*, *47*, 59-70. doi:10.1037/0022-0167.47.1.59

Newmann, F. M., Marks, H. M., & Gamoran, A. (1996). Authentic pedagogy and student performance. *American Journal of Education*, *104*, 280-312.

Nicholls, J. G. (1978). The development of the concepts of effort and ability, perception of academic attainment, and the understanding that difficult tasks require more ability. *Child Development*, *49*, 800-814. doi:10.2307/1128250

Pettigrew, T. F. (1998). Intergroup contact theory. *Annual Review of Psychology*, *49*, 65-85.

Phinney, J. S. (1992). The Multigroup Ethnic Identity Measure: A new scale for use with diverse groups. *Journal of Adolescent Research*, *7*, 156-176. doi:10.1177/074355489272003

Phinney, J. S., & Ong, A. D. (2007). Conceptualization and measurement of ethnic identity: Current status and future directions. *Journal of Counseling Psychology*, *54*, 271-281.

Richardson, V. (2003). Constructivist pedagogy. *Teachers College Record*, *105*, 1623-1640.

Rivas-Drake, D., Syed, M., Umaña-Taylor, A., Markstrom, C., French, S., & Schwartz, S. J. . . . Ethnic and Racial Identity in the 21st Century Study Group. (2014). Feeling good, happy, and proud: A meta-analysis of positive ethnic-racial affect and adjustment. *Child Development*, *85*, 77-102. doi:10.1111/cdev.12175

Rodriguez, J. L., Jones, E. B., Pang, V. O., & Park, C. D. (2004). Promoting academic achievement and identity development among diverse high school students. *High School Journal*, *87*(3), 44-53.

Saye, J., & Social Studies Inquiry Research Collaborative. (2013). Authentic pedagogy: Its presence in social studies classrooms and relationship to student performance on state-mandated tests. *Theory & Research in Social Education*, *41*, 89-132. doi:10.1080/00933104.2013.756785

Schniedewind, N., & Davidson, E. (2006). *Open Minds to Equality: A Sourcebook of Learning Activities to Affirm Diversity and Promote Equity*. Milwaukee, WI: Rethinking Schools.

Sellers, R. M., Copeland-Linder, N., Martin, P. P., & Lewis, R. L. (2006). Racial identity matters: The relationship between racial discrimination and psychological functioning in African

American adolescents. *Journal of Research on Adolescence*, *16*, 187-216.

Singh, B. R. (1991). Teaching methods for reducing prejudice and enhancing academic Achievement for all children. *Educational Studies*, *17*, 157-171. doi:10.1080/0305569910170205

Sleeter, C. E. (2012). Confronting the marginalization of culturally responsive pedagogy. *Urban Education*, *47*, 562-584.

Sleeter, C. E., & Grant, C. A. (2011). *Making choices for multi-cultural education: Five approaches to race, class and gender* (6th ed.). Hoboken, NJ: John Wiley.

Spencer, M. S., Brown, M., Griffin, S., & Abdullah, S. (2008). Outcome evaluation of the intergroup project. *Small Group Research*, *39*, 82-103. doi:10.1177/1046496407313416

Stovall, D. (2006). We can relate: Hip-hop culture, critical pedagogy, and the secondary classroom. *Urban Education*, *41*, 585-602. doi:10.1177/0042085906292513

Tate, W. F. (1995). Returning to the root: A culturally relevant approach to mathematics pedagogy. *Theory Into Practice*, *34*, 166-173.

Teaching Works. (n.d.). *High leverage practices*. Retrieved from http://www.teachingworks.org/work-of-teaching/high-lever-age-practices

Thomas, O., Davidson, W., & McAdoo, H. (2008). An evaluation study of the Young Empowered Sisters (YES!) Program: Promoting cultural assets among African American adolescent girls through a culturally relevant school-based intervention. *Journal of Black Psychology*, 34, 281-308. doi:10.1177/0095798408314136

Thomas, O. N., Caldwell, C. H., Faison, N., & Jackson, J. S. (2009). Promoting academic achievement: The role of racial identity in buffering perceptions of teacher discrimination on academic achievement among African American and Caribbean Black adolescents. *Journal of Educational Psychology*, *101*, 420-431.

Yilmaz, K. (2008). Constructivism: Its theoretical underpinnings, variations, and implications for classroom instruction. *Educational Horizons*, *86*, 161-172.

Author Biography

Christy M. Byrd is an assistant professor of psychology at the University of California, Santa Cruz. Her research explores how positive school climates for diversity (school racial climates) promote academic engagement, cultural competence, and psychological well-being in students.