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A Mutual Acculturation Model of Multicultural Campus Climate and Acceptance of Diversity

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Abstract

This study examines the relationship between college students' perceptions of their campus' multicultural climate and their acceptance of racial/ethnic diversity. A two-mediator model, based on acculturation principles, was successfully fit to survey data from 434 college students of diverse racial/ethnic heritage. Results showed that valuing positive interactions with members of ethnocultural groups other than one's own is a positive mediator and strength of ethnocultural identity is a (much less important) negative mediator of the relationship between student perceptions of multicultural campus programming and personal acceptance of diverse racial/ethnic groups. Furthermore, each mediator independently contributed to the prediction of such acceptance. Overall, the model accounts for about 25% of the variance in acceptance of diversity and was a better fit to the data than a reverse path model. Follow-up analyses, separately by ethnic group, showed that perceptions of campus programming predicted acceptance of diversity for the White subsample, but not for the Latino subsample. Nevertheless, the two acculturation-related constructs were important for both groups, with the model accounting for 28% and 24% of their respective variances in acceptance of diversity. Practical implications are drawn.

Keywords

acceptance of diversity; campus climate; acculturation; ethnic identity; contact theory

Due to racial segregation in many areas of American life, multicultural educational institutions are among the most important settings in which the next generation has the opportunity to develop positive attitudes toward racial/ethnic groups other than their own. However, bringing students of diverse racial/ethnic and cultural heritages into daily contact "may sow the seeds of conflict or compassion," (Jones, 1994, p. 39) depending on the conditions under which it occurs. Stephan (1999) reviewed the results of prejudice reduction

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programs with children and adolescents in educational settings and concluded that there is an overall tendency for intergroup contact to have small, but positive effects on intergroup attitudes. Pettigrew and Tropp (2006) published a meta-analysis of 713 independent samples from 515 studies on this topic, the majority of which were based on data from college students. They drew the same conclusion. Paluck and Green (2009) provided a summary of needed research in the field, based on a review of 985 published and unpublished reports of interventions to reduce prejudice. However, there appears to be only one published report assessing college students' perceptions of their campus' efforts to promote acceptance of diverse others (McClellan, et al., 1996) and we know of no research that links such perceptions to students' acceptance of diversity.

In the present study, we use a Mutual Acculturation Model (MAM, Wittig & Molina, 2000; Wittig, 2008) to help explain the relationship between students' perceptions of their university's multicultural climate and their personal acceptance of diverse racial/ethnic groups (See Figure 1). The predictor is students' perceptions of the extent to which their campus has a positive multicultural climate. The two mediators are 1) the tendency to seek positive engagement with members of racial/ethnic groups other than one's own and 2) ethnic identity strength. The outcome is degree of acceptance of racial/ethnic diversity. The MAM was developed and tested in secondary schools (e.g., Molina, Wittig & Giang, 2004; Wittig, 2008; Wittig & Molina, 2000; Wittig, Molina, Giang & Ainsworth, 2007) but has not yet been studied in a college context. This is the focus of the present study.

Theoretical Rationale

Recent research (e.g., Dingh & Bond, 2008) suggests that acculturation-related constructs can be helpful in explaining changes that occur among groups and individuals from different cultures in contact with one another, regardless of whether the members of the groups were born in different countries. Berry, Trimble and Olmedo's (1986) theory proposed two such (potentially independent) constructs: seeking positive interactions with members of other ethnocultural groups ("outgroups") and valuing the maintenance of one's heritage identity and culture. We use these as the two mediators in the MAM.

Molina, Wittig and Giang (2004, p. 242) proposed that, as perceptions of the interracial climate become more positive, there will be an increase in willingness to interact with outgroup members because "both the social climate and the groups located within the environment are viewed as more safe and less threatening." Furthermore, increased openness to having social relationships with outgroup members within an environment that is perceived as positive should lead to constructive interactions and higher acceptance of diversity. Prior tests of the MAM on middle- and high school students (Wittig & Molina, 2000; Molina, Wittig, & Giang, 2004) showed a positive relationship between perception of the multicultural climate and outgroup orientation, which we propose will be found in the present study. While most of those cohorts also showed the relationship between multicultural climate and strength of ethnic identity to be positive, for some cohorts it was not significant. Our theoretical perspective is that multicultural programming tends to make one's ethnicity more salient (e.g., Verkuyten, 2008). The extent to which this induces a positive relationship may vary between ethnic groups. Such differences may arise because of higher initial levels of ethnic group identity for minorities vs. Whites (e.g., Phinney, et al., 1997; Roberts, et al., 1999). Predicting the strength and valence of the relationship between ethnic identity and acceptance of diversity is also uncertain, due to inconsistencies in prior results. Since high status ethnic groups tend to have higher social dominance and prejudice than low status ethnic groups (e.g., Sidanius and Pratto, 1999), Latinos and Whites may differ with respect to the implications of the strength of their ethnic identity for their intergroup attitudes.

Previous work on the MAM focused exclusively on public middle- and high school students. Results showed the overall predictive power of the model to be 20 to 25%, depending on the cohort (mean $R^2 = 23\%$). Whether the fit and predictive utility of the MAM generalizes to college students is an open question. College students are not only older, but typically have more latitude in choosing their college than their middle- or high school.

Methodological Innovations

The current study extends previous research by using a more informative data analytic approach: structural equations modeling (SEM). This enables us to 1) test the array of relationships among variables in the MAM simultaneously (rather than successively) and 2) incorporate student perceptions of their campus' multicultural programming as a latent construct, so that any unreliability associated with the measurement of these perceptions is incorporated into the model being tested (resulting in a more accurate estimate of the relations between it and other variables in the model).

We also include an alternative model in which the direction of paths is reversed. This allows us to assess the extent to which college students' perceptions of their campus multicultural programming are better understood as a predictor or as a product of their acceptance of diversity. Finally, we test the fit of the model to White and Latino students, separately. These two ethnic groups are the largest in the Southern California context and the size of the sample from each of these groups is sufficient to provide reliable tests. Prior research on the MAM suggests that interventions to promote acceptance of diversity need to be tailored for different ethnic groups (e.g., Molina & Wittig, 2006). Consequently, we pay particular attention to the extent to which the MAM fits the data from White and from Latino students.

Method

Participants

Participants were 434 students from an ethnically diverse comprehensive public university in southern California, enrolled in a Psychology of Personality laboratory course. Females constituted 75.3% of the sample; males 22.6%; and .2.0% declined to state. Their age range was from 19 to 55 years, with a mean age of 24.7 years. However, 74% were between 20 and 25 years old. Based on self-reports, the sample was 39.9% non-Latino White, 21.7% Latino, 10.8% Asian American, 6.2% African American, 8.8% multiracial, 10.8% other, and 1.8% not reporting. The student population of the university is about 58% female and 42% male, with an average age of 23.7 years. The racial/ethnic make-up of the campus is: 30% non-Latino White, 29% Latino, 13% Asian American, 9% African American, <1% Native American, with the remainder (19%) of unknown ethnicity.

Procedure

Survey data were collected from all 25 sections of a laboratory course taught during a four-year period by a single instructor. Sections were spread across 11 Spring, Summer and Fall terms. Each section met one or two days a week for 100 or 50 minutes, respectively, during a given semester. Participants received 20 survey instruments, administered by the class instructor, as part of their laboratory requirements. Survey responses were anonymous. Up to three surveys were administered at each laboratory meeting. Because survey procedures were consistent for all 25 sections, data were combined across sections. Three survey instruments were used in the analyses.

Measures

Perceptions of Multicultural Campus Programming—The MAC-P (McClellan et al., 1996) was used to assess this construct. It captures important components of Allport's (1954) intergroup contact conditions, while specifying these conditions in ways that are more descriptive of a college or university environment. It contains 42 items comprising 6 subscales that assess perceptions of support and responsiveness to multicultural matters on campus (Institutional Responsiveness – IR; 11 items, $\alpha = .81$), the relationship between minority and majority students (Student Relations – SR; 7 items, $\alpha = .75$), recognition and acceptance of diverse individuals (Cultural Integration – CI; 9 items, $\alpha = .71$), accessibility of campus activities and organizations (Cultural Accessibility – CA; 7 items, $\alpha = .75$), attentiveness to minority students' needs (Cultural Sensitivity – CS; 4 items, $\alpha = .73$), and recognition of minority traditions and achievements on campus (Diversity Recognition – DR; 4 items, $\alpha = .68$). Each item is measured on a scale ranging from 1 (strongly disagree) to 5 (strongly agree). Sample items on this scale include “Students, faculty, and staff at my institution are exposed to the history and culture of minority groups” (MAC-P-IR) and “In general, the relationship between minority and majority students is harmonious” (MAC-P-SR). The reliabilities for each of the six MACP subscales were adequate (all alphas greater than .6). The input for our path model used the same six factors as had been derived by McClellan et al (1996). To assess the remaining constructs in the model, we used the same scales as in our prior work with adolescents, described below.

Ethnic Identity—Phinney's (1992) Multigroup Ethnic Identity Measure (MEIM) was used to assess students' level of ethnic identity. It asks respondents to identify their ethnicity by providing an ethnic label corresponding to their subjective group membership, followed by 20 items comprising Phinney's original four subscales: Ethnic Group Affirmation/Belonging, Ethnic Identity Exploration, Ethnic Behaviors, and Othergroup Orientation. (See below for a description of this fourth construct.) Participants responded to each item on a 4-point Likert scale, ranging from 1 (“Strongly Disagree”) to 4 (“Strongly Agree”). Individual ethnic identity scores consisted of a respondent's average across the 14 items ($\alpha = .90$) assessing aspects of ethnic identity.

Othergroup Orientation—Although it is included in the MEIM, Othergroup Orientation (OO) is a separate 6-item scale that assesses the extent to which one values and engages in positive interactions with members of ethnic groups other than one's own (called “outgroups” in social psychology). A sample item from the othergroup orientation scale is, “I like meeting and getting to know people from ethnic groups other than my own.” Individual othergroup orientation scores consisted of a respondent's average across the six items ($\alpha = .69$).

Acceptance of Diversity—The seven items from Ponterotto et al.'s (1995) 30-item Quick Discrimination Index (QDI; $\alpha = .73$) that comprise the subscale measuring “affective attitudes toward racial diversity related to one's personal life” were used. Each item was answered on a Likert-type scale ranging from 1 (“Strongly Disagree”) to 5 (“Strongly Agree”). A sample item from the scale is: “I feel I could develop an intimate relationship with someone from a different race.” Individual acceptance of diversity (AD) scores consisted of a respondent's average across the seven items.

Results

Tests of assumptions were performed using SPSS. After removing all univariate and multivariate outliers, the sample contained 434 cases. Less than 5% of the data on the four scales was missing. These values were imputed using estimation maximization (EM) in EQS

(Hu & Bentler, 1999). Bivariate correlations and descriptive statistics are shown in Table 1. For example, the table shows that the correlation between the Cultural Integration subscale of the MAC-P and Ethnic Identity is significant, both for the overall sample ($r = .20$, $p < .01$) as well as for the Latino subsample ($r = .23$, $p < .01$). Along the main diagonal, for example, the mean Ethnic Identity for Whites is 2.82 ($SD = .598$), while for Latinos it is 3.20 ($SD = .582$).

Relationships Among Ethnic Identity, Othergroup Orientation, and Acceptance of Diversity

The correlation between the two mediators was not significant and the strongest pairwise correlation between the mediators and the outcome was $r = .46$ (between othergroup orientation and acceptance of diversity, $p < .001$). To provide a test of the distinctiveness of the mediators and outcome in our model, we conducted a principal axis factor analysis with oblique rotation. Results showed that the items assessing ethnic identity, othergroup orientation and acceptance of diversity, respectively, had no complex loadings across factors and all factor loadings were moderate to strong. Furthermore, Molina, Wittig and Giang's (2004, pp. 259–260) factor analysis demonstrated the distinction between items assessing othergroup orientation and those assessing acceptance of diversity. Therefore we can be confident that these two scales assess different constructs.

Structural Equation Modeling

First, we tested the fit of the MAM as shown in Figure 1. Then, the reverse path model was tested and results were compared to the MAM. Finally, the better model was tested on the White and Latino subsamples separately. For all four analyses, EQS was used to test the measurement and structural relationships in the model by testing the fit of the model to the covariance matrix of the overall samples and the two ethnic subsamples, using the Comparative Fit Index (CFI) and Root Mean Square Error of Approximation (RMSEA) indices. A good model fit is indicated by a CFI value greater than .95, and RMSEA value less than .05 (Hu & Bentler, 1999).

Initial results for the MAM suggested a moderate fit between the MAM and the data (CFI of .942 and RMSEA of .079). A model modification index (i.e., the LaGrange multiplier test) suggested that we correlate four errors associated with the six MAC-P subscales (represented by the four double-headed arrows and their associated covariance estimates in Figure 2). The model was retested after the addition of each correlated error. The addition of these covariances resulted in significant improvement to the MAM, which fit the data very well (CFI of .981 and RMSEA of .050). For each of the relationships in the structural portion of the model, its significance was confirmed, its valence was consistent with hypotheses, and a (standardized) path coefficient was calculated. The lack of significance of the path coefficient between multicultural campus programming and acceptance of diversity, together with the four significant pair-wise path coefficients, signifies that the relationship between multicultural campus programming and acceptance of diversity is completely mediated by othergroup orientation and ethnic identity. Both mediators contribute significantly to explaining that relationship. However the mediated effect of othergroup orientation is positive, while that of ethnic identity is negative. Figure 2 displays the explained variances, as measured by R^2 , for each structural equation in the MAM. The total variance in acceptance of diversity accounted for by the three predictors is 24.5%.

We tested the reverse path model using the same procedure. Initial fit statistics suggested poor fit, CFI = .936 and RMSEA = .084. After examining results of the LaGrange multiplier test, three correlated errors of the multicultural campus programming indicators were added. The model was retested after each addition to the model. The addition of these covariances improved the fit of the model to the data (CFI of .971 and RMSEA of .060). However, these

statistics do not meet the threshold for a good model fit (Hu & Bentler, 1999). The total variance in multicultural campus programming accounted for by all three predictors is 3.4%. On every criterion (CFI, RMSEA and R^2) the MAM proved to be the superior model. Therefore, tests of direct and indirect effects are reported only for the MAM.

Direct Effects and Indirect Effects Accounted for by the MAM

All direct paths in the model were significant. That is, multicultural campus programming was shown to significantly predict both proposed mediating variables: for $\text{MAC-P} \rightarrow \text{OO}$, the standardized coefficient was .172, ($p < .05$) and for $\text{MAC-P} \rightarrow \text{EI}$, the standardized coefficient was .124, ($p < .05$). This test also showed that a) higher levels of othergroup orientation positively predict acceptance of diversity (standardized coefficient = .465, $p < .05$), and b) higher levels of ethnic identity negatively predicted acceptance of diversity (standardized coefficient = $-.176$, $p < .05$).

Subsequently, we decomposed the indirect paths in the model to determine the relative contribution of each mediator to explaining acceptance of diversity. Results showed that the $\text{MAC-P} \rightarrow \text{OO} \rightarrow \text{AOD}$ relationship accounted for 21.1% of the variance and that the $\text{MAC-P} \rightarrow \text{EI} \rightarrow \text{AOD}$ relationship accounted for 3.1% of the variance. This combination of tests revealed that positive perceptions of campus multicultural programming predict higher levels of racial/ethnic acceptance of diversity, primarily through the positive influence of othergroup orientation and, to a lesser extent, through the negative influence of ethnic identity. Next, we tested the applicability of the MAM to the White and Latino subsamples, the two largest ethnic subgroups in our data.

White Subsample

The White subsample consisted of 173 students (129 female; 43 male; 1 undisclosed) who represented 39.9% of the entire sample. Results (shown in Figure 3) suggested a moderate fit between the model and the data (CFI of .932 and RMSEA of .088). Based on the LaGrange multiplier test, we correlated four errors associated with the six MAC-P subscales. The model was retested after the addition of each correlated error. As a result, the model was significantly improved and fit the data very well (CFI of .984 and RMSEA of .047). The lack of significance of the path coefficient between multicultural campus programming and acceptance of diversity, together with the four significant pair-wise path coefficients, signify that the relationship between multicultural campus programming and acceptance of diversity is completely mediated by othergroup orientation and ethnic identity, which each contribute significantly to explaining that relationship.

Figure 3 displays the explained variances, as measured by R^2 , for each structural equation. Following a test of the full model, multicultural campus programming was shown to significantly predict both acculturation-related variables: for $\text{MAC-P} \rightarrow \text{OO}$, the standardized coefficient was .171, ($p < .05$) and for $\text{MAC-P} \rightarrow \text{EI}$, the standardized coefficient was .163, ($p < .05$). This test also showed that a) higher levels of othergroup orientation positively predicted acceptance of diversity (standardized coefficient = .498, $p < .05$), and b) higher levels of ethnic identity negatively predicted acceptance of diversity (standardized coefficient = $-.200$, $p < .05$). The total variance in acceptance of diversity accounted for by all three predictors is 28.1%.

Next, we tested the extent to which othergroup orientation and ethnic identity, respectively, mediate the relationship between multicultural campus programming and acceptance of diversity. Results paralleled those obtained for the entire sample and showed that the $\text{MAC-P} \rightarrow \text{OO} \rightarrow \text{AOD}$ indirect relationship accounted for 22.3% of the variance and that the $\text{MAC-P} \rightarrow \text{EI} \rightarrow \text{AOD}$ indirect relationship accounted for 2.0% of the variance. These

statistics show that, although both othergroup orientation and ethnic identity significantly contribute to explaining the relationship between multicultural campus programming and acceptance of diversity, othergroup orientation is much more important. Taken together, results for the White subsample showed that positive perceptions of campus multicultural programming predict higher levels of racial/ethnic acceptance of diversity, primarily through the positive influence of othergroup orientation and, to a much lesser extent, through the negative influence of ethnic identity.

Latino Subsample

The Latino subsample consisted of 94 students (73 female; 20 male; 1 undisclosed) who represented 21.7% of the larger sample. Results of model testing are shown in Figure 4. There was a good fit between the model and the data (CFI of .976 and RMSEA of .053). Results of the LaGrange multiplier test suggested that we correlate one pair of errors associated with the six MAC-P subscales. After the addition of this correlated error, significant improvement to the model was obtained (CFI of .995 and RMSEA of .024). In contrast to the results obtained with the full sample and the White subsample, the MAC-P → AOD relationship was not significant. As was found for the Whites, both othergroup orientation and ethnic identity predicted acceptance of diversity among Latinos. The total variance in acceptance of diversity accounted for by the model for Latinos is 24.0%.

Figure 4 also displays the explained variances, as measured by R^2 , for each structural equation. Although multicultural campus programming does not significantly predict either othergroup orientation or ethnic identity, higher levels of othergroup orientation positively predict acceptance of diversity (standardized coefficient = .428, $p < .05$), and higher levels of ethnic identity negatively predicted acceptance of diversity (standardized coefficient = $-.232$, $p < .05$). Effects decomposition showed that the relative contributions of othergroup orientation and ethnic identity were similar to those obtained with the overall sample and White subsample. Specifically, the othergroup orientation accounted for 17.8% of the variance and ethnic identity accounted for 5.0% of the variance in acceptance of diversity. In summary, results for the Latino students showed that othergroup orientation and ethnic identity are important predictors of acceptance of diversity (albeit in opposite directions), with othergroup orientation being more important, while multicultural campus programming does not predict such acceptance.

Discussion

Model Fit

Our results demonstrate the utility of using constructs derived from Berry, Trimble and Olmedo's (1986) acculturation theory to explain college students' responsiveness to institutional-level programs designed to improve relations among diverse racial/ethnic groups on a multiracial campus. Specifically, we showed that college students' perceptions of their campus' multicultural campus programming, along with their willingness to engage in cross-racial/ethnic interactions and their ethnic identity, explain about 25% of the variance in acceptance of diversity. This is about the same as has been found, on average, with middle- and high school students. Furthermore, the direction of relationships proposed in the Mutual Acculturation Model provided a better fit to the data than a model with the reverse order of relationships among model constructs.

A comparison of results for the White and Latino subsamples suggests that the role of multicultural campus programming differs somewhat for these two groups. For the Whites, its influence is indirect. That is, the evidence suggests that campus programming increases acceptance of diversity among White students by encouraging their interactions with diverse

others. Our results also suggest a countervailing influence, whereby such programming increases White students' ethnic identity, which in turn, tends to reduce their acceptance of diversity. Nevertheless, the overall outcome of these two influences is a net improvement in attitude toward diverse others. Prior research suggests that some aspects of multiculturalism and forms of ethnic identity can serve to justify negative intergroup attitudes (Verkuyten, 2008), so that the existence and relative strength of countervailing influence depend on the context.

For the Latino subsample, we found no direct or indirect relationship between perceptions of overall multicultural campus programming and acceptance of diversity. However, the relative strengths and valences of the relationships between each of the two acculturation-related variables (othergroup orientation and ethnic identity) and acceptance of diversity are the same as we found for the Whites. The lack of relationship between overall multicultural campus programming and ethnic identity among the Latinos may be related to their substantially higher ethnic identity, compared to the Whites ($p < .001$). Similarly, the lack of relationship between overall multicultural campus programming and othergroup orientation among the Latino college students may be related to the fact that Latino adolescents already have more ethnically-diverse friendships than their White counterparts (e.g., Forman & Ebert, 2004). The moderating role of ethnicity suggests that the distinctive cultures and experiences of Whites and Latinos (as well, perhaps, of Asian-Americans and African-Americans) need to be taken into account when designing multicultural campus programming. For example, since the friendships of White adolescents are less ethnically-diverse, they may arrive in college with greater anxiety and feelings of threat about interacting with diverse others.

Strengths and Limitations

The model we tested in the present study was originally developed and tested on middle- and high school students using a measure of school interracial/ethnic climate (Green, Adams & Turner, 1988) designed to capture the essential elements of secondary school settings. For our test of the generalizability of the model, we used a measure of interracial/ethnic climate (the MAC-P scale) that was developed specifically for college campuses. Its relatively large number of items is appropriate to measuring the complexity of college campus programming.

The final models for the overall sample, the White subsample and the Latino subsample were excellent fits to their respective data and accounted for about the same percentage of variance in intergroup acceptance of diversity as has been found in tests of the Mutual Acculturation Model with middle- and high school students. These findings support the utility of the model at all three levels of education (middle school, high school and college).

A limitation of the present study is that the college students were psychology majors taking an optional personality course at a U.S. comprehensive university and over 75% were female. To the extent that these college students differ from the overall U.S. college student population, the generalizability of our results is limited. Furthermore, establishing the causal sequence of the relationships in our model would be enhanced with longitudinal data. Finally, behavioral assessments of quantity and quality of interracial/ethnic interactions would be superior to the self-reports of attitudes toward such interactions that we used.

Future Research Directions

To our knowledge, we are the first to report results using McClellan et al.'s MAC-P scale since the scale was validated on a sample of students at a predominately White campus in 1996. We showed that the six subscales derived in that validation study have acceptable

inter-item reliabilities for our multiracial college sample, suggesting that the MAC-P is useful for measuring campus climate in racially-diverse college settings. Nevertheless, future research on other campuses should test the invariance of the factor structure of the MAC-P directly. If a different factor structure is shown to be superior to the original obtained by McClellan et al, using that structure in future model testing may result in even better overall results (e.g., a model that accounts for an even larger amount of variance in acceptance of diversity). In the present study, all six of the MAC-P subscales contributed to the model fit. Future research should examine the relative importance of each of the six aspects of campus programming for predicting acceptance of diversity.

The current report is also the first to show that the relationships in the mutual acculturation model are moderated by ethnicity of the respondents. Specifically, for the White students, perceptions of the campus climate predicted acceptance of diversity (indirectly, through the two acculturation-related constructs), while such perceptions did not predict the Latino students' acceptance of diversity. Future research should test whether this difference extends to other racial/ethnic minorities, is found on other college campuses with highly diverse student populations and generalizes to campuses on which racial/ethnic minorities are a small proportion of the campus student population.

Practical Implications

Due to residential segregation in many U.S. neighborhoods, a large percentage of U.S. college students are likely to have attended relatively racially-segregated high schools. Juvonen, Nishina and Graham (2006) showed that the racial composition of the secondary school environment influences intergroup feelings. Specifically, when the population in a middle- or high school is racially homogeneous, the students report feeling more threat and less personal safety than when their school is racially-diverse and balanced. To the extent that first year college students of all racial/ethnic backgrounds have not attended high schools with racially-diverse and balanced student populations, they may harbor feelings of threat and anxiety about interacting with racial/ethnic outgroups, which they may transfer to the college environment.

Sidanius, Van Laar, Levin and Sinclair's (2004) longitudinal research with college students on a large selective Southern California public university campus suggests that the negative consequences of limited social interactions with racial/ethnic outgroups are greater for White students than for their racial/ethnic minority counterparts. In particular, they showed that, for White students, belonging to a sorority or fraternity that is racially-homogeneous is associated with decreased willingness to engage in close cross-racial social interactions and friendships. This was not true for minority students (for whom such groups provide a more benign social support system). Such ethnic group differences in the consequences of similar experiences need to be taken into account by those who design multicultural college campus programming.

Taken together, the results of our model-testing on the overall sample, as well as for the Whites and Latinos separately, suggest that interventions to improve relations among students on multiethnic college campuses should focus on encouraging cross-cutting racial/ethnic social interactions. Promoting inclusiveness and diversity in student social networks, campus activities and living arrangements are likely to maximize acceptance of diverse others and be widely beneficial to all racial/ethnic groups. These efforts should include interventions that target newly-arrived students' tendencies to be wary of cross-racial peer interactions. For example, informal educational experiences in social settings (e.g., small, racially-diverse freshman discussion groups that meet during meals in campus dining halls) and interracial/ethnic social arrangements (e.g., freshman year room-mate assignments) are likely to reduce students' anxiety, increase opportunities for cross-racial friendships and

promote acceptance of diversity (Shook & Fazio, 2008). Those students who already have a strong predisposition to interacting with members of ethnocultural groups other than their own, or have had successful experience in doing so, could serve as peer discussion leaders, residence hall assistants and peer mentors. In brief, the results from our college student sample, along with prior research on the Mutual Acculturation Model with middle- and high school students, show that fostering cross-group interactions that counter students' discomfort and anxiety in multicultural educational settings, is likely to be successful in promoting acceptance of diversity.

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Figure 1.
Theoretical Representation of the Mutual Acculturation Model (MAM).

Figure 2.
Full sample (n = 434) MAM with standardized coefficients and standard errors.

Figure 3.
White subsample (n = 173) MAM with standardized coefficients and standard errors.

Figure 4.
Latino subsample (n = 94) MAM with standardized coefficients and standard errors.

Table 1

Summary of Intercorrelations, Means, and Standard Deviations for Measured Variables by Ethnic Group

Measure	1	2	3	4	5	6	7	8	9
1. IR	3.53 (.502)								
IR (W)	3.59 (.497)								
IR (L)	3.46 (.577)								
2. SR	.42**	3.65 (.601)							
SR (W)	.38**	3.70 (.609)							
SR (L)	.48**	3.63 (.585)							
3. CI	.54**	.41**	3.67 (.444)						
CI (W)	.56**	.39**	3.62 (.445)						
CI (L)	.63**	.46**	3.76 (.482)						
4. CA	.57**	.50**	.59**	3.75 (.521)					
CA (W)	.60**	.47**	.61**	3.76 (.516)					
CA (L)	.63**	.56**	.60**	3.78 (.535)					
5. CS	.67**	.35**	.48**	.57**	3.57 (.565)				
CS (W)	.71**	.30**	.52**	.55**	3.59 (.576)				
CS (L)	.68**	.48**	.51**	.65**	3.58 (.647)				
6. DR	.51**	.31**	.42**	.47**	.53**	3.54 (.619)			
DR (W)	.60**	.32**	.47**	.48**	.65**	3.61 (.593)			
DR (L)	.45**	.28**	.35**	.50**	.41**	3.49 (.641)			
7. EI	.10*	-.01	.20**	.05	.05	.06	3.01 (.586)		
EI (W)	.14	-.01	.08	.06	.09	.12	2.82 (.598)		
EI (L)	.08	-.16	.23**	-.01	.01	.02	3.20 (.582)		
8. OO	.11*	.06	.20**	.12**	.04	.04	.05	3.58 (.404)	
OO (W)	.17*	.04	.21**	.13	.01	.06	.16*	3.59 (.431)	
OO (L)	.09	.08	.10	.06	.12	.12	.05	3.61 (.354)	
9. AD	.02	.01	.14**	.04	.01	.01	-.15**	.46**	3.91 (.618)

Measure	1	2	3	4	5	6	7	8	9
AD (W)	.01	-.06	.12	-.01	-.05	.01	-.12	.47**	3.86 (.621)
AD (L)	.01	.06	-.01	.10	.04	.08	-.21*	.42**	4.00 (.510)

Note: Intercorrelations for all participants, Latino participants (L), and White participants (W) are presented below the diagonal. Means and standard deviations of measured variables are presented in the main diagonal. IR = Institutional Responsiveness; SR = Student Relations, CI = Cultural Integration; CA = Cultural Accessibility; CS = Cultural Sensitivity; DR = Diversity Recognition; EI = Ethnic Identity; OO = Othergroup Orientation; AD = Acceptance of Diversity.

* $p < .05$,
** $p < .0$