

Effects of Perceived Attitudinal and Demographic Similarity on Protégés' Support and Satisfaction Gained From Their Mentoring Relationships

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The purpose of this study was to examine how perceived attitudinal similarity (measured as similarity in general outlook, values, and problem-solving approach) and demographic similarity operationalized as similarity in race and gender, affected protégés' support and satisfaction from their informal mentoring relationships. Scandura and Katerberg's (1988) 3-factor scale of mentor functions was used to measure vocational, psychosocial, and role-modeling support. Participants were 144 protégés from diverse backgrounds (54% female; 54% non-White). Perceived attitudinal similarity was a better predictor of protégés' satisfaction with and support received from their mentors than was demographic similarity.

It is widely recognized that employees and their organizations reap many benefits from mentoring. Protégés report greater career satisfaction (Fagenson, 1989), faster rates of promotion (Scandura, 1992), and higher compensation than do those employees without mentors (Chao, Walz, & Gardner, 1992; Dreher & Cox, 1996). The positive aspects of mentoring accrue to the organization as well, since mentoring can relate to lower turnover intentions (Laband & Lantz, 1995; Viator & Scandura, 1991), better organizational socialization (Chao, 1997; Ostroff & Kozlowski, 1993), and greater organizational citizenship behavior and commitment (Donaldson, Ensher, & Grant-Vallone, 2000).

Traditionally, a *mentor* has been defined as someone senior in age and experience, and who provides guidance and upward mobility to his or her protégés (Hunt & Michael, 1983; Ragins, 1989). More recent authors have suggested that protégés rely on varied sources of support and different types of mentors throughout their careers (Burlew, 1991; Eby, 1997; Thomas, 1990). One useful typology for representing the spectrum of mentoring relationships is a three-category

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classification system that includes: (a) the *traditional mentor* (an individual who is much more experienced and further ahead in his or her career than the protégé), (b) the *step-ahead mentor* (an individual who is a little more experienced and may be one level above the protégé), and (c) the *peer mentor* (someone at the same level as the protégé; Darling, 1986).

Different types of mentors can provide similar types of support functions to their protégés, albeit in varying degrees (Allan, Russell, & Maetzke, 1997; Darling, 1986; Ensher, Thomas, & Murphy, 2001; Kram & Isabella, 1985). For example, Ensher et al. found that while peer mentors were less effective at providing role modeling than were traditional mentors, they provided an equivalent amount of psychosocial support to protégés in informal mentoring relationships. In summary, it is important to consider and control for a diverse array of mentoring relationships, as we do in this study, since they can have differential impacts on the quality of the relationship.

Mentoring researchers have identified three major categories of support that mentors provide to protégés. Vocational or instrumental support enhances the career of the protégé by providing sponsorship, visibility, protection, and challenging assignments (Gibb & Megginson, 1993; Kram, 1985; Noe, 1988). In contrast, psychosocial (also known as social) support includes activities such as counseling, friendship, and acceptance (Kram, 1985; Scandura, 1992). Many times, mentors also function as role models to their protégés (Scandura, 1992). Role modeling occurs when the mentor demonstrates appropriate behavior for the protégé, such as giving critical feedback in a constructive manner. Thus, a mentor can be defined as an individual with greater or equal career experience than his or her protégé and who can provide vocational, psychosocial, or role-modeling support.

The relationship between dyadic pairs, such as protégés and their mentors, might be influenced by a number of factors, including the type of mentoring relationships (Burlew, 1991; Eby, 1997), demographic characteristics (Blake, 1995; Cox & Nkomo, 1991; Dreher & Cox, 1996), and perceived attitudinal similarity (Liden, Wayne, & Stilwell, 1993). Although research has supported these findings independently, few studies have addressed these concepts concurrently. Indeed, Ragins (1997b) noted that there has been a dearth of research exploring the demographic composition of the mentoring relationship, or the effects of demographic similarity or dissimilarity on mentor functions.

The purpose of the present study is to examine how issues of demographic similarity (e.g., gender, race) and attitudinal similarity affect protégés' perceptions of mentor support and mentor satisfaction received from their informal mentoring relationships. In addition, an integrated theoretical framework is applied to better understand mentoring and to develop hypotheses for this study. This framework is drawn from leader-member exchange theory (Graen & Uhl-Bien, 1995; Liden et al., 1993) and the relational demography approach

(Tsui & O'Reilly, 1989) that is based on the similarity–attraction paradigm (Byrne, 1971).

Leader–Member Exchange Theory

Leader–member exchange theory (Graen & Scandura, 1987; Graen & Uhl-Bien, 1995) suggests that leaders differentiate among subordinates in their work group. Leaders treat some of their subordinates as in-group members who are privy to high-quality exchanges resulting in many positive career benefits. Other members are treated as out-group members and thus have reduced career outcomes. The relationship between leader and member is seen as a social exchange or negotiated transaction. High-quality exchanges between leaders and members have been linked empirically to job performance and career progress, job satisfaction, organizational commitment, and retention (Graen, Wakabayashi, Graen, & Graen, 1990; Liden & Graen, 1980; Major, Kozlowski, Chao, & Gardner, 1995; Settoon, Bennet, & Liden, 1996). Similarly, Ensher (1997) suggested that mentoring, with its emphasis on reciprocity and continuous evaluation of costs and benefits, also represents a type of social exchange. Many of the same positive outcomes of high-quality relationships between managers and employees are seen in high-quality mentor–protégé relationships as well.

Managing and mentoring are similar in that both are dyadic, work-based relationships that involve exchange and a desire for positive, career-related outcomes. Of course, mentoring and managing are not equivalent functions and are different in a number of ways. Managers can rely on the intrinsic authority of their position as well as their ability to reward or punish employees, whereas mentors must rely on their charisma or ability to wield information or expertise to influence protégés (Bell, 1996). However, authors have recently found that mentoring processes and the dynamics of leader–member exchanges are complementary (Scandura & Schriesheim, 1994; Thibodeaux & Lowe, 1996). For example, Scandura and Schriesheim found that leaders who had high-quality exchanges with their subordinates provided vocational mentoring to them. Mentoring researchers have suggested that approaches and theories used to study leadership, such as leader–member exchange theory (LMX) might increase our understanding of mentoring (Murphy & Ensher, 1997; Scandura & Schriesheim, 1994; Thibodeaux & Lowe, 1996).

Relational Demography

Both mentoring and LMX researchers have questioned what affects the quality of the exchange between individuals. Relational demography, based conceptually on the similarity–attraction paradigm, provides an answer. The similarity–attraction paradigm suggests that individuals who perceive themselves to be

similar are more attracted to each other than are those who see themselves as dissimilar (Berscheid & Walster, 1969; Byrne, 1961, 1971; Grant, 1993; Harrison, 1976). The positive relationship between similarity and attraction has been found between friendship pairs (Werner & Parmelee, 1979), attraction in groups (Newcomb, 1961), and more recently among supervisors and subordinates (Liden et al., 1993; Turban & Jones, 1988). An important aspect of similarity is similarity in immutable characteristics, such as race and gender. Relational demography is an approach that compares the demographic characteristics (i.e., race and gender) of members of dyads, such as supervisors and subordinates (Tsui & O'Reilly, 1989).

Tsui, Xin, and Egan (1994) suggested that relational demography is the "missing link" (p. 1) in the LMX model as it offers an explanation for why leaders differentiate among their employees, based in part on their shared demographic characteristics. Tsui and her colleagues suggested that the composition of the dyad, in terms of demographic similarity, extends our knowledge of how demography affects relationship processes and outcomes, above and beyond simple demographics. The field of leadership has evolved from merely examining main effects between different types of leaders based on demography, but also examines the interaction effects of demography between leaders and members.

Research on demographic characteristics between dyadic pairs has shown that likenesses between individuals in relationships can influence attitudes toward and outcomes of their relationships. For example, Tsui and O'Reilly (1989) used a relational demography approach among a field study of 272 supervisor-subordinate dyads. They found that demographic similarity among pairs was associated with higher effectiveness as perceived by subordinates and more attraction on the part of superiors for subordinates. Specifically, they found that subordinates in same-gender dyads were rated as performing more effectively and were liked more than were the subordinates in cross-gender dyads. In addition, subordinates in cross-gender dyads also reported higher levels of role ambiguity and conflict. In a more recent study using relational demography among supervisor-subordinate dyads in Taiwan, Farh, Tsui, and Cheng (1995) found that demographic similarity between supervisors and subordinates positively affected supervisors' perceptions of their subordinates' performance. Green, Anderson, and Shivers (1996) found that gender differences between leaders and subordinates had an adverse effect on LMX quality as well.

The relational demography approach can be used also to examine mentoring relationships. Ragins (1997a) suggested that the degree to which mentors and protégés relate to and feel comfortable with each other is affected by their demographic similarity. For example, researchers have found that female protégés with female mentors were significantly more likely to engage in social activities with their mentors than were those protégés with male mentors (Ragins & Cotton, 1999; Ragins & McFarlin, 1990) and reported more role modeling (Ragins &

McFarlin, 1990). Similarly, Gaskill (1991) found that mentors paired with same-gender protégés provided significantly more psychosocial support than did those with cross-gender protégés. In contrast, Struthers (1995) examined only overall differences between male and female mentors, without accounting for the composition of the dyad, and found no differences on how much psychosocial support mentors provided to their protégés. In summary, it is important to examine not only global differences between male and female mentors on support offered to their protégés, but also how the demographic composition of the mentor–protégé dyad affects support as well.

Studies in mentoring have indicated that similarity in race is another aspect of demography that might affect the type of support that protégés receive from their mentors. Thomas (1990) examined how demographic similarity between mentors and protégés affected the degree of support that protégés obtained from their mentors among 88 Black and 107 White managers in spontaneously developed relationships at a large public-utility company. Thomas found that same-race relationships provided significantly more psychosocial support than did cross-race relationships among professional employees. In a study conducted among high school interns and their mentors in a formal mentoring program, Ensher and Murphy (1997) found that same-race relationships resulted in greater liking and more vocational support than did cross-race relationships.

Perceived Attitudinal Similarity

While demographic characteristics and similarity between mentoring pairs is important, other research on dyadic relationships has suggested that it is important to consider perceived attitudinal similarity as well. Turban and Jones (1988) examined the effects of both demographic and perceived attitudinal similarity on manager–employee dyads in a health care facility. They found that demographic similarity was important in predicting subordinate performance, but not job satisfaction or pay recommendations. Perceived attitudinal similarity, however, predicted both job satisfaction and pay ratings among subordinates. These authors concluded that perceived attitudinal, rather than demographic, similarity was more important in predicting subordinates' outcomes. In another study among manager–employee dyads, Liden, Wayne, and Stilwell (1993) found that perceived attitudinal similarity affected leader–member exchanges, while shared demographic characteristics had no effect. A recent study by Nielson, Pate, and Eisenbach (2000) examined the critical factors of productive mentoring relationships and found that similarity in values and attitudes was a better predictor of relationship quality (trust, control, and satisfaction) than was demographic similarity. In summary, it seems likely that both demographic and perceived attitudinal similarity are related to aspects of mentoring, and the following hypotheses are suggested.

Hypothesis 1. Similarity in race and gender in a mentor–protégé dyad will be positively associated with the support (vocational, psychosocial, role modeling) that protégés receive from their mentors, after controlling for type of mentor and mentors' and protégés' gender and race.

Hypothesis 2. Perceived attitudinal similarity will be positively associated with the support (vocational, psychosocial, role modeling) that protégés receive from their mentors, after controlling for type of mentor, mentors' and protégés' gender and race, and demographic similarity.

Hypothesis 3. Similarity in race and gender in a mentor–protégé dyad will be positively associated with protégés' satisfaction with their mentors, after controlling for type of mentor and mentors' and protégés' race and gender.

Hypothesis 4. Perceived attitudinal similarity will be positively associated with protégés' satisfaction with their mentors, after controlling for type of mentor, mentors' and protégés' race and gender, and demographic similarity.

The mixed findings regarding the relative importance of demographic and perceived attitudinal similarity suggest that both types of similarity are important, and perhaps are not mutually exclusive. In fact, it may be that demographic similarity is related to and perhaps works through perceived attitudinal similarity to affect protégé outcomes. One study of 111 pairs of subordinates and supervisors found that supervisors perceived themselves to be more similar to subordinates whose demographic profiles were similar to themselves (Wayne & Liden, 1995). In this study, demographic similarity worked through perceived attitudinal similarity to affect supervisors' ratings of their subordinates' performance. Similarly, Graves and Powell (1995) examined the effect of gender similarity on recruiters' evaluations of job applicants. These authors found that perceived attitudinal similarity mediated the relationship between gender similarity of applicants and recruiters to affect recruiters' assessments of applicants. In this study, we extend the findings from related dyadic research and the following hypothesis is suggested:

Hypothesis 5. Perceived attitudinal similarity will mediate the relationship between demographic similarity (race and gender) on mentoring support and satisfaction.

In summary, there are a number of unique contributions of this study. First, we borrow from the field of leadership, particularly research related to LMX

theory and the relational demography approach, to better understand mentoring theoretically. Second, we expand the mentoring literature by examining the importance of perceived attitudinal similarity among spontaneously developed mentoring pairs. Third, we explore whether demographic similarity works through perceived attitudinal similarity to affect protégés' satisfaction and degree of support received from their mentors.

Method

Participants

A total of 144 protégés who had formerly participated in the same series of professional and management development classes from a West coast newspaper organization and a school district in a major metropolitan area participated in this study. Sample participants from the two organizations were similar demographically in terms of age, race, and education and had similar administrative and managerial job duties. Furthermore, the comparability of the samples from the two organizations was tested with a discriminant analysis on the dependent variables of mentor support (vocational, psychosocial, and role modeling) and satisfaction, as well as on the independent variables of racial similarity, gender similarity, and perceived attitudinal similarity. There was no indication of a meaningful difference between the two samples on these variables, $\chi^2(7, N = 144) = 5.97, p = .55, ns$. In addition, we also examined whether there were differences between the samples from the two organizations on the control variables of protégé race, gender, and type of mentoring relationship. There were differences between the two organizations on protégé gender, $\chi^2(1, N = 144) = 16.27, p < .001$, as there were more women than men in the school district in this sample and in the overall organization, as compared to the media organization. However, there were no differences between the two organizations on protégé race, $\chi^2(4, N = 144) = 6.69, p = .15, ns$; or type of mentoring relationship, $\chi^2(2, N = 144) = 3.54, p = .17, ns$. Based on these results, data were pooled from the two organizations.

Demographic Information for Protégés

Gender composition of the sample was 46% ($N = 66$) male and 54% ($N = 78$) female. For ethnicity, 12% ($N = 17$) were Asian, 18% ($N = 26$) were Black, 17% ($N = 25$) were Hispanic, 47% ($N = 68$) were White, and 6% ($N = 8$) designated themselves as "other." In terms of age, the majority (55.0%, $N = 79$) were under 40 years old, 30.5% ($N = 44$) were between 41 and 50 years, and 14.5% ($N = 21$) were over 51 years of age. The protégés in this study were generally well educated, as 42.4% ($N = 61$) had graduated from college or completed a graduate

degree, 53.4% ($N = 77$) had completed some college or earned a 2-year associate degree, and 4.2% ($N = 6$) had completed some high school or had a high school degree. For organizational level, 44.4% ($N = 64$) reported that they were hourly employees; 35.4% ($N = 51$) indicated that they were salaried, nonmanagerial employees; 15.2% ($N = 22$) were first-line supervisors or managers; and 5% ($N = 7$) did not report their organizational level.

Demographic Information Regarding Mentor–Protégé Pairs

Most of the protégés had experienced a fairly long-term relationship with their mentors, as 11.8% ($N = 17$) had been with their mentors for less than 1 year, 25.6% ($N = 37$) for 1 to 2 years, 32.6% ($N = 47$) for 2 to 4 years, 11.1% ($N = 16$) for 5 to 7 years, and 18.9% ($N = 27$) for 7 or more years. Approximately 52% ($N = 75$) of the protégés defined their most influential mentor as traditional, 32% ($N = 46$) as step-ahead, and 16% ($N = 23$) as peer.

For gender composition, 61.8% ($N = 89$) were same-gender mentor–protégé pairs, and 38.2% ($N = 55$) were cross-gender pairs. More specifically, the composition of the mentor–protégé pairs by gender was equivalent for male-mentor/male-protégé pairs (31.3%, $N = 45$) and female mentor/female protégé pairs (31.3%, $N = 45$). In addition, 23.6% ($N = 34$) of the pairs were male mentor/female protégé, while 13.8% ($N = 20$) of pairs were female-mentor/male-protégé. For race, 51% ($N = 73$) were same-race mentor–protégé pairs and 49% ($N = 71$) were cross-race pairs. More specifically, for same-race pairings, the breakdown is as follows: Asian mentor/Asian protégé, 5% ($N = 7$); Black mentor/Black protégé, 9% ($N = 13$); Hispanic mentor/Hispanic protégé, 5% ($N = 7$); and White mentor/White protégé, 32% ($N = 46$). Since White mentors represented the largest group overall, the following is some information about cross-race pairings: White mentor/Asian protégé, 5% ($N = 7$); (b) White mentor/Black protégé, 6% ($N = 9$); and White mentor/Hispanic protégé, 8% ($N = 12$). The remaining 30% ($N = 43$) reflected a mixture of Asian, Black, and Hispanic mentors paired with protégés of various ethnicities, and there was not a large number of any one of these pairings.

Procedure

Data were collected from protégés through written questionnaires sent to their offices through the United States mail. A second letter was sent to protégés 2 weeks after the initial mailing, followed 2 weeks later by a postcard to remind protégés, to complete their surveys, consistent with Dillman's (1978) recommended procedures. A total of 396 surveys were mailed out, and 202 responses were returned (response rate = 51%). Of those surveys, 144 respondents indicated that they were in an informal mentoring relationship. All survey questions were closed-

ended responses. Participants' responses were anonymous and were returned via pre-paid envelopes to the Leadership Institute of a sponsoring university.

Predictor Variables

Perceived attitudinal similarity. For perceived attitudinal similarity, two items developed by Turban and Jones (1988) to measure supervisor-subordinate similarity were reworded to reflect a mentor-protégé dyad. These items are, "My mentor and I see things in much the same way," and "My mentor is similar to me in terms of our general outlook and perspective." Liden et al. (1993) developed three additional items to measure supervisor-subordinate similarity were adapted for protégés. These items are, "My mentor and I are alike in a number of areas," "My mentor and I thought alike in terms of coming up with a similar solution for a problem," and "My mentor and I analyzed problems in a similar way." To include information about values and general similarity, three additional items were developed. These items are, "My mentor and I have similar values about work," "My mentor and I have similar values about life in general," and "My mentor and I are more similar than dissimilar in important ways." Items for each of these measures were rated on a 5-point scale ranging from 1 (*strongly disagree*) to 5 (*strongly agree*). These eight items were summed to form a composite with a Cronbach's alpha of .84.

Racial similarity. A measure of racial similarity between mentors and protégés was created using the racial designations indicated by protégés for themselves and their mentors. There were two levels created for this variable: same race or cross-race. All protégés whose race/ethnicity matched with their mentors were coded as 1 (*same race*), while those that differed from their mentors were coded as 2 (*cross-race*).

Gender similarity. A measure of gender similarity between mentors and protégés was created using the gender designations indicated by protégés for themselves and their mentors. There were two levels created for this variable: same gender or cross-gender. All protégés whose genders matched with their mentors were coded as 1 (*same gender*), while those that differed from their mentors were coded as 2 (*cross-gender*).

Dependent Variables

Mentor support. Scandura and Katerberg's (1988) 18-item Mentor Functions Questionnaire (MFQ) was used to measure three types of mentor support. The MFQ consists of three factors (see Scandura, 1992, and Scandura & Schreisheim, 1991, for information on the validity of the three-factor solution). The first factor contains eight items on vocational support (also known as coaching) and includes such items as, "My mentor has taken a personal interest in my career." The second factor, role modeling, contains seven items such as, "I try to model my behavior

after my mentor.” The third factor, psychosocial support, contains three items such as, “I have shared personal problems with my mentor.” Items were rated on a 5-point scale ranging from 1 (*strongly disagree*) to 5 (*strongly agree*). Each of the three scales had sound reliability, with Cronbach’s alphas ranging from .72 to .91 in this study and in previous research (Scandura, 1992; Scandura & Katerberg, 1988). The overall reliability for the entire scale was .89.

Satisfaction with mentor. A three-item scale was used to measure protégés’ satisfaction with their mentors. A sample item is, “I am very satisfied with my mentor.” These three items were rated on a 5-point scale ranging from 1 (*strongly disagree*) to 5 (*strongly agree*) and were summed to form a composite with an alpha of .91.

Control Variables

Type of mentor. Participants were asked to categorize their most influential mentor into one of three categories (Darling, 1986) and were instructed to respond to all questionnaire items bearing in mind their most influential mentor. These categories were coded as follows: a peer mentor (rated as 1) is “someone at the same level (i.e., a coworker) who provides support”; a step-ahead mentor (rated as 2) is “someone who is a little more experienced and only one or two levels above in his or her career”; and a traditional mentor (rated as 3) is “someone who is much more experienced and further ahead in his or her career than the protégé.” In order to perform regression analyses, these items were dummy coded into two new variables, peer and traditional mentors, with step-ahead mentors as the referent group (Cohen & Cohen, 1983).

Mentors’ and protégés’ race. Protégés were asked to designate their own and their mentor’s race/ethnicity into one of five categories (Asian, Black, Caucasian, Hispanic, or other). Because of the categorical nature of the variables, these were also dummy coded with Caucasian as the referent group.

Mentors’ and protégés’ gender. Protégés were asked to indicate their gender for themselves and their mentor as male or female.

Results

An examination of the data determined that it met the assumptions necessary for hierarchical multiple regression, including normality, linearity, singularity, and multicollinearity (Tabachnick & Fidell, 1989). Descriptive statistics including means, standard deviations, and zero-order correlations are displayed in Table 1.

Similarity and Mentor Support

Hypothesis 1 predicted that similarity in race and gender would be positively associated with the degree of mentor support that protégés receive from their

Table 1

Means, Standard Deviations, and Zero-Order Correlations for Mentor

Variable	<i>M</i>	<i>SD</i>	1	2	3	4	5	6
1. Vocational	3.74	0.84	—					
2. Psycho-social	3.63	0.87	.27**	—				
3. Role modeling	4.04	0.70	.56***	.22**	—			
4. Mentor satisfaction	4.34	0.72	.57***	.32***	.63***	—		
5. Perceived attitudinal similarity	3.89	0.55	.39***	.47***	.41***	.35***	—	
6. Racial similarity	1.49	0.50	-.11	-.12	-.04	-.02	.18*	—
7. Gender similarity	1.38	0.49	.15	.11	.10	.08	-.06	.05

Note. $N = 144$.* $p < .05$. ** $p < .01$. *** $p < .001$.

mentors. To test this hypothesis for each specific type of mentor support (vocational, psychosocial, and role modeling), three separate hierarchical multiple regression analyses were performed. For all regression analyses, the control variables were entered at Step 1. These control variables included type of mentor, ethnicity of protégé and mentor, and gender of protégé and mentor. Type of mentor was dummy coded as peer mentor and traditional mentor and was entered at Step 1. Similarly, race for mentors and protégés were dummy coded and were entered at Step 1. Demographic similarity (gender and race) was entered at Step 2.

As is evident in Table 2, Hypothesis 1 received partial support. For vocational mentoring support, there was not a significant incremental change in multiple correlation squared when gender and racial similarity were entered into the regression equation ($\Delta R^2 = .02$), $F(2, 129) = 1.38$, *ns*, and neither race nor gender similarity was significant in the final equation. For psychosocial mentoring support, there was a significant incremental change in multiple correlation squared when gender and racial similarity were entered into the regression equation ($\Delta R^2 = .06$), $F(2, 129) = 4.57$, $p < .05$. In the final regression equation, only gender similarity was significant in predicting psychosocial mentoring support

Table 2

Regressions of Mentor Support on Type, Ethnicity and Gender, Gender and Racial Similarity, and Perceived Attitudinal Similarity

Variable	Vocational support		Psychosocial support		Role-modeling support	
	ΔR^2	Final β	ΔR^2	Final β	ΔR^2	Final β
Step 1						
Peer mentor		-.16		.00		-.36***
Traditional mentor		.11		-.18*		.03
Black mentor		.09		.05		.11
Asian mentor		.03		-.03		-.02
Hispanic mentor		.04		.06		.11
Other race mentor		.00		.12		.01
Black protégé		-.14		.11		-.06
Asian protégé		.04		.04		-.04
Hispanic protégé		-.05		.00		-.21*
Other race protégé		.07		-.04		.00
Protégé gender		.06		-.04		-.07
Mentor gender		-.03		-.01		-.17*
Step 2	.10		.04		.17*	
Same gender		.08		.22**		.06
Same race		-.05		-.09		.06
Step 3	.02		.06*		.00	
Perceived attitudinal similarity	.14***	.40***	.20***	.47***	.20***	.47***

Note. $N = 144$. Type of mentor and ethnicity in Step 1 are dummy coded.

* $p < .05$. ** $p < .01$. *** $p < .001$.

($\beta = .22$, $p < .01$). For role-modeling support, there was not a significant incremental change in multiple correlation squared when racial similarity and gender similarity were entered into the regression equation ($\Delta R^2 = .00$), $F(2, 129) = 0.27$, ns . In summary, gender similarity was positively associated with psychosocial support, but not with vocational support or role modeling. Racial similarity was not significantly associated with mentoring support.

Hypothesis 2 predicted that perceived attitudinal similarity would be positively associated with the degree of mentor support that protégés received from their mentors. To test this hypothesis for each specific type of mentor support (vocational, psychosocial, and role modeling), three separate hierarchical multiple

regression analyses were performed. For Hypothesis 2 and all subsequent hypotheses, the order and type of control variables were identical to the testing of Hypothesis 1. For Hypothesis 2, gender and racial similarity were entered on Step 2, and perceived attitudinal similarity was entered on Step 3.

As shown in Table 2, Hypothesis 2 was supported for all three types of mentor support. For vocational mentoring support, there was a significant incremental change in multiple correlation squared when perceived attitudinal similarity was entered into the regression equation ($\Delta R^2 = .14$), $F(1, 128) = 24.14$, $p < .001$, and in the final equation ($\beta = .40$, $p < .001$). For psychosocial mentoring support, there was a significant incremental change in multiple correlation squared when perceived attitudinal similarity was entered into the regression equation ($\Delta R^2 = .20$), $F(1, 128) = 35.95$, $p < .001$, and in the final equation ($\beta = .47$, $p < .001$). For role-modeling support, there was a significant incremental change in multiple correlation squared when perceived attitudinal similarity was entered into the regression equation ($\Delta R^2 = .20$), $F(1, 128) = 39.43$, $p < .001$, and in the final equation ($\beta = .47$, $p < .001$). In summary, as expected, perceived attitudinal similarity significantly predicted the degree of mentor support (vocational, psychosocial, and role-modeling support) that protégés received from their mentors above and beyond demographic similarity.

Similarity and Mentor Satisfaction

Hypothesis 3 predicted that similarity in race and gender would be positively associated with protégés' satisfaction with their mentors. For this hierarchical multiple regression analysis, the same control variables and order as previously described in Hypothesis 1 were entered at Step 1. Gender and racial similarity were entered at Step 2.

Hypothesis 3 was not supported. There was not a significant incremental change in multiple correlation squared when gender and racial similarity were entered into the regression equation ($\Delta R^2 = .01$), $F(2, 129) = 0.38$, *ns*. In the final regression equation, neither gender similarity nor racial similarity was a significant predictor of satisfaction with mentor. The results of this analysis are displayed in Table 3.

Hypothesis 4, which predicted that perceived attitudinal similarity would predict protégés' satisfaction with their mentors, was supported. As stated earlier, for this hierarchical multiple regression analysis, the same order and type of control variables were used at Step 1. On Step 2, gender and racial similarity were entered. On the third step, perceived attitudinal similarity was entered.

In support of Hypothesis 4, there was a significant incremental change in multiple correlation squared when perceived attitudinal similarity was entered into the regression equation ($\Delta R^2 = .12$), $F(1, 128) = 20.92$, $p < .001$. In the final equation, perceived attitudinal similarity was a significant predictor of protégés'

Table 3

Regressions of Mentor Satisfaction on Type, Ethnicity and Gender, Gender and Racial Similarity and Perceived Attitudinal Similarity

	Satisfaction with mentor	
	ΔR^2	Final β
Step 1		
Peer mentor		-.28**
Traditional mentor		.04
Black mentor		.16
Asian mentor		-.01
Hispanic mentor		.05
Other race mentor		.09
Black protégé		-.08
Asian protégé		.01
Hispanic protégé		-.09
Other race protégé		.11
Protégé gender		.02
Mentor gender		-.06
Step 2	.13	
Same gender		.02
Same race		.01
Step 3	.01	
Perceived attitudinal similarity	.12***	.37***

Note. $N = 144$. Type of mentor and ethnicity in Step 1 are dummy coded.

** $p < .01$. *** $p < .001$.

satisfaction with their mentors above and beyond type of mentor, race, and gender ($\beta = .37, p < .001$). Table 3 displays the results of this analysis. In summary, perceived attitudinal similarity was more important than was race similarity or gender similarity between protégés and their mentors in predicting protégés' satisfaction with their mentors.

Mediating Relationship

Mediation analyses (cf. Baron & Kenny, 1986) were undertaken to assess whether attitudinal similarity mediated the relationship between racial and gender similarity with mentor satisfaction, and racial and gender similarity with the three mentor support variables (vocational, psychosocial, and role modeling). Contrary to Hypothesis 5, no mediation effects were noted. According to Baron and Kenny,

one stipulation for mediation is that the independent variables (here, racial similarity and gender similarity) must be significantly associated with the dependent variable (here, mentor satisfaction or any of the three mentor support measures). As seen in Table 1, neither racial similarity nor gender similarity was significantly associated with mentor satisfaction or with the three mentor support measures. Since there is little association between these independent and dependent variables, the mediation effect of perceived attitudinal similarity is not evident.

Discussion

The direct effects of demographic similarity on mentor support and satisfaction were explored in the present study. In particular, it was expected that similarity in race and gender between mentors and protégés would be positively associated with mentor support (psychosocial, vocational, and role modeling) and protégés' satisfaction with their mentors. Racial similarity did not predict protégés' support received from their mentors or protégés' satisfaction with their mentors.

While gender similarity was not positively associated with protégés' satisfaction with their mentors, it was positively associated with psychosocial support. Surprisingly, however, the relationship between gender similarity and psychosocial support was not in the direction expected. Protégés with cross-gender mentors were more likely to report a greater degree of psychosocial support than those with same-gender mentors. Chi-square tests of independence and *t* tests revealed that this counterintuitive finding could not be explained by differences among mentor-protégé pairs on length of time in the relationship, type of mentor, or age or gender of the mentor.

Perhaps this finding can be explained by examining the unique aspects of cross-gender communication (Tannen, 1994). As noted earlier, out of 55 cross-gender pairs, 20 were female-mentor/male-protégé pairs and 35 were male-mentor/female-protégé pairs. Researchers have noted that men might be more emotionally open to a female than to a male, particularly within the context of a coaching relationship, as women may be seen as less judgmental and more empathetic than men (Tannen, 1994). In a similar fashion, those men who chose to mentor women might have been able to provide more psychosocial support than some of the female leaders who sometimes find it necessary to display a more masculine, task-oriented style to survive in a corporate environment (Morrison, White, & Van Velsor, 1992). Indeed, this somewhat anomalous finding highlights our need for more research investigating the effects of gender similarity between mentors and protégés on mentoring relationships and related career outcomes.

While the direct effects of demographic similarity were not evident, the direct effects of perceived attitudinal similarity were very important. Perceived attitudinal similarity was the most significant predictor of all three types of mentor

support and protégés' satisfaction with their mentors. This is a unique finding as it demonstrates the importance of examining multiple facets of similarity among mentor and protégé pairs. In the past, most research focused on various aspects of demographic similarity, which, while critical, is limited. Recently, researchers (Harrison, Price, & Bell, 1998; Jackson, May, & Whitney, 1995; Milliken & Martins, 1996) have distinguished between two types of diversity—surface level and deep level—in examining dyadic and group relationships. *Surface-level diversity* refers to easily observable, immutable characteristics, such as race and gender; whereas *deep-level diversity* refers to values and attitudes. In the future, we need to examine further deep-level attitudinal aspects of similarity between mentors and protégés, such as similarity in general outlook, values, and approach to solving problems and their impact on individual and organizational outcomes.

Contrary to expectations, perceived attitudinal similarity did not mediate the relationship between racial similarity and mentor support (vocational, psychosocial, role modeling) because racial similarity was not associated with these measures. Previous authors have speculated that racial similarity is only salient in the very early period of a relationship in which mentors and protégés are not well acquainted with each other (Kalbfleish & Davies, 1991). Future research is needed to determine how the context of the mentoring relationship (formal or informal) and length of time in the relationship will affect the salience of demographic and perceived attitudinal similarity. Since all of the participants in this study chose their mentors themselves and 88% had been in relationships with their mentors for longer than 1 year, these protégés might have placed a reduced emphasis on superficial characteristics such as race and gender, and focused more on similarity in terms of values, goals, and problem-solving styles. Future research needs to examine mentoring relationships at various stages of the relationship.

Previous leadership researchers have questioned whether it is perceived or demographic similarity that is a better predictor of the support that leaders provide to their employees (Wayne & Liden, 1995). This study is unique, as it extends knowledge from leadership research to mentoring. It is one of the few studies in mentoring that contrasts the effect of demographic and perceived attitudinal similarity on mentoring support and satisfaction. The findings from this study seem to support Thibodeux and Lowe's (1996) contention that there might be important crossover implications from LMX to mentoring. Mentoring researchers would be well advised to examine other related dyadic relationships and theories (e.g., LMX theory) as a way to expand our conceptual approaches to mentoring (McManus & Russell, 1997).

The relational demography approach, based on the similarity–attraction paradigm, also seems relevant to the field of mentoring. The significance of perceived attitudinal similarity found in this study lends credence to the importance of examining the similarity–attraction paradigm within mentoring relationships.

Mentoring studies that examine the early indicators of attraction from both the mentor's and the protégé's perspective would be a contribution. In addition, longitudinal research that examines the durability of the effects of relational demography over time would be a useful addition to the literature.

In addition to the theoretical contributions, there are several important practical implications of this study for human-service professionals, managers, future mentors, and protégés. Since perceived attitudinal similarity was found to be an important predictor of the role modeling, psychosocial, and vocational support that protégés received from their mentors, it might be important to enhance the perceived attitudinal similarity between mentors and protégés. There are several ways to do this from an individual and an organizational perspective. First, would-be protégés and mentors need to look beyond superficial characteristics such as race and gender, and consider the multiplicity of ways that they might be similar to each other. Second, techniques from self-management can provide an excellent starting point to enable individuals to do this. For example, would-be protégés might use a cognitive strategy such as visioning to define the preferred attitudinal characteristics of their mentors. Protégés could use the behavioral strategy of goal setting to define ways in which they might obtain mentors that meet these characteristics. Third, once a protégé and a mentor connect, the protégé might use the techniques of cognitive restructuring to actively frame interactions as positive aspects of similarity, and then use a journal to actively reflect on these experiences. Within a more formal context, human resource professionals or skilled managers can help protégés to assess their own and their mentors' values, goals, and problem-solving styles through the use of standardized instruments.

Training could be provided to increase protégés' perceptions of similarity toward their current or potential mentors within the context of a formal mentoring program or offered to employees as part of the general professional development curriculum. In addition, in recent years, there have been a number of books and self-help tutorials that have emerged to enable individuals to manage their mentoring relationships without programmatic assistance. For example, to increase perceived attitudinal similarity, protégés could self-disclose to their mentors information related to career goals, values, and problem-solving styles and then specifically ask their mentors how their mentors sees themselves as being similar. Promoting an active awareness regarding the importance of perceived attitudinal similarity and a genuine willingness to accept demographic dissimilarity is an important component of successful diverse mentoring relationships.

Although this study has important practical and theoretical implications, there are several limitations, including the use of self-report data and the cross-sectional design of the study. These issues continue to be indicative of most of the research on mentoring (Ragins, 1999). The majority of published empirical works on mentoring continue to rely on a single source of self-report data, and

this study is no exception. For example, out of 82 empirical articles published on mentoring from PsychLit and ABI databases from 1998 to 2000, 62% gathered data from only the mentor or the protégé, but not from both. Although past authors have criticized the use of self-report data, as it contributes to social desirability and common method bias (Howard, 1994), other researchers (Maurer & Tarulli, 1994; Spector, 1994) have noted that self-report data are acceptable when the data measure individuals' perceptions, such as protégés' perceptions of their satisfaction with and support gained from their mentors. Since the present study focused on protégés' perceptions, it is likely that self-reports are the most appropriate measure for data collection. Also, research that examines careers, such as this study, is one area where method variance has been found to be less problematic than others (Crampton & Wagner, 1994). Moreover, as protégés in this study responded to anonymous written questionnaires pertaining to variables that were not highly sensitive, the vulnerability to social desirability is further decreased. Although future research should utilize multiple sources of data whenever possible, self-reports often might be the best source of information and continue to yield important information within the field of mentoring.

A related limitation of this study, which continues to plague mentoring research in general, is causality, as we cannot know for certain whether perceived attitudinal similarity causes greater satisfaction and support or whether satisfied protégés who obtain good support from their mentors perceive themselves as being more similar to their mentors. Because of the nature of mentoring, which tends to develop spontaneously around work-related settings, mentoring researchers have tended to conduct applied research, to use quasi-experimental or nonexperimental designs, and to gather data in uncontrolled organizational settings, which leads to difficulties with causality (Ragins, 1999).

Finally, the issue of generalizability cannot be ignored. While a strength of this study was its respectable external validity in the sense that it drew from the experiences of an ethnically diverse sample, it was limited to a population from the United States West coast. While this study makes important practical and theoretical contributions, its limitations highlight the need for future researchers to use a wider variety of measures, designs, and samples.

In conclusion, the present study suggests that perceived attitudinal similarity is more important than demographic similarity in affecting the quality of mentoring relationships and subsequent satisfaction with the relationship. This is a positive finding, as perceived attitudinal similarity is something that can be influenced or changed, whereas demographic similarity cannot. Much work needs to be done by practitioners to capitalize on this finding. We need to encourage mentors and protégés to probe more deeply for shared similarity so that they and their organizations can experience the benefits of a diverse network of mentors.

Although there has been a veritable explosion of recent literature related to mentoring (Russell & Adams, 1997), authors have lamented the atheoretical

nature of the field (Ragins, 1999; McManus & Russell, 1997). The present study, with its integration of LMX and relational demography, provides a useful starting point for theoretical development and hopefully will encourage other researchers to explore the similarities and differences with other literatures to expand the theoretical development of mentoring. As the field of mentoring becomes increasingly more complex, researchers need to continue to expand the horizons of mentoring research by developing and relying on theory to inform their research and, in turn, mentoring professionals need to use research to inform their practice.

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