Acculturative Stress, Depression, and Suicidal Ideation among Immigrant and Second-Generation Latino Adolescents

JOSEPH D. HOVEY, M.A., AND CHERYL A. KING, PH.D.

ABSTRACT

Objective: (1) To determine the relationship between acculturative stress, depressive symptoms, and suicidal ideation in a sample of immigrant and second-generation Latino-American adolescents, and (2) to determine the best predictors of acculturative stress and depressive symptoms. Method: Subjects were 40 female and 30 male students from a bilingual program in a southern California high school. Measures used were the Short Acculturation Scale for Hispanics, the SAFE acculturative stress measure, the Family Assessment Device, the Reynolds Adolescent Depression Scale, the Suicidal Ideation Questionnaire-Junior, and an open-ended question measuring individual attitudes and expectations toward the future. A cross-sectional design was used. Results: One fourth of the adolescents reported critical levels of depression and suicidal ideation, which were positively correlated with acculturative stress. Multiple regression analyses revealed that perceived family dysfunction and nonpositive "expectations for the future" were significant predictors of acculturative stress and depression. Conclusions: Results suggest that some acculturating Latino adolescents experience high levels of acculturative stress. These adolescents are also "at risk" for experiencing critical levels of depression and suicidal ideation. Findings highlight the importance of assessing and treating the depressed and potentially suicidal acculturating adolescent within a cultural context. J. Am. Acad. Child Adolesc. Psychiatry, 1996, 35(9):1183–1192. Key Words: acculturative stress, depression, suicidal ideation, adolescence, Hispanic.

During the past several years, studies have pointed to a number of demographic and clinical risk factors for adolescent suicidal thought and behavior. Within the adolescent population, researchers have found connections between depression and completed suicide (Hoberman and Garfinkel, 1988), depression and suicidal ideation (e.g., Harter et al., 1992), depression and suicidal behavior (e.g., Robbins and Alessi, 1985), and suicidal ideation and suicidal behavior (Veley and Cohen, 1988). Other studies point to the importance of alcohol abuse (e.g., Pfeffer et al., 1988), conduct disorder (Apter et al., 1988), anger and aggression (Myers et al., 1991), and disturbed family functioning (King et al., 1990, 1993) as risk factors for adolescent suicidal behavior.

Less attention, however, has been directed toward other adolescents who would appear to be "at risk" for suicidal ideation and behavior. The thought that suicide may stem from the lack of meaningful social interactions and close relationships within the community goes back to Durkheim (1897). According to Durkheimian thought, an individual is at a higher risk for suicide when the accustomed relationship between the individual and his or her society is shattered, such as when moving to a new country. This suggests that immigrants may be at an increased risk for suicidal ideation and behavior.

Scant attention has been given to the study of suicide and suicidal ideation in immigrant populations. Those studies that do involve immigrant populations have usually focused on immigrants in a general sense (e.g.,
Kushner, 1984; Trovato and Jarvis, 1986), not on immigrants of specific ethnic groups, and have focused on completed suicide rate as the variable of study, rather than the continuum of suicidal thoughts and behaviors.

Acculturative Stress

Acculturation refers to the changes that groups and individuals undergo when they come into contact with another culture (Williams and Berry, 1991). Acculturative stress refers to the stress that directly results from and has its source in the acculturative process (Berry and Kim, 1988; Williams and Berry, 1991). According to Williams and Berry (1991), acculturative stress may result in a particular set of emotions and behaviors including depression and anxiety, feelings of marginality and alienation, heightened psychosomatic symptoms, and identity confusion.

Berry and Kim (1988) and Williams and Berry (1991) present a conceptual framework for studying acculturation and mental health. Their model identifies cultural and psychological factors that may govern the relationship between acculturation and mental health. It also puts forth variables that may act or serve as "buffers" in the reduction of acculturative stress. These include social support found within the new community, including family support and immediate and extended family network; socioeconomic status (SES), including specific characteristics of SES such as education and employment; cognitive attributes such as expectations and attitudes toward acculturation (positive or negative); and the nature of the larger society—that is, the degree of tolerance for and acceptance of cultural diversity (multicultural versus assimilationist) within the mainstream society.

A set of studies (Mena et al., 1987; Padilla et al., 1985, 1986) explored the relationship of age and generational status to levels of reported acculturative stress in immigrant and later-generation college students. These studies revealed that immigrants (first-generation individuals) experienced greater acculturative stress than later-generation individuals, with each succeeding generation experiencing lesser stress. In addition to generational status, Padilla et al. (1985) found that acculturation level was a good predictor of acculturative stress. Concerning first-generation individuals, Mena et al. revealed that those individuals who moved before the age of 12 experienced less acculturative stress than the individuals who moved after the age of 12.

Salgado de Snyder (1987) documented a positive association between acculturative stress and levels of depressive symptomatology among young Mexican immigrant women. Furthermore, she found that access to social support networks did not appear to have a buffering quality against acculturative stress. She noted that may have been due to the limitations imposed by the measure used, which evaluated access to social support networks rather than perceived effectiveness of the support. Her findings suggest that those immigrants experiencing a high level of acculturative stress may be at an increased risk for the development of psychological problems.

Suicidality and Depression among Latinos

In a pair of studies, Sorenson and Golding (1988a,b) examined the lifetime rates of suicidal ideation and suicide attempts among Latinos and non-Latino whites. In the Sorenson and Golding (1988b) study, fewer Latinos (of which 87% were Mexican-American) reported suicidal ideation (8.8% versus 18.9%) and suicide attempts (3.2% versus 5.1%) than non-Latino whites. In the Sorenson and Golding (1988a) study, Mexican-Americans born in Mexico revealed significantly lower age- and gender-adjusted lifetime rates of suicidal ideation (4.5%) than Mexican-Americans born in the United States (13.0%), who revealed significantly lower rates than non-Latino whites born in the United States (19.2%). Adjusted rates of suicide attempt were lowest among Mexican-Americans born in Mexico (1.6%) and higher among both Mexican-Americans (4.8%) and non-Latino whites (4.4%) born in the United States.

Smith et al. (1985) compared suicide rates among Anglos and Latinos (of which an estimated 86% were Mexican-American) in five southwestern states and found that, for all ages, the suicide rate for Latinos (9.0) in the area was less than that for Anglos (17.3). For adolescents (aged 15 to 19), the suicide rate for Latinos was 9.0, compared with 11.9 for Anglos. Moreover, suicides occurred at a younger age for Latinos (32.9% under age 25) than for Anglos (17.3% under age 25). Anatore and Loya (1973) and Hatcher and Hatcher (1975) also found that suicide rates for Mexican-Americans declined with age. This pattern contrasts with the pattern found among Anglos and thus suggests
that suicide among Latinos is more of a youthful phenomenon.

As with suicidality, few studies of depression in the Mexican-American population exist (e.g., Burnam et al., 1987; Vega et al., 1984), and only a handful of these studies (Emslie et al., 1990; Roberts and Sobhan, 1992; Swanson et al., 1992; Weinberg and Emslie, 1987) address depression among adolescents. These studies reveal a significantly high prevalence of depressive symptoms among Mexican-American adolescents in comparison with both Anglo adolescents (Emslie et al., 1990; Roberts and Sobhan, 1992; Weinberg and Emslie, 1987) and Mexican adolescents (Swanson et al., 1992).

Family Support within the Latino Population

The Latin family has been described as an emotional support system which helps provide support for its members against external physical and emotional stresses (e.g., Keefe and Padilla, 1987; Keefe et al., 1979). The notion of "familism"—usually defined in terms of strong identification, attachment, and loyalty of individuals to family—is considered a core characteristic of Latin culture. Although familism has been proposed by some authors (e.g., Cohen, 1979; Keefe and Padilla, 1987) as being a possible explanation for "trouble-free" immigration to US society, other authors (e.g., Garza and Gallegos, 1985; Mindel, 1980), while recognizing the importance of familism, have suggested that familism values are changing as a result of acculturation.

To explore the relationship between familism and acculturation, Sabogal et al. (1987) examined the effects of acculturation on attitudinal familism in a sample of acculturating Latino subgroups. Their study revealed that, despite differences in national origin, perceived family support remained stable throughout the acculturative process. Their findings provide further support to the argument that familism remains an essential core value of Latin culture, despite differences in levels of acculturation.

Purposes of Present Study

The first purpose of the present study is to determine the relationship between suicidal ideation, depressive symptoms, and acculturative stress in a sample of acculturating Latino-American adolescents. It is expected that higher levels of acculturative stress will be positively associated with higher levels of depressive symptoms and suicidal ideation. The second purpose is to determine the best predictors of higher levels of acculturative stress. The variables explored are family cohesiveness (family intactness and level of family functioning), family SES, individual expectancies and attitudes concerning the future, generational status, age at immigration, and level of acculturation. Of these variables, it is expected, based on previous literature (e.g., Beck et al., 1989; King et al., 1993), that (low levels of) family functioning and expectancies concerning the future will also predict high levels of depressive symptoms and suicidal ideation.

METHOD

Subjects

Subjects were 40 female and 30 male students from a bilingual program in a southern California high school. The selected school is located in an area in which at least 50% of residents within its boundaries are Latino. Three specially trained bilingual teachers agreed to participate in the study. Within these three classrooms, 70 (87.5%) of 80 students participated. The other 10 students refused to complete the questionnaire. The age of the sample ranged from 14 to 20 years (mean = 16.76). Level of family SES, measured according to Wassner (1991), ranged from 5 to 48 (mean = 17.0). Seventy-five percent of the sample revealed SES values of 21 or less, indicating low levels of SES.

Generational status was determined by asking about the subjects' and their parents' and grandparents' places of birth. Subjects were then categorized into the following groups: early immigrants (first generation, immigrating before the age of 12); late immigrants (first generation, immigrating after the age of 12); and second generation. Subjects included 16 early immigrants (23%), 46 late immigrants (66%), and 8 second-generation individuals (11%).

Within the two immigrant groups, 54 were of Mexican descent, 3 were of Central American descent, 3 were of South American descent, and 2 were of Spanish descent. In the overall sample, 61 were of Mexican descent, 4 were of Central American descent, 3 were of South American descent, and 2 were of Spanish descent. Of first-generation individuals, 40.3% reported speaking only Spanish at home; 46.8% reported speaking more Spanish than English at home; and 12.9% reported speaking equal amounts of Spanish and English at home. Of second-generation individuals, 37.5% reported speaking only Spanish at home; 37.5% reported speaking more Spanish than English at home; and 25% reported speaking equal amounts of Spanish and English at home. Ninety-one percent of the subjects were Catholic. The rest reported no religious affiliations.

Measures

A self-administered battery of questionnaires was used. A demographic form assessed family SES, family intactness (country in which most of the family lives), generational status, age at immigration, and ethnicity.
Level of acculturation was measured with the Short Acculturation Scale for Hispanics (Marin et al., 1987). Possible scores ranged from 5 to 25 (low to high). The scale has been found (Khorraram et al., 1994; Marin et al., 1987) to have adequate internal consistency reliability (Cronbach α coefficients of .80 and .92) and construct validity for children, adolescents, and adults.

Acculturative stress was measured with a short version (Mena et al., 1987) of the SAFE scale (Padilla et al., 1985). This scale measures acculturative stress in social, attitudinal, familial, and environmental contexts, in addition to perceived discrimination (majority group stereotypes) toward immigrant populations. Subjects rated each scale item that applied to them on a 5-point Likert-type scale ("not stressful" to "extremely stressful"). Examples of items include the following: "People think I am unsociable when in fact I have trouble communicating in English"; and "Because of my ethnic background, I feel that others exclude me from participating in their activities." If an item did not apply to a subject, it was assigned a score of 0. The possible scores for the SAFE scale ranged from 0 to 120. The SAFE scale has been found to have adequate internal consistency reliability (.89) (Mena et al., 1987) and construct validity (Padilla et al., 1986) for adolescents.

The Reynolds Adolescent Depression Scale (RADS) (Reynolds, 1986) was used to measure depressive symptomatology. The RADS is a self-report measure consisting of 30 items rated on a 4-point scale according to the degree to which they describe the individual. The RADS has been used to measure depressive symptomatology among different ethnic groups (e.g., Wabon and Tabb, 1993), including Latino adolescents (Davis, 1991). It has been found (Reynolds, 1987b) to have adequate internal consistency reliability (Cronbach α coefficients from 16 studies ranged from .90 to .96) and construct validity.

The Suicidal Ideation Questionnaire-Junior (SIQ-JR) (Reynolds, 1987a) was used to measure suicidal ideation. The SIQ-JR is a 15-item self-report measure that assesses the nature and frequency of suicidal ideation within the past month. The SIQ-JR is the shorter version of the SIQ-SR. The concurrent and predictive validity of the SIQ-JR have been well established in several studies (e.g., King et al., 1990, 1993) of adolescents, and it has been found (Reynolds, 1988) to have adequate internal consistency reliability (.94) and construct validity.

The General Functioning subscale of the Family Assessment Device (FAD) (Epstein et al., 1983) was used to measure family functioning. The FAD is a self-report scale consisting of statements that subjects endorse in terms of how well each statement describes their family. Items are scored on a 4-point Likert-type scale ("strongly agree" to "strongly disagree"), with scaled scores (for each dimension) ranging from 1.00 (healthy) to 4.00 (unhealthy). The General Functioning subscale consists of 12 items, and examples of items include the following: "In times of crisis we can turn to each other for support"; and "There are lots of bad feelings in the family." The FAD has been found (Epstein et al., 1983; Halvorsen, 1991) to have adequate internal consistency reliability (.72 to .92), test-retest reliability (.66 to .76), and construct validity. The FAD has been used extensively to measure family functioning among different ethnic groups (e.g., Keinert et al., 1991), and it has also been used in studies of depression (e.g., Keinert et al., 1987) and suicidal behavior (e.g., King et al., 1993).

Finally, to measure individual attitudes and expectancies concerning the future, an open-ended question was asked: "What do you think the future will be like for you and your family?" Each response was coded as positive (hopeful), neutral, or nonpositive (nonhopeful) by two research assistants blind to the study's hypotheses and other questionnaire responses. The interrater reliability, calculated as a percentage agreement, was 97%. Disagreements were resolved by consensus.

Translation. The demographic form and open-ended question were developed in English and, along with the other measures, were translated into Spanish through the double-translation procedure (Brinlin et al., 1973) with the help of two translators.

Procedure
Following student and parental consent, the anonymous self-report questionnaires were administered to subjects in a classroom setting. The questionnaire required approximately 30 minutes to complete, and the subjects had the option of taking the questionnaire in either English or Spanish. Data collection occurred in May 1993.

RESULTS

Descriptive Statistics

Acculturation Level. Acculturation level ranged from 5 to 18 with a mean of 9.51 (SD = 3.38). The possible range was 5 to 25; the overall sample thus revealed relatively low levels of acculturation.

Family Intactness and Family Functioning. Seventy-three percent of the subjects reported that most family members live in the country of origin; 26% reported that most family members live in the United States; and 1% reported that an equal number of family members live in each country. The mean score for the General Functioning subscale of the FAD (family functioning) was 2.25 (SD = 0.42).

Expectations for the Future. Fifty-nine percent of the subjects were coded as having positive expectations for the future, 24% nonpositive expectations, 6% neutral, and 11% did not reply to the question.

Acculturative Stress, Depression, and Suicidal Ideation. Table 1 lists the means and standard deviations for the SAFE scale (acculturative stress), the RADS (depression), and the SIQ-JR (suicidal ideation). Gender had no significant main effects on acculturative stress and suicidal ideation. Gender did have a significant main effect on depression (F[1,68] = 4.57, p < .05), with females revealing higher overall depression scores.

A critical level on the SIQ-JR is reached with a score of 31 or greater, thus indicating potentially significant psychopathology and suicide risk (Reynolds, 1988). In the same manner, a critical level on the RADS is reached with a score of 77 or greater (Reynolds, 1987b). On the SIQ-JR, 24.3% of the subjects scored at the critical level (for females, 22.5%; males, 26.7%). On
the RADS, 22.9% scored at the critical level (females, 27.5%; males, 16.7%). As a comparison, 11% of the standardization sample of the SIQ-JR (Reynolds, 1988) reported a critical level of suicidal ideation, and 12% of the standardization sample of the RADS (Reynolds, 1987b) reported a critical level of depression.

Relationships between Predictor Variables and Acculturative Stress

Low levels of perceived family functioning were significantly correlated with high levels of acculturative stress ($r = .27$, $p < .01$). Levels of acculturation and SES were not significantly correlated with acculturative stress ($r = .04$ and $r = .04$, respectively).

Analyses of variance (ANOVAs) were used to study the effects of expectations for the future, generational status (and age at immigration), and family intactness on acculturative stress. The first analysis revealed a significant main effect for expectations for the future ($F[1,56] = 13.55$, $p < .0005$). Further ANOVAs revealed no significant main effects for generational status and family intactness.

Relationships between Predictor Variables and Depression and Suicidal Ideation

Pearson correlations among measures of family functioning, acculturative stress, depression, and suicidal ideation are presented in Table 2. As expected, acculturative stress, depression, and suicidal ideation were highly intercorrelated, and low levels of perceived family functioning were significantly correlated with high levels of depression.

An ANOVA was conducted to study the effect of expectations for the future on depression. No significant main effect was found. A second ANOVA was conducted to study the effect of expectations for the future on suicidal ideation. The analysis revealed a significant main effect for expectations for the future ($F[1,56] = 4.4$, $p < .05$).

Multiple Regression Analysis of Acculturative Stress

Table 3 shows a stepwise multiple regression analysis which was conducted to determine the best predictors of acculturative stress. Variables were selected for entry into the analysis based on the conceptual framework (Berry and Kim, 1988; Williams and Berry, 1991) presented earlier, and they include expectations for the future, family functioning, family intactness, acculturative level, and SES. In preparation for entry into the regression analyses, expectations for the future and family intactness were "dummy" coded (Cohen and Cohen, 1975). Expectations for the future ($t = 3.68$, $p < .001$) and family functioning ($t = 2.39$, $p < .02$) were each a significant independent predictor of acculturative stress, and together they accounted for 23% of the variance in acculturative stress. Family intactness, acculturative level, and SES added little variance to the equation, together accounting for 3% more variance.

Multiple Regression Analyses of Depression and Suicidal Ideation

Table 4 shows two stepwise multiple regression analyses. For each analysis, predictor variables were selected for entry based on the hypotheses stated earlier. In the first analysis, acculturative stress ($t = 2.79$, $p < .01$) and (low level of) family functioning ($t = 3.12$, $p < .001$) were each a significant independent predictor of depression, together accounting for 53% of the variance in depression. Family intactness, acculturative level, and SES added little variance to the equation, together accounting for 20% more variance.

TABLE 1

<table>
<thead>
<tr>
<th>Subjects’ Mean Scores and Standard Deviations on Measures of Acculturative Stress, Depression, and Suicidal Ideation</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Acculturative Stress</strong></td>
</tr>
<tr>
<td>Mean</td>
</tr>
<tr>
<td>All subjects ($N = 70$)</td>
</tr>
<tr>
<td>Male ($n = 30$)</td>
</tr>
<tr>
<td>Female ($n = 40$)</td>
</tr>
</tbody>
</table>

Multiple Regression Analysis of Depression

<table>
<thead>
<tr>
<th>Family functioning</th>
<th>Depression</th>
<th>Suicidal Ideation</th>
</tr>
</thead>
<tbody>
<tr>
<td>.27*</td>
<td>.35*</td>
<td>.17</td>
</tr>
<tr>
<td>Acculturative stress</td>
<td>.32*</td>
<td>.38**</td>
</tr>
<tr>
<td>Depression</td>
<td>---</td>
<td>.41**</td>
</tr>
</tbody>
</table>

Note: $N = 70$. Pearson correlation coefficients. Significance levels are based on one-tailed tests.

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

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TABLE 3
Multiple Regression Analysis of Acculturative Stress among Latino Adolescents

<table>
<thead>
<tr>
<th>Dependent and Predictor Variables</th>
<th>F</th>
<th>(df)</th>
<th>p</th>
<th>Total % Variance Accounted For</th>
</tr>
</thead>
<tbody>
<tr>
<td>Acculturative stress (SAFE)</td>
<td>13.55</td>
<td>(1.56)</td>
<td>.0005</td>
<td>19.48</td>
</tr>
<tr>
<td>Expectations</td>
<td>8.32</td>
<td>(2.55)</td>
<td>.0007</td>
<td>23.24</td>
</tr>
<tr>
<td>Expectations, FAD</td>
<td>6.21</td>
<td>(3.54)</td>
<td>.0011</td>
<td>25.66</td>
</tr>
<tr>
<td>Expectations, FAD, family intactness</td>
<td>4.60</td>
<td>(4.53)</td>
<td>.0029</td>
<td>25.77</td>
</tr>
<tr>
<td>Expectations, FAD, family intactness, acculturation level</td>
<td>3.00</td>
<td>(5.41)</td>
<td>.0212</td>
<td>26.80</td>
</tr>
</tbody>
</table>

Note: FAD = Family Assessment Device; SES = Socioeconomic status. The SAFE scale measures acculturative stress in social, attitudinal, familial, and environmental contexts.

were each a significant independent predictor of depression, and when combined with expectations for the future, the equation accounted for 17% of the variance in depression.

In the second analysis, depression (r = 3.69, p < .0005), acculturative stress (r = 3.43, p < .001), and expectations for the future (r = 2.09, p < .05) were each a significant independent predictor of suicidal ideation; and when combined with family functioning, the equation accounted for 36% of the variance in suicidal ideation. As seen, family functioning accounted for minimal additional variance (1%).

DISCUSSION

The findings of the present study are compelling in that they revealed critical levels of self-reported depression and suicidal ideation among a large percentage of first- and second-generation Latino-American adolescents, in addition to new information about the concurrent relationship between acculturative stress, depression, and suicidal ideation. The study also identified factors specifically associated with high levels of acculturative stress.

Self-Reported Suicidal Ideation and Depression

The present study revealed that about one quarter of the Latino-American adolescents experienced critical levels of suicidal ideation, which has been previously linked to an increased risk for suicidal behavior (e.g., Velez and Cohen, 1988). This percentage appears to be very high. As a comparison, 11% of the standardization sample of the SIQ-JR (Reynolds, 1988) reported a critical level of suicidal ideation. The present study

TABLE 4
Multiple Regression Analyses of Depression and Suicidal Ideation among Latino Adolescents

<table>
<thead>
<tr>
<th>Dependent and Predictor Variables</th>
<th>F</th>
<th>(df)</th>
<th>p</th>
<th>Total % Variance Accounted For</th>
</tr>
</thead>
<tbody>
<tr>
<td>Depressive symptoms (RADS)</td>
<td>7.80</td>
<td>(1.68)</td>
<td>.0068</td>
<td>9.0</td>
</tr>
<tr>
<td>SAFE</td>
<td>7.28</td>
<td>(2.67)</td>
<td>.0014</td>
<td>15.4</td>
</tr>
<tr>
<td>SAFE, FAD</td>
<td>4.98</td>
<td>(3.54)</td>
<td>.0040</td>
<td>17.3</td>
</tr>
<tr>
<td>Suicidal ideation (SIQ-JR)</td>
<td>13.62</td>
<td>(1.68)</td>
<td>.0004</td>
<td>15.5</td>
</tr>
<tr>
<td>RADS</td>
<td>10.46</td>
<td>(2.67)</td>
<td>.0001</td>
<td>21.5</td>
</tr>
<tr>
<td>RADS, SAFE</td>
<td>11.16</td>
<td>(3.54)</td>
<td>.0000</td>
<td>34.8</td>
</tr>
<tr>
<td>RADS, SAFE, expectations</td>
<td>8.85</td>
<td>(4.53)</td>
<td>.0000</td>
<td>35.5</td>
</tr>
</tbody>
</table>

Note: RADS = Reynolds Adolescent Depression Scale; FAD = Family Assessment Device; SIQ-JR = Suicidal Ideation Questionnaire-Junior. The SAFE scale measures acculturative stress in social, attitudinal, familial, and environmental contexts.
differs from previous studies of suicidality among Latinos (Anatore and Loya, 1973; Hatcher and Hatcher, 1975; Smith et al., 1985) in its use of a relatively homogenous sample of acculturating Latino adolescents and in its measurement of suicidal ideation. It supports, however, the notion (Smith et al., 1985) that young acculturating Latinos may be at an increased risk for suicide.

The present study furthermore revealed that 23% of the Latino-American adolescents experienced critical levels of depressive symptoms. This percentage also appears to be very high, suggesting that acculturating Latino-American adolescents may be at an increased risk for depression. As a comparison, 12% of the standardization sample of the RADS (Reynolds, 1987b) reported a critical level of depression. These findings corroborate those from other studies (Emslie et al., 1990; Roberts and Sobhan, 1992; Swanson et al., 1992; Weinberg and Emslie, 1987), which found relatively high prevalence rates of depressive symptoms among Latino-American adolescents in comparison with other ethnic groups. The pattern of females revealing higher levels of depressive symptoms than males is consistent with the literature (see Rutter, 1986) and is similar to that found among Latinos by Swanson et al. (1992) and Weinberg and Emslie (1987) in their respective studies of depression.

It should be noted that the present study, using a self-report methodology, measured depression as a constellation of symptoms and did not obtain specific clinical information about the onset, duration, and severity of the depressive symptoms. Nevertheless, the RADS assesses a broad range of depressive symptoms that have been associated with diagnosed depressive disorders (Comas et al., 1993; Petersen et al., 1993). Thus, although depression was defined somewhat broadly in the present study, the findings have relevance for clinical work and further research on adolescent depression.

More striking, perhaps, and delivering more immediacy than mere numbers are some of the subjective data gathered. In response to the open-ended question, an example of suicidal thought is given by a 17-year-old male who poignantly reveals uncertainty and despair about his future:

I don't know how my future will be... Rejection from those I love hurts. I feel as if I don't matter. I think my future will worsen, each day a bit more... Life for me is not worth anything now, nor will it ever... .

Acculturative Stress in Relation to Depression and Suicidal Ideation

Latino-American adolescents experiencing a high level of acculturative stress also reported high levels of depressive symptoms and suicidal ideation. These “at risk” adolescents may be “caught between cultures.” In other words, they may be caught between the influence of traditional values and norms and their experiences in the mainstream society. Markides (1981) states that the increased pattern of suicides among Latino-American youths may indicate that younger Latinos are less integrated into the family and community than older Latinos. It is also the case that acculturating individuals may experience other stressors unrelated to the acculturative process. The present study, however, focused only on acculturative stress, which is defined as that stress which has its source in the acculturative process.

Predictors of Acculturative Stress

Given the importance of the Latino family, it is not surprising that in looking at the moderating variables in the present study, family support—in terms of family functioning—is significantly related to acculturative stress. The results suggest that a low level of family functioning is linked with greater acculturative stress and that emotional closeness is more important than physical closeness (family intactness). As mentioned earlier, Salgado de Snyder (1987) suggested the same relative importance when she stated that perceived effectiveness of support may be a more adequate measure of support than access to support. The notion of support falls into the acculturative stress model (Williams and Berry, 1991) under the umbrella of “social support,” although concentration here is on family support. The present result is not surprising considering the importance of the family as a core characteristic of Latin culture, as the family has traditionally been important in providing emotional support for its members. As Sabogal et al. (1987) found, a high level of perceived family support is the most essential and stable dimension of Latin familism. Thus, without needed family support providing stability and acting as a buffer in the acculturative process, greater stress does appear likely.

The results indicate that positive expectations concerning the future may also act as a buffer against
acclorative stress. This notion also falls within the acclorative stress model (Berry and Kim, 1988; Williams and Berry, 1991): attitudes and expectancies toward the acclorative experience may affect individual coping strategies and ability to adapt, thus affecting individual level of acclorative stress. In general, those individuals who perceive the acclorative changes as opportunities may experience less stress than those who do not. A subjective response from a 19-year-old female to the open-ended question may help enrich the objective data and point to the possible links among expectations, familism, and acclorative stress:

I think that if we continue united, sharing our ideas and goals, with each other’s help we can realize our goals. I as a member of a family, my goal is to be a professional like my siblings. And for my parents their happiness depends on seeing us prepared for a good livelihood. I think that my father displays a good role in the family and tries to encourage us in everything so that our future will be successful.

It is interesting that generational status was not found to be a significant predictor of acclorative stress, as might be expected in light of earlier studies (Mena et al., 1987; Padilla et al., 1985, 1986). The present results thus suggest a nonlinear relationship between generation (time in the new community) and level of acclorative stress. This relationship may be due to the various levels of influence (upon stress) of buffering variables such as family functioning and expectations for the future. It may also relate to what Williams and Berry (1991) term the “nature of the larger society.” In comparison to a “unicultural” society, a multicultural society provides a greater degree of tolerance and acceptance of cultural diversity and the availability of a social-cultural network which may provide support for acclimating individuals. In the area of southern California sampled, a multicultural atmosphere and the availability of a possible social-cultural network pervades; in this atmosphere, it seems likely that the degree of encounters with those factors that induce stress would vary from family to family and person to person, in a very individualistic manner (at one’s own rate). In a more unicultural environment, on the other hand, with less of a social-cultural network, individuals would seem to have less choice in merging into the new society. In this instance, there would be less variance in terms of individual choice to merge (and rate of absorption) into the mainstream culture, and there would likely be a more direct relationship between time spent in the new community and level of acclorative stress.

Limitations and Directions for Future Research

This study should be considered preliminary because of the relatively limited sample size, the use of a single-informant self-report methodology, and its cross-sectional design. In addition, the homogeneity of the sample in terms of age, ethnicity, and area sampled suggests that findings should not be generalized to samples with other characteristics. The present study addressed relationships among acculturative stress, depression, and suicidal ideation within a sample of Latino adolescents. Thus it is not possible to draw distinctions between their experience and that of other acculturating groups. As noted, the FAD measure has been used extensively among different ethnic groups. However, caution should be taken in the interpretation of family functioning since the cultural norms for “healthy” family functioning may vary with ethnic groups.

Further research should concentrate on increasing the study’s generalizability. For example, the connection between acculturative stress, depression, and suicidality should be explored with different ages, ethnic groups, and (since the present sample consisted primarily of immigrants) other types of acculturating groups (Berry and Kim, 1988), such as native peoples, refugees (e.g., see Ahearn and Athey, 1991), and sojourners. Since Latino culture is not entirely homogenous, further research should examine variables within more specific Latino subgroups. Other factors known or hypothesized to increase the risk for acculturative stress, depression, and suicidality should also be explored. These factors include coping skills, self-esteem, level of adherence to traditional values and ethnic identification, prior knowledge of language and culture of the new society, motives for the move, congruity between contact expectations and actualities, and social support outside the family. Finally, further research with a longitudinal design is needed to address more clearly the question of directionality. Although the present study—because of its cross-sectional design—cannot address directionality and several variables were intercorrelated, the regression analyses were able to identify independent predictors (family functioning, expectations for the future) of acculturative stress, depression, and suicidal ideation.
Clinical Implications

As mentioned, virtually no previous data were available on depression and suicidality among Latino-American adolescents, and thus a purpose of the present study was to examine adolescent depression and suicidality in this population. The resulting data bring both a critical clinical element to the acculturative stress literature and a cultural variable to the literature on adolescent depression and suicidality.

On a practical level, the present findings have implications for the evaluation, intervention, and treatment of depressed and potentially suicidal adolescents. For the adolescent who may be experiencing acculturative stress and symptoms of depression and suicidal ideation, the data highlight the importance of assessment and treatment within a cultural context. By this, it is meant that the initial evaluation of the adolescent should include a careful exploration of the stress relating to acculturation, the family support system, and cognitive attributes such as attitudes and expectations toward the future, in addition to the investigation of overall psychiatric status, intent, and other factors known to predict suicidal behavior. Moreover, the roles of acculturative stress, family support, cognitive attitudes and expectations, and—if an immigrant—the migration itself and consequent change are issues that should be explored throughout the course of treatment.

Finally, the present results have training implications, both for professionals and paraprofessionals. As an example of the latter, even in a multicultural area like Los Angeles, issues concerning culture and immigration were not included—as of a few years ago—in the training of crisis counselors at a local suicide prevention hotline (Family Services of Los Angeles, 1990). This may be the current situation at crisis telephone lines throughout the country. The present data, however, point to the importance of incorporating variables such as those discussed above into the training, assessment, and counseling at crisis telephone hotlines, especially in ethnically diverse areas.

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