

Personal and family correlates of suicidal ideation among  
Chinese adolescents in Hong Kong

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## Abstract

Based on the family ecological model, personal (hopelessness, social problem solving, emotional competence) and family (parent-adolescent communication, family functioning) quality of life measures related to adolescent suicidal ideation were examined in 5,557 Secondary 1 to Secondary 4 students in Hong Kong. Results showed that suicidal ideation was positively related to adolescent hopelessness but negatively related to emotional competence, social problem solving, father-adolescent communication, mother-adolescent communication and family functioning. Multiple regression analyses showed that hopelessness was the most important predictor of adolescent suicidal ideation, followed by mother-adolescent communication, family functioning, social problem solving, father-adolescent communication, and emotional competence. Path analyses with and without direct effects showed that hopelessness mediated the effect of personal and family correlates on adolescent suicidal ideation. Theoretical and practice implications of the findings are discussed.

## Personal and family correlates of suicidal ideation among Chinese adolescents in Hong Kong

Although there are different views on the definitions of quality of life, there is a general agreement among researchers (e.g., Felce & Perry, 1995; Wallander, Schmitt & Koot, 2001) that the concept is a multidimensional one, including material well-being (finance, income, housing quality, and transport), physical well-being (health, fitness, mobility, and personal safety), social well-being (personal relationships and community involvement), emotional well-being (positive affect, mental health, fulfillment, satisfaction, faith/belief, and self-esteem), and productive well-being (competence and productivity). With particular reference to mental health, different indicators, such as psychological symptoms, suicide, and suicidal ideation have been used. Although suicidal ideation has commonly been used by researchers to examine quality of life among adolescents, few researchers have examined both its personal and family correlates.

Depending on the theoretical standpoint taken, personal and family correlates of adolescent suicidal ideation are weighted differently. For instance, the cognitive–emotive–behavioral theory stresses the importance of hopelessness, emotional competence, and social problem-solving in influencing suicidal ideation (Ellis & Bernard, 2006). In contrast, family-centered theories emphasize the impact of family processes on suicidal ideation, for example, family functioning and

parent–adolescent communication (Beavers et al., 1990; Epstein et al., 1993; Olson et al., 1989). From a family ecological perspective (Belsky, et al., 1984; Bronfenbrenner, 1979), human behaviors are influenced by both individual and contextual factors such as the family. Hence, there is reason to say that both personal and family factors have impact on adolescent suicidal ideation.

With reference to the concept of quality of life (Felce & Perry, 1995; Wallander, et al., 2001), personal quality of life indicators such as hopelessness, social problem-solving, and emotional competence, contribute to personal adjustment, such as suicidal ideation. Similarly, it is expected that family quality of life indicators (such as parent–adolescent relational qualities and family functioning) would influence adolescent psychological well-being (Shek, 2008), and therefore are likely to have an impact on the emergence of suicidal ideation.

Several studies point towards a relationship of individual quality of life measures and suicidal ideation. For instance, a significant relationship between hopelessness and suicidality has been obtained (e.g., Cukrowicz et al., 2004; Rutter et al., 2004), with hopelessness as the best predictor of suicidal ideation among student and adolescent samples suffering from bipolar disorder (Hallfors et al., 2006; Rucklidge, 2006). Another individual factor, a person’s emotional competence, has been related to depression and mental health (Miner et al., 2001; Znoj et al., 2002), and a lack of

social problem-solving ability seems to be closely linked with suicidal behavior (e.g., Carrie et al., 1998; Yang & Clum, 1996).

A number of studies suggest that different family quality of life measures might also be related to adolescent suicidal ideation. Previous studies found a link between parent–adolescent communication and adolescent psychological well-being (Landman-Peeters et al., 2005; Shek et al., 2006a). Research further indicates that adolescent suicidal ideation is related to family dysfunction, family discord, poor family environment, family rigidity, family conflicts, and low levels of family cohesion and support (Esposito et al., 2003; Lee et al., 2006).

There are several limitations intrinsic to the existing studies regarding the relationships among personal correlates, family correlates, and suicidal ideation in the existing literature. First, the studies on the relationship among different measures of personal (e.g., social problem-solving) and family quality of life (e.g., family functioning) with adolescent suicidal ideation (Fremouw et al., 1993; Mitchell & Rosenthal, 1992) are inconclusive. Second, few studies have included both personal, as well as family quality of life measures, in a single study. From a family ecological perspective, it would be important to include both personal and family quality of life measures in a single study to assess their relative contribution to adolescent suicidal ideation.

Third, the sample size in the existing studies was either too small or limited to a homogenous subsample. Fourth, most of the measuring instruments for the studies conducted in Hong Kong were adapted from the West, which may not be able to capture the essence of the Chinese culture. Fifth, there is a predominance of Western studies regarding the relationship between the personal or family quality of life measures and adolescent suicidal ideation. A survey of the PsycINFO in January 2009 with the search term “suicidal ideation” showed that while there were 4,804 citations, there were only 53 citations when the search terms “suicidal ideation” and “Chinese” were used. As Chinese people constitute roughly one-fifth of the world’s population (Shek, 2006), my study is an important contribution to fill the gap.

Finally, as there are inconsistent findings on the mediating role of hopelessness on the relationship between personal and family quality of life and adolescent suicidal ideation, further research should be attempted. Hopelessness was found to be a mediating variable between depression and suicide intent (e.g., Weishaar et al., 1992), between early negative life events and suicidal behavior (e.g., Yang & Clum, 2000), and between anxiety and suicidal behavior (Thompson et al., 2005). Studies also showed that hopelessness mediated the relationship between problem-solving deficits and suicidal ideation (Dixon et al., 1994; Miros, 2000) and Pinto et al. (1996) supported a mediating model in which hopelessness contributed to negative affect,

which ultimately influenced suicidal ideation. However, the mediating role of hopelessness was not fully supported in other studies (e.g., Levy et al., 1995).

Against the above background, several research questions were addressed in this study. These include: (1) What is the relationship between the personal quality of life (hopelessness, emotional competence, and social problem-solving) measures and Chinese adolescent suicidal ideation in Hong Kong? Based on the predictions of the rational-emotive-behavioral theory and previous research findings (Ellis & Bernard, 2006; Stewart et al., 2005; Znoj et al., 2002), it was hypothesized that: a) hopelessness would have a positive relationship with suicidal ideation (Hypothesis 1); b) emotional competence would have a negative relationship with suicidal ideation (Hypothesis 2); and c) social problem-solving would have a negative relationship with suicidal ideation (Hypothesis 3). (2) What is the relationship between the family quality of life (parent–adolescent communication and perceived family functioning) measures and Chinese adolescent suicidal ideation in Hong Kong? Based on the predictions of family theories and previous research findings (Walsh, 1993; Epstein et al., 1993; Shek et al., 2006), it was hypothesized that parent–adolescent communication would have a negative relationship with suicidal ideation (Hypothesis 4), and perceived family functioning would have a negative relationship with suicidal ideation (Hypothesis 5). (3) What is the relative importance of the personal and family

correlates in predicting Chinese adolescent suicidal ideation in Hong Kong? Since there were no previous studies in this aspect, the hypothesis could not be formulated.

(4) What is the role of hopelessness in the relationship between the personal and family quality of life and suicidal ideation? Based on the previous research findings (Miros, 2000; Thompson et al., 2005), it was predicted that hopelessness would mediate the relationship between the personal and family quality of life and suicidal ideation (Hypothesis 6).

## Method

### Participants and procedures

A cross-sectional survey was conducted and secondary schools were approached by convenience sampling with the help of agencies providing school social work service. Of the 68 schools (out of a total of 426 secondary schools in Hong Kong) that were contacted, 42 schools (including self-financed, subvented, and government schools) from Hong Kong Island, Kowloon, and the New Territories agreed to join the study. The response rate was 62%, which is comparable with similar local and international studies on suicidal ideation and behavior (Cheung et al., 2006; Lynch et al., 2006). By the end of the survey period, a total of 5,557 valid questionnaires had been collected. With reference to the total secondary student population in Hong Kong at the time the study was conducted (328,573 students), the sample size used



(2%) can be regarded as adequate. There were slightly more males (53.1%) than females (46.9%) in the sample, which reflects the distribution among the general population. The participants were evenly distributed among different forms (25.8% in Secondary 1; 24.7% in Secondary 2; 24.4% in Secondary 3; and 25.1% in Secondary 4). The age of the respondents varied from 11 to 18 years, with an overall mean of 13.87 years (SD=1.47).

School, parental, and participant consent were obtained prior to data collection. During the survey, a school social worker, a teacher or a research assistant was present to give a short briefing on the general aims and the confidentiality of the study. They were present throughout the whole administration process to answer queries raised by the participants. Briefing the participants and filling out the questionnaires took around 40 minutes.

### Measures of Personal Quality of Life

*Assessment of emotional competence.* Emotional competence was assessed using the Chinese Emotional Intelligence Scale in a short form (C-EIS-R) developed by Chan (2003). The instrument was adapted from the English 33-item EIS originally developed by Schutte et al. (1998). The short form of the 12-item C-EIS-R has four empirical subscales to represent four dimensions of emotional intelligence: self-management of emotions, social skills, empathy, and utilization of emotions.

Respondents indicate their agreement to each of the 12 statements using a five-point scale ranging from 1 (strongly agree) to 5 (strongly disagree). A higher score indicates better emotional competence. The scale was found to be internally consistent in this study ( $\alpha=.79$ ).

*Assessment of social problem-solving.* Social problem-solving was assessed using the Chinese version of the Social Problem Solving Inventory in a short form (C-SPSI-R) developed by Siu & Shek (2005b). The instrument was adapted from the 52-item Social Problem-Solving Inventory Revised (SPSI-R) (D’Zurilla, 1996). A validation study was conducted locally with 352 secondary school students (Siu & Shek, 2005b). The short form of the 25-item C-SPSI-R had a five-factor structure that was largely consistent with the original English SPSI-R. However, the three-factor model of the C-SPSI (Siu & Shek, 2005b) was used in this study because the internal consistency of the three subscales was good. The three subscales are negative problem orientation (NPO), rational problem-solving (RPS), and impulsiveness/carelessness style (ICS). For each of the 25 items, the respondents were requested to choose an answer on a five-point Likert scale ranging from “Not at all true of me” to “Extremely true of me”. Half of the test items indicate a constructive orientation toward problem solving, while the other half indicates a dysfunctional or inhibitive orientation. The items are presented in a random order. A higher score indicates better

social competence. There were findings showing that the related measures were valid and reliable (Siu & Shek, 2005b). Reliability analyses showed that this abridged version of C-SPSI-R was reliable in this study ( $\alpha=.83$ ).

*Assessment of hopelessness.* Hopelessness was assessed using the Hopelessness subscale of the Chinese Hopelessness Scale (C-HOPE) developed by Shek (1993). The original English scale was devised by Beck, Weissman, Lester, and Trexler (1974). The subscale has ten items and the respondents were asked to choose an answer from a four-point Likert scale ranging from “strongly agree” to “strongly disagree”. A higher score indicates a higher degree of hopelessness. According to Shek and Lee’s study (2005), the scale possessed adequate construct validity. The scale was demonstrated to be internally consistent in this study ( $\alpha=.88$ ).

*Assessment of suicidal ideation.* Adolescent suicidal ideation was assessed using the 13-item Suicidal Ideation Sub-Scale (C-SIS) of the Suicidal Risk Scale for Hong Kong students developed locally by Tse (Tse & Bagley, 2002). For each item, respondents were required to choose an answer from a four-point Likert scale ranging from “strongly agree” to “strongly disagree”. A higher score indicates a higher level of suicidal ideation. A previous validation study (Tse & Bagley, 2002) showed that the C-SIS has high reliability and validity. Reliability analyses showed that the scale had high reliability in this study ( $\alpha=.93$ ).

### Measures of Family Quality of Life

*Assessment of parent–adolescent communication.* Parent–adolescent communication was assessed using the father–adolescent communication scale (FACS) and mother–adolescent communication scale (MACS) developed by Shek et al. (2006). Each instrument contains 25 items that are identical across both versions, and differ only with respect to the target person (i.e., mother or father). A higher FACS or MACS score indicates a higher level of quality of parent–adolescent communication. In Shek et al.’s (2006) study, it was reported that the two measures were able to discriminate adolescents with good parental communication from those with a bad one. Reliability analyses showed that the FACS and MACS had high reliability ( $\alpha = .93$  and  $.94$ , respectively) in this study.

*Assessment of family functioning.* Family functioning was assessed using the Chinese Family Assessment Instrument (C-FAI), which is one of the first indigenous instrument designed to measure family functioning in Chinese families (Shek, 2000). For each question, respondents were required to choose an answer from a five-point Likert scale ranging from “strongly agree” to “strongly disagree”. There are five subscales: mutuality, communication, conflict and harmony, parental concern, and parental control. A higher score in the five subscales indicates a higher level of family functioning. Two large-sample validation studies were conducted (Siu & Shek, 2005a;

Shek, 2002), which provided strong support for the psychometric properties of the scale. The scale was demonstrated to have high reliability in this study ( $\alpha=.93$ ).

## Results

Pearson correlation analyses with Bonferroni-corrected alpha levels were performed (Table 1). Results showed that while hopelessness was positively related to adolescent suicidal ideation, emotional competence and social problem-solving were negatively related to adolescent suicidal ideation. These findings provided support for Hypotheses 1, 2, and 3. Furthermore, both father–adolescent communication and mother–adolescent communication were negatively related to adolescent suicidal ideation, whereas perceived family functioning was negatively related to adolescent suicidal ideation, thus providing support for Hypotheses 4 and 5.

The direct effects models (personal and family correlates as predictors and adolescent suicidal ideation as dependent variable) were estimated using standard regression analyses (Table 2). As indicated by  $R^2$ , both personal and family quality of life measures predicted 51% of the variance in adolescent suicidal ideation. It was found that hopelessness was the most important predictor, followed by mother–adolescent communication, family functioning, social problem-solving and father–adolescent communication, while emotional competence was the least important. Father–adolescent communication and emotional competence were less

significant than the other correlates ( $p < .01$ ).

Standard regression analyses were also performed by entering the personal and family correlates as predictors and hopelessness as a dependent variable. Then hopelessness was also entered as a predictor of adolescent suicidal ideation. Path analyses showed that while all the personal and family correlates were found to exert direct effects on adolescent suicidal ideation, they were also indirectly related to suicidal ideation via hopelessness (Table 2). This supported Hypothesis 6 that the impact of the personal and family correlates was mediated by hopelessness. When all the low direct-effect links (with beta coefficients  $< .5$ ) were deleted in a follow-up analysis, hopelessness ( $\beta = .68$ ,  $p < .001$ ) predicted 47% of the variance in adolescent suicidal ideation. These findings suggest that the predictor variables influenced the outcome variable mainly through adolescent hopelessness and the direct effect was weak.

Decomposition of the direct and indirect effects of the personal and family correlates showed that social problem-solving had the greatest total effect on adolescent suicidal ideation, followed by mother–adolescent communication, family functioning, and father–adolescent communication, while emotional competence had the smallest total effect (Table 3 and Figure 1).

## Discussion

In response to the limitations in the related literature, there are several unique features of the present study. First, Chinese adolescents were recruited in this study. Second, a large sample based on Secondary 1 to Secondary 4 students was used ( $N = 5,557$ ). Third, indigenously developed and validated measures of hopelessness, emotional competence, social problem-solving, parent–adolescent communication, family functioning, and suicidal ideation were used. Fourth, the relative importance of the personal and family correlates on adolescent suicidal ideation, as well as the mediating effect of hopelessness on the linkage between the personal and family correlates and adolescent suicidal ideation, was examined by testing the direct effects models and the mediating model.

For the personal quality of life measures, both correlation and regression analyses showed that a lower level of emotional competence was related to a higher level of adolescent suicidal ideation. This corroborates the previous finding that there was less suicidal ideation among those who can handle other people's emotions well and have good social skills (Ciarrochi et al., 2002). Since these people had greater social support and more intimate relationships with others, it would help to protect them from depression and suicidal ideation (Kalafat, 1997).

Results also showed that a lower level of social problem-solving skills was related to a higher level of adolescent suicidal ideation. This is consistent with

previous findings that adolescents who had inadequate problem-solving skills were at increased risk for suicidal thoughts and behaviors (e.g., Kingsbury et al., 1999; Thompson, et al., 2005). Moreover, results showed that a higher level of hopelessness was associated with a higher level of adolescent suicidal ideation. This observation is consistent with previous literature (e.g., Hallfors et al., 2006; Rucklidge, 2006; Smith et al., 2006). Adolescents feeling hopeless might regard suicidal ideation or suicidal behavior as the only alternative available and wrongfully put their hopes on life after death (Tse & Bagley, 2002; Yip, et al., 2006).

From the above discussion, it can be shown that the results are consistent with the cognitive-emotive-behavioral theory, which postulates that hopelessness (cognition), emotional competence (emotion), and social problem-solving (cognition and behavior) have impact on adolescent quality of life (i.e., suicidal ideation).

For the family quality of life measures, both correlation and regression analyses showed that a lower level of parent–adolescent communication was related to a higher level of adolescent suicidal ideation. This observation is in line with previous research finding that there was less frequent and less satisfying parent–adolescent communication among suicidal adolescents (Everall et al., 2006). Results also showed that a lower level of perceived healthy family functioning was associated with a higher level of adolescent suicidal ideation. This was in line with both local and



overseas findings (Fotti et al., 2006; Stewart et al., 2005). Since family is a shelter that provides concern and emotional support for most adolescents in Hong Kong where mutuality, communication, harmony, and parental concern in the family are valued and treasured by the adolescents, this may contribute to a decrease in adolescent suicidal ideation.

Hence, the above results are consistent with the predictions of different family theories, including Beavers model, Circumplex model, and McMaster model (Walsh, 1993), that parent–adolescent communication and family functioning are determinants of adolescent quality of life (i.e., suicidal ideation).

In general, the results show that all personal and family correlates were important predictors of adolescent suicidal ideation, although the related effect size was not on the high side. However, hopelessness was the most important predictor, while father–adolescent communication and emotional competence were less significant than the other correlates. Because Chinese culture emphasizes emotional inhibition and discouragement of expression of feelings (Shek, 2001), emotional competence might be regarded as less important by the Chinese adolescents as it was by their Western counterparts. Besides, father–adolescent communication was less emphasized than mother–adolescent communication. Traditionally, fathers have performed the breadwinner role, while mothers have played the socialization and

care-giving roles in Chinese society. Hence adolescents usually turned to their mothers, rather than their fathers, for emotional support and expression of feelings. The satisfaction and quality ratings for father–adolescent communication were lower than those based on mother–adolescent communication (Shek et al., 2006). Since parent–adolescent communication was found to be significantly related to Chinese adolescent psychological well-being (Shek et al., 2006), father–adolescent communication was regarded as a less significant predictor for adolescent suicidal ideation. The direct effects model thus support the hopelessness theory in explaining adolescent suicidal ideation (Rudd, 2000).

From the path analyses, hopelessness mediated the relationship between the personal correlates (emotional competence and social problem-solving), family correlates (parent–adolescent communication and family functioning), and adolescent suicidal ideation. This is in line with previous findings suggesting that hopelessness mediated the relationship between problem-solving deficits and suicidal ideation (Dixon et al., 1994; Miros, 2000; Rudd et al., 1994). Besides, there was considerable evidence supporting the link between social problem-solving skills (problem orientation and problem-solving skills) and hopelessness (Ciarrochi, et al., 2003; D’Zurilla et al., 1998; Kant et al., 1997).

With regard to emotional competence, a study found that effective emotional

control and level of emotional awareness had significant incremental value over stressful events in predicting hopelessness (Ciarrochi, et al., 2003). Since inhibiting emotions was cognitively demanding and stressful, this hindered the individual's ability to work through difficult life problems. Hence, this might have further led to the sense of hopelessness (Richards & Gross, 1999), which, in turn, increased suicidal ideation. Nevertheless, the effect size of the related regression coefficients was not particularly impressive.

Moreover, studies had indicated that parental qualities (including parent–adolescent conflict, frequency of parent–adolescent communication, feelings related to parent–adolescent communication, and parent–adolescent relationship) were associated with adolescent hopelessness (Shek, 1999; Tobin, 2000). With reference to family functioning, a number of studies had shown that problematic family functioning was significantly related to hopelessness in both clinical and non-clinical adolescents (Adams, 1998; Shek, 1999). Positive personal and family factors might have enhanced the adolescents' sense of hope, which lessened their suicidal ideation. Although previous studies had found that hopelessness mediated the relationship between other personal factors (e.g., depression, anxiety, and rumination) and suicidal ideation (e.g., MacLeod et al., 2005; Smith et al., 2006; Thompson, et al., 2005), this study was pioneering in identifying the mediating role of hopelessness between

emotion competence, parent–adolescent communication, family functioning, and adolescent suicidal ideation, which was different from Levy et al.’s (1995) findings.

Decomposition of the direct and indirect effects of the personal and family correlates showed that social problem-solving had the greatest total effect on adolescent suicidal ideation, while emotional competence had the smallest total effect. Previous research also showed that when problem-solving deficits combined with impulsiveness, suicidal behaviors became life-threatening, independent of levels of depression and hopelessness (Arffa, 1983; Spirito et al., 1989). Hence, there was empirical evidence that social problem-solving was the most important predictor of adolescent suicidal ideation, when hopelessness was controlled for. Inasmuch as the direct effects model assumed that all personal and family predictors contribute directly to adolescent suicidal ideation, the mediating model was a better description of the relationship among the predictors and suicidal ideation.

Since this study underscores the important roles of hopelessness, social problem-solving, parent–adolescent communication (particularly mother–adolescent communication), family functioning, and emotional competence in adolescent suicidal ideation, these factors should be considered as the key building blocks in theoretical models for adolescent suicidal ideation. The present findings are important because there are few theoretical models on both the personal and family determinants of

adolescent quality of life (i.e., suicidal ideation) in the Chinese context (Shek, 2006).

Nevertheless, it is noteworthy that the effect size of the predictors was not high. As such, more studies should be done to replicate the present findings.

Practically, it can be derived from the results that interventions from both the personal and family levels are needed to reduce adolescent suicidal ideation, thus enhancing their quality of life. Workshops and programs can be conducted to help adolescents build up hope and belief in the future, develop positive attitudes toward exploring possible options in life and recognize their own capabilities in goal achievement. Some adventure-based counseling (i.e., adventure activities to enhance self-understanding, coping with adversity, and interpersonal cooperation) can also be introduced so that they can learn to persevere in the face of hardship. Moreover, reinforcement of positive traditional Chinese beliefs about coping with adversity, for example, ‘You zhi zhe shi jing cheng’ (when there is a will, there is a way) is important for adolescents.

Cognitive behavioral groups can be held to teach the adolescents rational problem-solving skills, such as problem definition and formulation, generation of alternative solutions, decision making, solution implementation, and verification; these will likewise help to cultivate a positive problem orientation and to introduce active coping strategies. To enhance the adolescents’ emotional competence,

workshops and programs can also be organized to guide them and help them understand and regulate their own emotions, handle other people's emotions, and make effective use of emotions.

Since parent-adolescent communication and family functioning are significant predictors of adolescent suicidal ideation, it is important to involve the parents and the family in reducing suicidal ideation. Parallel groups and workshops on communication skills training can be run for both the parents and the adolescents. Communication barriers (e.g., threatening, criticizing, and ordering), appropriate communication attitudes (e.g., trust, respect, sincerity, and empathy) and effective communication skills (e.g., reflection of content and feeling, self-disclosure, and I-messages) can be introduced in the groups and workshops. In addition, other family members can be involved in the family workshops and programs to enhance family mutuality, harmony, and concern, as well as minimize family conflict and control.

It should be noted that the present study has several limitations. First, suicidal ideation can be transitional, and may not be closely linked to suicidal attempts or self-destructive behavior. This poses a limitation of using suicidal ideation, but not suicidal behaviors, as an indicator of quality of life. However, similar to other psychological symptoms, suicidal ideation has been used in previous studies as an indicator of quality of life (Felce & Perry, 1995; Wallander, et al., 2001). Second,

schools have been approached through agencies providing school social work service, and the resulting samples thus represent convenience samples. Generalization of the present findings to the secondary school population should proceed with caution. Third, as self-report questionnaires were used, the information collected was from the adolescent informants only. If resource permits, the use of multiple informants would give a clearer picture of the problem area. Fourth, the present research predominately used quantitative methodology. One disadvantage of this methodology is that it cannot explore the subjective experiences of adolescents. Another drawback is that it is less process-oriented and makes it difficult to apply the generalized data to individual cases.

Fifth, besides the personal and family quality of life measures utilized in this study, other indicators should be used in the future. Sixth, the use of a cross-sectional design means that it is not possible to claim a causal relationship between the antecedents and adolescent suicidal ideation. There may in fact be a bi-directional relationship between the variables, or a third variable may be present. Hence, a longitudinal research design can be used in future studies. Seventh, while most of the relationships explored were statistically significant, the practical significance of the findings may not be high. Finally, if resource permits, further analyses using structural equation modeling would provide a better understanding of the problem area.

However, it is noteworthy that the use of ordinary least square multiple regression analyses to understand psychosocial predictors of adolescent suicidal ideation is not uncommon in the field (Resch, et al., 2008; Wong, et al., 2007). Despite these limitations, the present study can be regarded as a stimulating and interesting addition to the literature on the relationships between personal and family quality of life measures and adolescent suicidal ideation.



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**Table 1: Correlations between emotional competence, social problem solving, hopelessness, father-adolescent communication, mother-adolescent communication, family functioning and adolescent suicidal ideation**

	Emotional competence	Social problem solving	Hopelessness	Father-adolescent communication	Mother-adolescent communication	Family functioning
Suicidal ideation	-.19*	-.37*	.68*	-.36*	-.42*	-.46*

\* $p < .0017$  (Bonferroni –corrected alpha level)

**Table 2: Direct Effects Models of adolescent suicidal ideation and hopelessness**

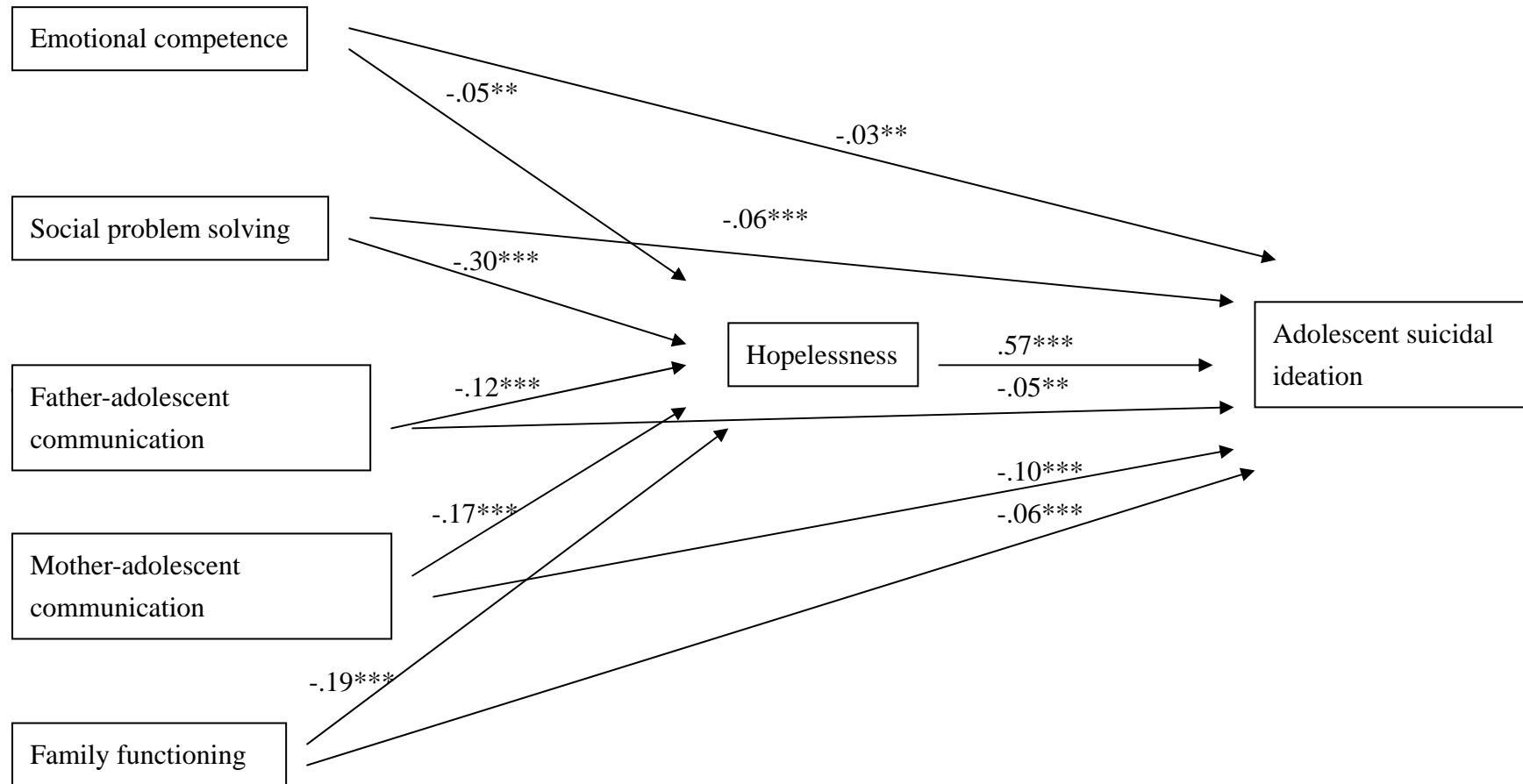
	Emotional competence	Social problem solving	Hopeless- ness	Father – Adolescent Communic- ation	Mother- Adolescent Communic- ation	Family functioning	$R^2$	Adj. $R^2$
Suicidal ideation	-.03**	-.06***	.57***	-.05**	-.10***	-.06***	.51	.51
Hopeless- ness	-.05**	-.30***	NA	-.12***	-.17***	-.19***	.35	.35

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

**Table 3: Decomposition of direct and indirect effects of the personal and family correlates on adolescent suicidal ideation**

	Direct effect	Indirect effect	Total effect
Emotional competence	-.03	-.029	-.059
Social problem solving	-.06	-.17	-.230
Father adolescent communication	-.05	-.068	-.118
Mother adolescent communication	-.10	-.097	-.197
Family functioning	-.06	-.108	-.168

**Fig. 1 Direct and indirect effects model on adolescent suicidal ideation**



\* $p < .05$

\*\* $p < .01$

\*\*\* $p < .001$