

## Family cohesion and depression in adolescents: A mediating role of self-confidence

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### Abstract

**Objective:** To identify the mediating role of self-confidence in family cohesion and depression in adolescents.

**Method:** The cross-sectional study was conducted at five mainstream government boys and girls schools in Lahore, Pakistan, from March 1 to November 30, 2019, and comprised adolescents aged 12-19 years. Data was collected using Family Cohesion Scale, Self-confidence Scale and Depression Scale for Adolescents. Data was analysed using SPSS 25.

**Results:** Of the 394 subjects, 214(54%) were boys and 180(46%) were girls. The overall mean age was  $14.76 \pm 1.39$  years. A significant positive association between family cohesion and self-confidence ( $p < 0.001$ ), and a significant negative association of family cohesion ( $p < 0.001$ ) and self-confidence ( $p < 0.01$ ) with depression was found. Self-confidence partially mediated the relationship between family cohesion and depression ( $p < 0.05$ ).

**Conclusion:** Early and timely identification of risk factors can prevent serious consequences of depression in adolescents.

**Keywords:** Family cohesion, Self-confidence, Depression, Adolescents. (JPMA 71: 677; 2021)

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### Introduction

Adolescence is the most critical period that requires continuous adjustment with changing biological, social and emotional demands<sup>1,2</sup> that may lead to a higher risk for developing different mental health problems.<sup>3</sup> The most prevalent mental health problem is depression which affects 10-85% people around the world and 22-60% of them happen to be adolescents.<sup>4,5</sup> Depression in adolescents is associated with many negative consequences, including poor school adjustment, poor school performance and high dropout rates, low self-esteem, social incompetence, lower self-confidence (SC), feelings of loneliness, interpersonal problems and lack of well-being later in life.<sup>6</sup>

Alarming increase in depression in adolescents has lead researchers to identify the risk or protective factors of depression<sup>5</sup>. Among these factors, family cohesion (FC) has attained a great interest.<sup>7,8</sup> Family has long been considered the most fundamental institution that influences the psychosocial and emotional well-being of individuals.<sup>9</sup> A cohesive family is characterised by supportive and integrated family environment<sup>10</sup> that influences psychosocial and emotional functioning of adolescents, like low depression, anxiety and stress, positive emotion regulation, high self-esteem and SC, adjustment, coping, optimism, self-worth, social ability,

social skills, social cohesion, educational engagement and performance.<sup>7,10-12</sup> Another key protective factor against depression in adolescents is SC<sup>13</sup> defined as a feeling of trust in one's ability, qualities and judgment. It reflects a person's subjective evaluation of his own self-worth. Studies have shown that the way in which adolescents evaluate and perceive their abilities and qualities have influence on academic, emotional, social and psychological development.<sup>14</sup> Higher SC level is associated with many positive outcomes, including higher level of well-being, quality of life (QOL) and academic achievement and lower level of depression, anxiety and stress. On the other hand, having lower SC level is associated with loneliness, social withdrawal, poor emotion regulation and greater mental health issues, including depression, anxiety and stress symptoms.<sup>15</sup>

The current study was planned to identify the interplay of FC and SC in the development of depression in adolescents, and to assess the mediating role of SC.

### Subjects and Methods

The cross-sectional study was conducted at five mainstream government boys and girls schools in Lahore, Pakistan, from March 1 to November 30, 2019. After approval from the Institutional Ethical Review Committee, Institute of Clinical Psychology, University of Management and Technology, Lahore, Pakistan, the sample was raised using multistage sampling strategy from among adolescents aged 12-19 years at the respective schools. Those who were the only child of their

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parents and participants living with a single parent were excluded.

After informed consent from the participants, the subjects were stratified according to academic grades 8th, 9th and 10th, and gender. Basic demographic information, including age, academic grade, gender and family system, was obtained. After which the validated Family Cohesion Scale (FCS)<sup>16</sup> was used to measure FC. The scale has 51 items that are measured on a 4-point rating, from 0 = never) to 3 = very much. Scores were obtained by calculating the sum of scores on each item of the scale and possible scores ranged 0-153, with high scores indicating higher FC level. Cronbach alpha of FCS in the current study was 0.92, indicating good internal consistency. Previously, FCS has shown good reliability with test-retest reliability = 0.76 and split half-reliability = 0.87 as well as content validity = 0.95 and construct validity = 0.50-0.64 for Pakistani adolescents.<sup>16</sup>

Also used was the Self-Confidence Scale (SCS) which was taken from Self-Esteem Scale for School Children<sup>17</sup> comprising 12 items. It is scored on a 5-point rating scale ranging from 0 = not at all to 4 = very much. the sum of scores on each item yields total SC score, ranging 0-48, with high scores denoting higher SC. Cronbach alpha of SCS in the current study was 0.80, indicating good internal consistency. Previously it has shown good reliability with test-retest reliability = 0.79 and split-half reliability = 0.89 as well as concurrent validity = -.70-0.76 for Pakistani adolescents.<sup>17</sup>

The last data-collection tool was the Depression Scale for Adolescents (DSA).<sup>18</sup> It consists of 27 items scored on a 4-point rating scale ranging from 0 = not at all to 3 = often. The sum of scores yields total score ranging 0-81, with high scores indicating higher level of depression. Cronbach alpha of DSA in the current study was 0.86, indicating good internal consistency. Previously it has shown good reliability with test-retest reliability = 0.89 and split half-reliability = 0.83 as well as concurrent validity = 0.63) for Pakistani subjects.<sup>18</sup>

Data was analysed using SPSS 25. Mean and standard deviation (SD) were worked out for continuous variables, and frequencies and percentages for categorical variables. Pearson Product Moment Correlation was calculated to investigate the association of FC, SC and depression. Mediation analysis using PROCESS v3 was carried out to explore the mediating role of SC in the relationship between FC and depression. Hayes Bootstrapping approach<sup>19</sup> was used to observe SC as a mediator between FC as an independent variable and depression as a dependent variable.

## Results

Of the 394 subjects, 214(54%) were boys and 180(46%) were girls. The overall mean age was  $14.76 \pm 1.39$  years. The majority of the sample 149(38%) was in the 8th grade, and 252(66%) were living in a nuclear family setup (Table-1).

There was significant positive association between FC and SC ( $p < 0.001$ ) and significant negative relationship of FC ( $p < 0.001$ ) and SC ( $p < 0.001$ ) with depression (Table-2), indicating that adolescents having high FC and SC levels were less likely to experience depression.

Mediation analysis (Figure) showed a significant predictive relationship between FC as independent variable and SC as mediator ( $p < 0.001$ ). Moreover, SC was also a significant predictor of depression ( $p < 0.01$ ). SC

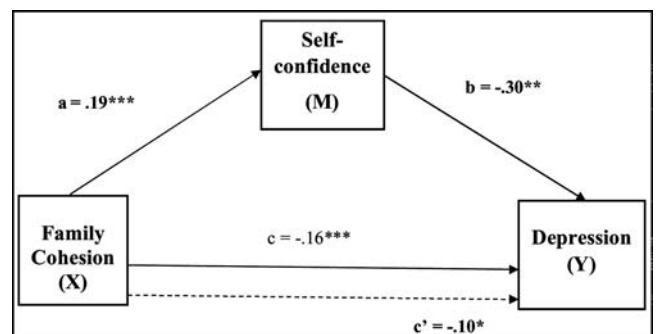
**Table-1:** Demographic characteristics (N = 394).

Variables	Categories	f (%)
Gender	Boys	214(54)
	Girls	180(46)
Age	12-14 years	186(47)
	15+ years	208(53)
Grade	8th	149(38)
	9th	121(31)
	10th	124(31)
Family System	Nuclear	252(66)
	Joint	142(34)

**Table-2:** Inter-correlations among family cohesion, self-confidence and depression of adolescents (N = 394).

Variables	M	SD	FC	SC	D
FC	121.63	17.23	-	.46***	-.22***
SC	32.41	7.18	-	-	-.24***
D	38.82	12.68	-	-	-

FC: Family cohesion, SC: Self-confidence, D: Depression, SD: Standard deviation. M = mean  $p < .001$ ,  $df = 393$ .



**Figure:** Mediation model of self-confidence (M) on the relationship between family cohesion (X) and depression.

**Table-3:** Regression Coefficients, Standard Error (SE), and Model Summary information for Family Cohesion, Self-Confidence and Depression of adolescents Mediation analysis (N=394).

		Antecedent			Consequent			
		$\beta$	M(SC) SE	p	$\beta$	Y(D) SE	p	
FC (X)	a	.19	.02	.001***	c'	-.10	.04	.01*
SC (M)		---	---	---	b	-.30	.10	.002**
Constant	i	9.52	2.27	.001***	i	61.15	4.45	.001***
$R^2 = .21$				$R^2 = .27$				
$F(1,392) = 103.77, p = .001***$				$F(2,391) = 15.01, p = .001***$				

FC: Family cohesion, SC: Self-confidence, D: Depression.

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

partially mediated the relationship between FC and depression ( $p < 0.05$ ) (Table-3) as after controlling the self-confidence as mediator, the association between family cohesion and depression gets weaken.

## Discussion

Adolescence period demands continuous adjustment with ever-changing developmental process,<sup>1</sup> and during this period adolescents encounter many pressures and challenges, like identity formation, biological changes, physical growth, interpersonal changes, changes in emotions and high parental expectations that together put adolescents at a greater risk for developing mental health issues.<sup>3</sup> Depression is considered one of the most prominent mental health issue experienced by adolescents and children.<sup>4,5</sup> Keeping in view of increased prevalence, there is a dire need to identify risk and protective factors of depressive symptomatology in adolescents. FC and SC are the most important protective factors against depression in adolescents.<sup>8,20</sup> Findings of the current study revealed that SC partially mediated the association of FC and depression. FC and SC emerged as protective factors against depression in adolescents.<sup>6,7,12</sup> the quality of attachment and cohesion in the family can later serve as a base from which the child can explore the environment and, when required, return to find relaxation.<sup>7</sup> Furthermore, family also assists adolescents in managing challenges, pressures and difficulties that they have to face during this developmental period. Individuals can find comfort whenever facing any difficulty and adjustment issue.<sup>11</sup> Family bonding becomes a guard against depression. All these findings of the current study are consistent with various theories, like Family System Theory, Parental Acceptance/ Rejection Theory and Parental Attachment Theory.<sup>21-23</sup>

Another protective factor of depression in adolescents is SC.<sup>13</sup> Having positive subjective evaluation about one's abilities was associated with lower level of depression in the current study, which is in line with literature.<sup>13-15</sup>

There are several sources of SC, and, among these sources, supportive and integrated family environment of a cohesive family is considered one of the most important.<sup>24</sup> Family is the first social environment to which a child gets exposed. Individuals can learn SC from family through social learning process and modelling. The Social Learning theory also supports this conception, arguing that observation of a model's behaviour may elicit imitative responses from the children.<sup>25</sup> Therefore, it can be concluded that a cohesive family is helpful in lowering depression in adolescents via SC, and this association is also supported by literature.<sup>14,8</sup>

The current study has some limitations. First, data was collected from only urban population. Second, data was also gained from government-school setting while leaving out private schools. Third, the study used self-reporting tools which may have allowed certain biases to creep in. Finally, this cross-sectional design of the study has its own limitations. Future research shall take care of all these limitations for more generalisable findings.

## Conclusion

SC mediated the association between FC and depression in adolescents. These findings could help clinical psychologists, school counsellors, teachers and parents to help adolescents experiencing depression. Growth groups and strength-based trainings could be conducted to help adolescents to overcome depression.

**Disclaimer:** The text is based on a PhD research project.

**Conflict of Interest:** None.

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