

Full Length Research Paper

School attachment and quality of life in children and adolescents of elementary school In Turkey

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The purpose of this study is to examine the relationship between school attachment and quality of life in children and adolescents attending elementary education. The study is survey model and participants of this research are comprised of 373 students currently attending elementary schools. School Attachment Scale for Children and Adolescents, and Health-Related Quality of Life Questionnaire for Children and Adolescents were used as data collection tool in this research. Stepwise regression method was used in analyzing the data collected. It was determined that there is a significant relationship between school attachment and quality of life in children and adolescents. Additionally, it was established that there is a significant difference between the level of school attachment and quality of life in children and adolescents in terms of gender and grade levels. The findings derived as a result of this is suggested on the educators and mental health experts in the studies to be carried out in order to increase the children and adolescents' levels of school attachment and quality of life.

Key words: Elementary school, school attachment, quality of life, children and adolescents.

INTRODUCTION

Schools make great contributions to students in their social and personality developments as well as their academic developments (Marks, 1988). In a large number of studies carried out recently, it is often emphasized that there is a positive relationship between the students' levels of school attachment and their social, emotional and academic adaptation. In this respect, being attached to the school and believing that you are valuable as a member of the school and you are being respected (Roeser et al., 1996; Samdal et al., 1999) are defined as a psychological need related to the sense of belonging to the group (Osterman, 2000). Faircloth and Hamm (2005), Juvonen, (2006) explain this concept with an approach which deals with the extracurricular activities at school, the student motivation reflecting the belief of value and competency towards school activities that have a dynamic relationship with the students' attitude and the relationships with teachers and classmates.

In the studies defining the school attachment with a multi-dimensional approach (Appleton et al., 2006; Fredricks et al., 2004; Jimerson et al., 2003), being attached to school is a notion covering cognitive, emotional and behavioral aspects. The behavioral

dimension of being attached to school indicates the way of attitude which is of use in terms of students' school achievement and his/her psycho-social adaptation (Fredricks et al., 2004). This dimension is defined by Costenbader and Markson (1998) as positive attitude (attending school, passing class and obeying the rules, etc.), by Posner and Vandell (1999) as taking part in the school-related tasks (doing homeworks, participating in the Works and discussions related to class and by Maloney and Cairns (1997) as participating in the extracurricular activities (in general, the frequency of joining the activities). Emotional dimension suggests the emotions, interests, perceptions and attitude towards school. For example, they demonstrate the perceptions regarding the value and benefits of education (Eccles et. al., 1993) and the perceptions as to the fact that school is useful in order for the student to attain his/her objectives (Bouffard and Couture, 2003; Watt, 2004). While in cognitive dimension the two variables, sense of success and psycho-social adaptation, are in question in main, these are explained as employing the self-organization strategies (Ablard and Lipschultz, 1998) and the psychological investment in education (DeBacker and Nelson; 2000). Cognitive investment in learning includes

the qualifications such as being willing to participate in learning activities, the effort to learn, creating objectives with task orientation and the perception of competence (Ablard and Lipschultz, 1998; DeBacker and Nelson, 2000). Accordingly, particularly low school expectation, low level of school attachment (Thornberry et al., 2003), negative communication with teachers (Esbensen et al., 1993) are considered among the negative qualifications as regards school.

In the studies carried out recently, it is often emphasized that there is a positive relationship between the students' levels of school attachment and their social, emotional and academic adaptation. It was determined that while there is a negative relationship between having a high level of school attachment and the attitudes towards crime, running away from school, using drugs (Somers and Gizi, 2001), depression, suicide (Anderman, 2002; Bullerick, 2000), risky sexual behaviours (Hawkins et al., 1999; Jessor et al. 1995), cheat and school problems (Murdock et al., 2001), there is a positive relationship between having a high level of school attachment and academic success and motivation (Murdock et al., 2001; Samdal et al., 1999; Roeser et al., 1996). In addition, it was determined that there is negative relationship between being attached to the school and crime in adults as well (Hawkins et al., 2001; Hawkins et al., 1999). As suggested in this research, being attached to school -including reducing the risk of developing behavioral problems is dealt with as a protective factor with many basic developmental function in the lives of children and adults. It was determined that intraclass applications affect school attachment and there is a negative relationship between school attachment and committing a crime in adults (Hawkins et al., 1999; Hawkins et al., 2001).

While quality of life, beyond general health condition, is defined as satisfactory social condition in which individual achieved within the limits of physical capacity s/he perceived, as a quite broad concept also including the state of personal wellbeing (Bowling, 1993), it is expressed as individual response given in daily life to the physical, spiritual and social effects of the disorders affecting individual satisfaction in certain living conditions (Orley and Kuyken, 1993; The WHOQOL Group, 1996). Quality of life is dealt with as a general and continual well-being and its evaluation concentrates generally on the positive experiences creating happiness, enjoyment and satisfaction and the negative experiences and emotions stating just opposite of this. These experiences are assessed within the framework of family, social circle, school, work, utilizing free times, etc., which are of sense and importance in terms of individual's life (Mok and Flynn, 2002).

Nowadays, there is a gradually increasing interest towards the social objectives of education. In the studies

carried out on children and adults, school adaptation emphasizes the relationship between the factors related to school and emotional and behavioral adaptation problems. The quality of life at school, which is accepted as one of the indicators of children's state of well-being can be dealt with as an general well-being state resulting from their joining the school life and becoming integrated with this environment (Karatzias et al., 2001). The notion of emotional attachment to school (e.g. loving school, feeling safe at school, being proud of school) is at the center of many conceptual approaches and evaluations. As a matter of fact, schools emphasize that their offering sufficient possibilities for children to establish close friendship affects the level of school attachment and that the decrease in school attachment gives rise to an increase in the psychological and academical adaptation problems in children and adults (Anderman, 2002).

The importance of the concept of school attachment in terms of education is the fact that it is regarded as an important psycho-social source for the general well-being and health conditions of children and adults. Being attached to school functions positively for the development of healthy attitudes during the period of childhood and puberty thanks to realistic beliefs regarding school and it also functions as protective factor by preventing the development of anti-social behaviours. In the process of attachment, it is suggested that in this sense, school plays a central role in the lives of children and adults in terms of the underlying of the importance of environmental conditions (Catalano et al., 2004). The purpose of this study is to examine the relationship between school attachment and quality of life in children and adolescents at the age of elementary education.

It is observed that the protective factors aimed to protect the mental health, to increase the psychological endurance and ease the adaptation of children and adolescents have been frequently discussed in recent times. Of these factors, being attached to school has a positive function in terms of believing that you are valuable as a member of the school, the sense of belonging to school and the development of healthy behaviour during puberty. It is stressed that being attached to school is of main function in the fields such as the school adaptation of children and adults and their general state of well-being, and their emotional and behavioural adaptation. The purpose of this study is to examine whether quality of life is significant regressive at the level of school attachment in children and adolescents in the period of elementary education.

METHODS

Subjects

The participants were 373 (188 female and 185 male)

randomly selected in the period of elementary education in İzmir. The participants of the study were composed of third and eight grade students of three different schools casually selected among the elementary schools and the participants' average age is 11.

The instrument

School attachment scale for children and adolescents (OBÖ-ÇE)

The scale, which was developed by Hill (2006) to assess the level of school attachment of children and adolescents and the original name of which is "School Attachment Scale" (SAS), is composed of the items related to peer and school attachment. The form in the Turkish version of the scale appears in three factors, including "school to attachment", "attachment to teacher" and "attachment to friend", in which factor structure aims measuring as it happens in the original scale. Cronbach alpha inner consistency coefficient of the scale was found as 0.84 and test reliability coefficient of test-retest as 0.85 (Savi, 2011).

Scale of quality of life related to health: Health-related quality of life questionnaire for children and adolescents

KINDL is general-purpose scale of quality of life which was developed for children and adolescents (8-12 and 12-18) and consisted of 24 items and 6 dimensions (physical well-being, emotional well-being, self-respect, family, friend and school). The study of Turkish version of the scale was carried out by Eser et al. (2008) and its Cronbach alpha value was calculated as 0.95, its correlation coefficient for equivalence as 0.70 and test correlation coefficient of test-retest as 0.80.

FINDINGS

Primarily, the reliability analysis of both scales was made within the scope of this research and Cronbach alpha coefficient of The Scale of School Attachment for Children and Adults was found as 0.93 and Cronbach alpha coefficient of the scale of quality of life as 0.73.

In the study, in order to determine whether quality of life and its subdimensions regress school attachment and subdimensions meaningfully, stepwise regression analysis was carried out and the findings obtained have been given in Table 1.

As seen in Table 1, it was observed that total quality of life in the dimension of friend relationships predictive school attachment in a positive way ($R = 0.152$, $R^2 = 0.023$, $F_{(1-371)} = 8,766$, $p = 0.003 < 0.01$). Accordingly,

2.3% of school attachment is accounted by friend relationships. It was observed that total quality of life predictive the attachment to teacher in the dimension of self-respect in a positive way ($R = 0.104$, $R^2 = 0.011$, $F_{(1-371)} = 4,065$, $p = 0.045 < 0.05$). Accordingly, 1.1% of attachment to teacher is accounted by self-respect. It was observed that total quality of life predictive the attachment to friend in the dimension of self-respect in a positive way ($R = 0.129$, $R^2 = 0.017$, $F_{(1-371)} = 6,277$, $p = 0.013 < 0.05$). Accordingly, 1.7% of attachment to friend is accounted by self-respect. In total, on the other hand, it was observed that quality of life accounted for 5.1% of the school attachment.

The correlations of the study belonging to quality of life and its subdimensions, and school attachment for children and its subdimensions are shown in Table 2.

As seen in Table 2, there is a positively significant relationship between school attachment and physical well-being, emotional well-being, family life, friend relationships and school life, which are sub-dimensions of quality of life. It was observed that there is a positively significant relationship between attachment to the teacher and attachment to friend, and emotional well-being, self-respect and school life.

The independent t-test results applied to determine whether school attachment shows difference in terms of gender are given in Table 3. Accordingly, it was determined that female students got higher grades than male students in the dimension of school attachment, attachment to friend and total attachment to school. However, in the comparison of quality of life carried out in terms of gender, it was determined that there is no significant difference between females and males as the result of independent t-test.

The results of one-way variance analysis (ANOVA) applied to determine whether school attachment scale for children and the grades of quality of life show difference in terms of the grade/class levels of students are presented in Table 4.

As seen above, the fact that total score averages of the students they got from the school attachment scale for children differentiate has been found statistically to be significant ($p < 0.05$). As a result of the LSD test carried out, it was observed that school attachments of the students of 4th and 5th grades are higher than the students of 8th grades.

The results of one-way variance analysis (ANOVA) applied to determine whether the students' levels of quality of life are different considering the class/grade they are taught are provided in Table 5.

In Table 5, the fact that students become different in their levels of quality of life in accordance with the class they are taught was found statistically to be significant ($p < 0.01$). As a result of the LSD test carried out, it was observed that the quality of life of the 3rd grade students is higher than the 5-6-7 and 8th grade students, of the 4th grade students higher than 5-7 and 8th grade students

Table 1. The results of stepwise regression analysis regarding the relationship between school attachment and quality of life.

		School Attachment					
		School attachment		Attachment to teacher		Attachment to friend	
		Beta	R ²	Beta	R ²	Beta	R ²
		0.023		0.011		0.017	
Quality of Life	Physical Wellbeing						
	Emotional Wellbeing						
	Self-respect			0.104		0.129	
	Family Life						
	Friend Relationships	0.152					
	School Life						

*p < 0.05; **p < 0.001.

Table 2. The results of correlation analysis regarding the relationships between school attachment dimensions of quality of life.

			OBÖ-ÇE		
			School to attachment	Attachment to teacher	Attachment to friend
Quality of Life	Physical Wellbeing	r	-0.01(*)	-0.03	0.06
		Sig.	0.31	0.59	0.52
	Emotional Wellbeing	r	0.08(*)	0.02(*)	-0.08(*)
		Sig.	0.12	0.64	0.12
	Self-respect	r	0.09	0.10(*)	0.12(*)
		Sig.	0.06	0.04	0.01
	Family Life	r	0.13(*)	0.07	-0.02
		Sig.	0.011	0.15	0.58
	Friend Relationship	r	0.15(**)	0.04	0.09
		Sig.	0.003	0.40	0.06
	School Life	r	0.06(*)	0.07(*)	0.04(*)
		Sig.	0.02	0.01	0.44

*p < 0.05; **p < 0.01

and of the 6th grade students higher than 7th and 8th grade students.

DISCUSSION AND CONCLUSION

The relationship between the school attachment and quality of life in the children and adolescents at the age of elementary education is examined in this study. In the consequence of the study, it was determined that quality of life is a significant predictor of school attachment. In the study, it was determined that of the dimensions of quality of life, the dimension of friend relationships is the variable predictor school attachment and the dimension of self-respect is the variable predictor the attachment to teacher and to friend. There is a positively significant

relationship between school attachment and physical well-being, emotional well-being, family life, friend relationships and school life, which are sub-dimensions of quality of life. It was observed that there is a significant relationship in a positive way between the levels of attachment to teacher and to friend, which are the dimensions of school attachment, and emotional well-being, self-respect and school life, which are the dimensions of quality of life.

In the other researches made regarding the school attachment, the combination of whole factors such as attachment to peers and teacher, academic adaptation, the sense of attachment, the motivation for success, the perception of school climate/atmosphere or the combination of some of these factors are carried out (Hill, 2006). In some studies, it is stated that there is a relation

Table 3. The independent t-test results of school attachment scale's grades.

	Gender	N	\bar{X}	S	t-value	p-value
School to Attachment	Female	188	17.6543	2.66742	3.317	0.001**
	Male	185	16.4270	4.28043		
Attachment to Teacher	Female	188	18.3404	2.38109	3.810	0.000**
	Male	185	17.0000	4.16116		
Attachment to Friend	Female	188	22.2447	2.85921	2.446	0.015*
	Male	185	21.2757	4.58195		
Total Attachment to School	Female	188	58.2394	6.15149	3.593	0.000***
	Male	185	54.7027	11.91561		

*p < 0.05; **p < 0.001

Table 4. The comparison of school attachment (OBÖ-ÇE) in terms of class.

OBÖ-ÇE	N	\bar{X}	S	F-value	p-value
3rd grade	68	56.0441	16.83496	2.788	0.017*
4th grade	61	57.2787	7.79344		
5th grade	63	58.3492	4.90937		
6th grade	59	58.3559	5.92704		
7th grade	53	56.2075	6.85666		
8th grade	69	53.1304	8.13473		

Table 5. The comparison of the scale of quality of life in terms of class.

Quality of Life	N	\bar{X}	S	F-value	p-value
3rd grade	68	89.5735	14.13825	6.930	0.000**
4th grade	61	88.9344	13.34774		
5th grade	63	83.3175	11.73061		
6th grade	59	85.3220	11.62109		
7th grade	53	80.3774	6.89266		
8th grade	69	81.1594	10.01120		

between school and guiltiness, that the students who have low level school attachment and who don't like school commit crimes more (Wiatrowski, 1981), that the quality of life at school has important effects on the students' academic success and the other outputs of the education (Sinclair and Fraser, 2002), that the students having a good school life much more take the responsibilities of their behaviour, that the main strategy to prevent the problematic attitudes at school is to create a positive school environment. In this context, students form their personal identities in the process of establishing relationships with the others and start gradually to form the most satisfactory societal lifestyle for themselves (Mok and Flynn, 2002).

The students who can establish positive relationships with their teachers who are one of the individuals with

whom they establish the most intense relationship increase their positive attitudes (Hoşgörür, 2002). Saban (2000) states that teachers, with their daily interactions, determine the nature of social atmosphere in which children live, suggests that children's social and moral experiences are generally formed of myriad attitudes and reactions they exhibit in the consequence of the interactions with their teachers. Bailey (1999), in his study he carried out over the second grade students, put forward that the most important factors over whether students like school or not are friends and teachers. Positive interpersonal relationships and the students who are respected by others are happier at school, are satisfied with their experience and work harder to realize their targets (Smith and Sandhu, 2004). As a consequence, it was discovered that satisfaction has

positive effects on the child's accepting educational values, in his motivation and his adopting school; but school dissatisfaction, on the other hand, shows positive relationship with behavioral problems and low success (Karatzias et al., 2001).

In this study, in the comparison of school attachment level made in terms of gender, it was found that female students' levels of school attachment are higher than male students. With respect to sub-dimensions, while female students' dimensions of school attachment and attachment to teacher are higher in comparison with male students; the difference between the score averages of female and male students in the dimension of attachment to friend was found not to be significant statistically. While the studies in which similar results present indicate that the difference between the genders at the level of school attachment is not significant (Anderman and Anderman, 1999; Somers and Gizzi, 2001; Hill, 2006), in some studies it was suggested that male adolescents exhibit higher level of school attachment than females (McNeely et al., 2002).

It was determined that there is no significant difference in the comparison carried out in terms of gender in the quality of life. However, in the studies of Eser et al., (2008) gender differences were found to be significant and the levels of males' quality of life were found to be higher than females (Fernandez-Lopez et al., 2004, Rajmil et al., 2004). This situation in males was found to be similar in the studies of adolescent Quality of Life in Health (Bisegger et al., 2005, Klassen et al., 2004).

In the comparison made in regard to the levels of class/grade, it was observed that school attachment differentiates and the school attachments of the students of 4th and 5th grades are higher than the 8th grade students. This discovery can be interpreted in a way that school attachment is higher in low grade classes. It was determined that some research findings on this matter show similarity and as the age and class levels of the students go up, their levels of school attachment, attachment to teacher and friend decrease (Simons-Morton et al., 1999; Savi, 2011); however, in the study carried out by Hill (2006) no significant difference was found in terms of age at the level of school attachment.

As a consequence, referring to the discoveries obtained in this study, it was determined that school attachment is an important factor in terms of children and adolescents' well-being and quality of life. Accordingly, school attachment and the factors related to school are of importance in the increase of children and adolescents' life qualities as well as the protection and development of their mental health. It can be ensured that for the educationalists and those involved in the field of mental health, the children and adolescents under the risk in terms of school attachment and quality of life should be identified and these students can be assured to make effective use of the psychological counseling

services with a group and individually.

REFERENCES

- Ablard KE, Lipschultz RE (1998). Self-regulated learning in high-achieving students: Relations to advanced reasoning, achievement goals, and gender. *J. Edu. Psychol.*, 90(1): 94-101.
- Anderman LH, Anderman EM (1999). Social predictors of changes in students' achievement goal orientations. *Contemporary. Edu. Psychol.*, 25: 21-37.
- Anderman EM (2002). School effects on psychological outcomes during adolescence. *J. Edu. Psychol.*, 94: 795-809.
- Appleton JJ, Christenson SL, Kim D, Reschly AL (2006). Measuring cognitive and psychological engagement: validation of the Student Engagement Instrument. *J. School. Psychol.*, 44(5): 427-445.
- Bailey G (1999). A qualitative study of middle grade students' perceptions of their schools, teachers and classes, Louisiana Middle School Association (LMSA) Journal, Spring, 8.
- Bisegger C, Cloetta B, Von Rueden U (2005) Health-related quality of life: gender differences in childhood and adolescence. *Soz Präventivmed*, 50(5): 281-91.
- Bouffard T, Couture N (2003). Motivational profile and academic achievement among students enrolled in different schooling tracks. *Edu. Stud.*, 29(1): 19-38.
- Bullerick SK (2000). Social connectedness and the relationship to emotional well-being among urban American Indian youth. Dissertation Abstracts International, 60(12): 46-53.
- Catalano RF, Haggerty KP, Oesterle S, Fleming CB, Hawkins J (2004). The Importance of Bonding to School for Healthy Development: Findings from the Social Development Research Group.
- Costenbader V, Markson S (1998). School suspension: a study with secondary school students. *J. School. Psychol.*, 36(1): 59-82.
- DeBacker TK, Nelson R (2000). Motivation to learn science: differences related to gender, class type, and ability. *Journal of Educational Research*, 93(4): 245-254.
- Eccles JS, Midgley C, Wigfield A, Buchanan CM, Reuman D, Flanagan C (1993). Development during adolescence: The impact of stage-environment fit on young adolescents' experiences in schools and in families. *Am. Psychol.*, 48: 90-101.
- Esbensen FA, Huizinga D (1993). Gangs, drugs, and delinquency in a survey of urban youth. *Criminol.*, 31(4): 565-589.
- Eser E, Yüksel H, Baydur H, Erharta M, Saatlı G, Özyurt-Cengiz B, Özcan C, Ravens-Sieberer U (2008). Çocuklar İçin Genel Amaçlı Sağlıkla İlgili Yaşam Kalitesi Ölçeği (Kid-KINDL) Türkçe Sürümünün Psikometrik Özellikleri. *Türk Psikiyatri Dergisi*; 19(4): 409-417.
- Faircloth BS, Hamm JV (2005). Sense of belonging among high school students representing our ethnic groups. *J. Youth. Adolescence.*, 34(4): 293-309.
- Fernandez-Lopez JA, Fernandez Fidalgo M, Cieza A (2004). Measuring health-related quality of life in children and adolescents: preliminary validation and reliability of the Spanish version of the KINDL questionnaire. *Aten Primaria*, 33(8): 434-42.
- Fredricks JA, Blumenfeld PC, Paris AH (2004). School engagement: potential of the concept, state of the evidence. *Rev. Edu. Res.*, 74(1): 59-109.
- Hawkins JD, Catalano RF, Kosterman R, Abbott R, Hill KG (1999). Preventing adolescent health-risk behaviors by strengthening protection during childhood. *Arch. Pediatr. Adolesc. Med.*, 153(3): 226-234.
- Hawkins JD, Guo J, Hill KG, Battin-Pearson S, Abbott RD (2001). Long-term effects of the Seattle Social Development Intervention on school bonding trajectories. *Appl. De. I Sci.*, 5: 225-236.
- Jimerson SR, Campos E, Greif JL (2003). Toward an understanding of definitions and measures of school engagement and related terms. *California. School. Psychol.*, 8: 7-28.
- Hill LG (2005). Investigation of a brief measure of school attachment. Manuscript submitted for publication. Hill LG, Werner NE (2006). Affiliative Motivation, School Attachment, And Aggression In School. *Psychology in the Schools*, 43(2): 231-246.
- Hoşgörür V (2002). İletişim, Z. Kaya (Ed.), Sınıf yönetimi, , Ankara,

- Pegem Yayıncılık. pp. 65–89.
- Jessor R, Van Den Bos J, Vanderryn J, Costa FM (1995). Protective factors in adolescent problem behavior: Moderator effects and developmental change. *Dev. Psychol.*, 31(6): 923–933.
- Juvonen J (2006). Sense of belonging, social bonds, and school functioning. In: Alexander, P., Winne P (Eds.), *Handbook of Educational Psychology*. second ed. Macmillan, New York, pp. 655–674.
- Klassen AF, Miller A, Fine S (2004). Health-related quality of life in children and adolescents who have a diagnosis of attention-deficit/hyperactivity disorder. *Paediatrics*, 114(5): 541–7.
- Karatzias A, Papadioti- Athanasiou V, Power KG, Swanson V (2001). "Quality of School Life, Development and Preliminary Standardization of an Instrument Based on Performance Indicators in Scottish Secondary Schools", *School Effectiveness and School Improvement*, 12(3): 265–284.
- Mahoney JL, Cairns RB (1997). Do extracurricular activities protect against early school dropout?, *Dev. Psychol.*, 33(2): 241–253.
- Marks GN (1998). "Attitudes to School Life: Their Influences and Their Effects On Achievement and Leaving School", Australia: Australian Council For Educational Research Ltd.
- McNeely CA, Nonnemaker JM, Blum RW (2002). Promoting School Connectedness: Evidence from the National Longitudinal Study of Adolescent Health, *J. School. Health.*, 72(4): 138–146.
- Mok MMC, Flynn M (2002). Determinants of students' quality of school life: A path model, *Learning. Env. Res.*, 5: 275–300.
- Murdock TB, Hale NM, Weber MJ (2001). Predictors of cheating among early adolescents: Academic and social motivations. *Contemporary. Edu. Psychol.*, 26(1): 96–115.
- Orley J, Kuyken W (1993). Quality of Life Assessment: International Perspectives. Proceedings of The Jointmeeting Organized by the WHO and the Foundation IPSEN in Paris, pp. 41–57.
- Osterman K F (2000). Students' need for belonging in the school community. *Review of Educational Research*, 70(3): 323–367.
- Posner JK, Vandell DL (1999). After-school activities and the development of low-income urban children: a longitudinal study. *Dev. Psychol.*, 35(3): 868–879.
- Rajmil L, Serra-Sutton V, Fernandez-Lopez JA (2004). [The Spanish version of the German health-related quality of life questionnaire for children and adolescents: the Kindl] *An Pediatr (Barc)*, 60(6): 514–21.
- Roeser RW, Midgley C, Urdan TC (1996). Perceptions of the school psychological environment and early adolescents psychological and behavioral functioning in school: The mediating role of goals and belonging. *J. Edu. Psychol.*, 88: 408–422.
- Saban A (2000). Öğrenme öğretme süreci. Yeni teori ve yaklaşımlar, Ankara, Nobel Yayın Dağıtım.
- Savi F (2011). School Attachment Scale for Children and Adolescents: The Study of Validity and Reliability. *Elementary Education Online*, 10(1): 80–90.
- Samdal O, Wold B, Bronis M (1999). Relationship between students' perceptions of school environment, their satisfaction with school and perceived academic achievement: An international study. *School Effectiveness and School Improvement*, 10: 296–320.
- Smith C, Sandhu DS (2004). Toward a positive perspective on violence prevention in schools: Building connections. *J. Counsel. Dev.*, 82(3): 287 – 293.
- Somers CL, Gizi TJ (2001). Predicting adolescents' risky behavior: The influence of future orientation, school involvement and school attachment. *Adoles and Family Health*, 2: 3–11.
- Simons-Morton BG, Crump AD, Haynie DL, Saylor KE (1999). Student-school bonding and adolescent problem behavior. *Health. Edu. Res.*, 14(1): 99–107.
- Sinclair B, Fraser BJ (2002). Changing classroom environments in urban middle schools. *Learning. Env. Res.*, 5: 301– 328.
- The WHOQOL Group (1996). What Quality of Life. *World Health Forum*, 17: 354–356.
- Thornberry TP, Krohn MD, Lizotte AJ, Smith CA, Tobin K (2003). *Gangs and Delinquency in Developmental Perspective*. Cambridge, England: Cambridge University Press.
- Watt HMG (2004). Development of adolescents' self-perceptions, values, and task perceptions according to gender and domains in the 7th-through 11th-grade Australian students. *Child Dev.*, 75(5): 1556–1574.
- Wiatrowski MD, Griswold DB, Roberts MK (1981). Social control theory and delinquency. *Am. Sociol. Rev.*, 30: 525–541.