



The Relationship Between Parenting Styles and Internalizing–Externalizing Behaviors Among Children Aged 5–10 Years

Dr. Sadia Sultana Kamolika¹, Dr. Mohammad Jane Alam^{2*}, Dr. Irfan Nowroze Noor³

¹Lecturer, Department of Community Medicine and Public Health, Shaheed Suhrawardy Medical College, Dhaka, Bangladesh.

²Assistant Professor, Department of Gastroenterology, National Gastroenterology Institute and Hospital, Mohakhali, Dhaka, Bangladesh.

³Assistant Professor, Department of Epidemiology, Doctoral Student, Mahidol University, OSD, DGHS, Mohakhali, Dhaka.

Corresponding Author: Dr. Mohammad Jane Alam, Assistant Professor, Department of Gastroenterology, National Gastroenterology Institute and Hospital, Mohakhali, Dhaka, Bangladesh.

(Received: 27 September 2025 Revised: 05 October 2025 Accepted: 01 November 2025)

KEYWORDS

Parenting Styles,
Child Behavior,
Internalizing–
Externalizing
Problems.

ABSTRACT:

Background: Behavioral and emotional problems in childhood, often categorized as internalizing and externalizing behaviors, have long been recognized as key predictors of later psychological and social maladjustment. Therefore, the purpose of this study was to investigate how different parenting styles influence internalizing and externalizing behaviors in children aged 5 to 10 years.

Aim of the study: The aim of the study was to investigate how different parenting styles influence internalizing and externalizing behaviors in children aged 5 to 10 years.

Methods: This cross-sectional study was conducted among 162 parents of 5–10-year-old children in AGB Colony, Motijheel, and Dhanmondi, Dhaka, Bangladesh (Jan–Dec 2020). Parenting styles and child behaviors were assessed using PSDQ and SDQ via face-to-face and telephone interviews. Data were analyzed in SPSS 25 using descriptive statistics, Chi-square, ANOVA, t-tests, and Pearson's correlation ($p < 0.05$), with ethical approval and confidentiality ensured.

Results: Among 162 children (mean age 7.48 ± 1.73 ; 55.6% girls), authoritative parenting was highest (4.27) versus authoritarian (1.68) and permissive (1.50). Externalizing behaviors were mostly average (61%), while 95.7% showed elevated internalizing behaviors. Total difficulties correlated strongly with internalizing ($r = 0.856$) and externalizing ($r = 0.819$); associations with parenting styles were non-significant.

Conclusion: Supportive authoritative parenting may help reduce internalizing and externalizing behaviors in children, highlighting its importance.

Introduction

In recent decades, increasing attention has been given to the study of behavioral problems among children and adolescents because of their strong link to later difficulties in emotional, cognitive, and social functioning [1-4]. Researchers commonly categorize problem behaviors in children into two broad groups—internalizing and externalizing behaviors [5]. Internalizing behaviors, such as withdrawal, inhibition, and anxiety, arise from excessive self-regulation,

whereas externalizing behaviors, including anger, aggression, and hyperactivity, are typically the result of insufficient self-control [6,7]. Externalizing tendencies during childhood are associated with higher risks of juvenile delinquency, criminal involvement in adulthood, violent or antisocial conduct, and substance abuse. Conversely, internalizing difficulties have been linked to an elevated risk of depression, anxiety disorders, suicidal tendencies in later life, and poor academic performance [8,9].



Parenting encompasses a range of behavioral patterns exhibited by parents that significantly influence both internalizing and externalizing problems in children and adolescents. A parent's parenting style represents a relatively consistent component of their personality and is shaped by their own traits, as well as by the child's characteristics and the broader environment [10-12]. According to Baumrind's classification, parenting can generally be divided into three main styles: authoritative, authoritarian, and permissive [13,14]. The authoritative style has been consistently associated with better psychological adjustment and positive developmental outcomes across childhood, whereas the authoritarian style has been linked to maladaptive behaviors, including social withdrawal, limited peer relationships, and conduct problems [15]. Overall, parenting styles play a crucial role in shaping children's mental health by defining behavioral boundaries, establishing emotional communication, and regulating discipline within the family context. In particular, authoritarian parenting has been correlated with an increase in both externalizing and internalizing behavioral difficulties among children [16,17].

While extensive research has examined the relationship between parenting styles, behavioral regulation, and children's problem behaviors, relatively few studies have investigated these variables simultaneously. Although several studies have assessed the impact of parenting styles on children's externalizing behaviors, the underlying psychosocial mechanisms influencing this association, particularly among younger children, remain less clearly understood [18]. Considering that nearly half of all children are reported to exhibit some form of behavioral or emotional difficulty, this represents a significant public health concern. Therefore, it is essential to explore parental and environmental factors that contribute to the emergence of internalizing and externalizing problems, especially among children in the 5–10-year age group, to provide insights relevant to prevention and intervention efforts. Therefore, the purpose of the present study was to investigate how different parenting styles influence internalizing and externalizing behaviors in children aged 5 to 10 years.

Objective

- To investigate how different parenting styles influence internalizing and externalizing behaviors in children aged 5 to 10 years.

Methodology & Materials

This cross-sectional study was conducted in two urban areas of Dhaka, Bangladesh—AGB Colony, Motijheel, and Dhanmondi residential area—between January 1 and December 31, 2020. A total of 162 parents of children aged 5–10 years were included, selected using purposive sampling to examine the association between parenting styles and internalizing–externalizing behaviors among children.

Inclusion Criteria:

- Parents of children aged 5–10 years
- Both fathers and mothers were eligible
- Biological parents only
- Parents who had completed at least Higher Secondary Certificate (H.S.C) education
- Parents who provided written informed consent

Exclusion Criteria:

- Parents with severe illness
- Parents of children with serious medical conditions
- Parents with impaired consciousness
- Parents unable to participate in the study

Data were collected through structured face-to-face and telephone interviews, with the study objectives and procedures explained to all participants, and written informed consent obtained. Each interview lasted approximately 20–25 minutes, and collected data were checked daily for completeness and accuracy. Parenting styles were assessed using the Parenting Styles and Dimensions Questionnaire (PSDQ), child internalizing and externalizing behaviors were screened using the parent-report Strengths and Difficulties Questionnaire (SDQ), and socio-demographic information was collected via a structured questionnaire. The instruments were pre-tested at Mohakhali Wireless Gate area to ensure clarity and reliability.

Data were entered into SPSS version 25, coded appropriately, and analyzed using descriptive statistics (frequency, percentage, mean, SD). Associations



between categorical variables were evaluated using Chi-square tests, mean differences were assessed using ANOVA and independent t-tests, and Pearson's correlation was performed to examine the relationship between parenting styles and child behavioral outcomes. Statistical significance was set at $p < 0.05$. Data quality was maintained through daily verification, concurrent data cleaning, and direct supervision by the researcher.

Ethical approval was obtained from the Institutional Review Board (IRB) of the National Institute of Preventive and Social Medicine, with written permission from relevant authorities. Participants were fully informed about the study purpose, procedures, benefits, and potential risks. Confidentiality and voluntary participation were ensured, and all data were used solely for research purposes.

Results

Table 1: Demographic Attributes of Children Aged 5–10 Years (n = 162)

Characteristic		Frequency (n)	Percentage (%)
Age (years)	5–6	54	33.3
	7–8	56	34.7
	9–10	52	32.1
	Mean \pm SD	7.48 \pm 1.73	
Sex	Girl	90	55.6
	Boy	72	44.4

Table 1 presents the demographic characteristics of the children included in the study. Among the 162 children, the mean age was 7.48 years (SD = 1.73), with 33.3% aged 5–6 years, 34.7% aged 7–8 years, and 32.1% aged 9–10 years. Regarding sex distribution, 55.6% were girls and 44.4% were boys.

Table 2: Distribution of Respondents According to Practicing Parenting Style (n = 162)

Parenting Style (PSDQ)	Frequency (n)	Mean	SD
Authoritative	162	4.27	0.451
Authoritarian	162	1.68	0.429
Permissive	162	1.5	0.624

Table 2 shows the distribution of parenting styles practiced by respondents as measured by the PSDQ. Authoritative parenting was the most commonly practiced style with a mean score of 4.27 (SD = 0.451), followed by authoritarian (mean = 1.68, SD = 0.429) and permissive (mean = 1.50, SD = 0.624).

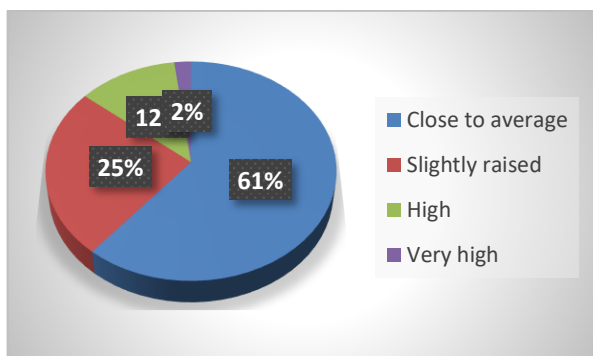


Figure 1: Distribution of Children According to Externalizing Behavior (n = 162)

Figure 1 illustrates the distribution of externalizing behavior among the children in the study. The majority of children (61%) scored within the close-to-average range, 25% were slightly raised, 12% were high, and 2% were very high.

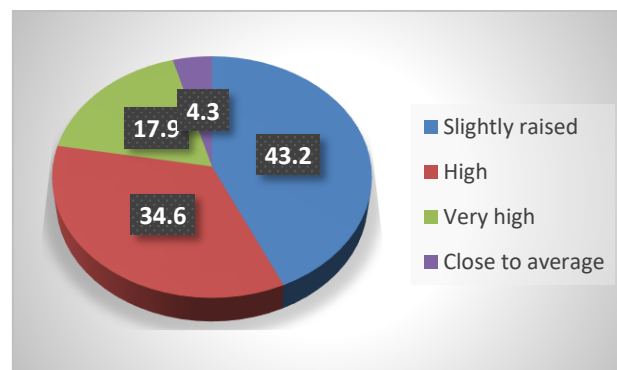


Figure 2: Distribution of Children According to Internalizing Behavior (n = 162)

Figure 2 presents the distribution of internalizing behavior among the children. A small proportion of children (4.3%) scored close to average, 43.2% were slightly raised, 34.6% were high, and 17.9% were very high.

Table 3: Association Between Child Age and Total Difficulty Score (n = 162)

Age (years)	Total Difficulty Score	Frequency (n)	Percentage (%)	χ^2 (df)	P-value
5–6	Normal	32	59.3	1.069 (4)	0.899
	Borderline	14	25.9		
	Abnormal	8	14.8		
7–8	Normal	30	53.6		
	Borderline	16	28.6		
	Abnormal	10	17.9		
9–10	Normal	29	55.8		
	Borderline	12	23.1		
	Abnormal	11	21.2		

Table 3 presents total difficulty scores across child age groups. The Chi-square test shows no statistically significant association between age and total difficulty score ($\chi^2 = 1.069$, $df = 4$, $P = 0.899$).

Table 4: Correlation Between SDQ Total Difficulties and Subscale Scores (n = 162)

Scale and Subscale	Total Difficulties	Emotional	Conduct	Hyperactivity	Peer Problem	Prosocial	Internalizing	Externalizing
Total Difficulties	1							



Emotional	0.736**	1						
Conduct	0.609**	0.318**	1					
Hyperactivity	0.648**	0.302**	0.178*	1				
Peer Problem	0.444**	0.002	0.035	0.168*	1			
Prosocial	-0.161*	-0.383**	-0.281**	0.047	0.326*	1		
Internalizing	0.856**	0.809**	0.278**	0.342**	0.590*	-0.118	1	
Externalizing	0.819**	0.404**	0.769**	0.765**	0.131	-0.154	0.404**	1
N	162	162	162	162	162	162	162	162

Table 4 presents the correlation coefficients between parent-reported SDQ total difficulties and its subscales. Total difficulties were positively correlated with emotional, conduct, and hyperactivity subscales at weak to high levels ($r = 0.30$ – 0.85), and moderately correlated with peer problems ($r = 0.40$). The prosocial subscale was negligibly negatively correlated with total difficulties ($r = -0.16$). Internalizing and externalizing subscales showed strong positive correlations with total difficulties ($r = 0.856$ and $r = 0.819$, respectively).

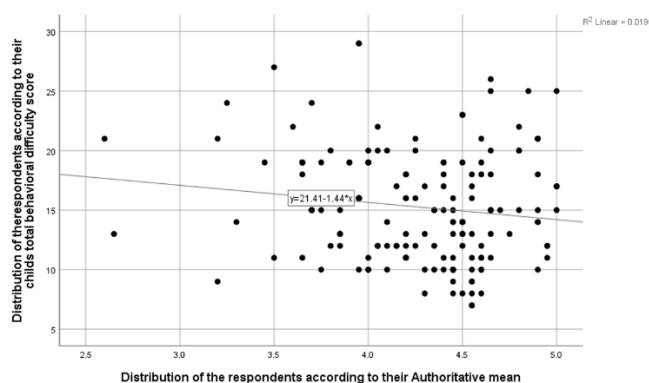


Figure 3: Association Between Authoritative Parenting and Children's Total Difficulty Score (n = 162)

Figure 3 illustrates the relationship between authoritative parenting style and children's total difficulty scores. A bivariate Pearson correlation analysis indicated a negative relationship, suggesting that higher levels of authoritative parenting are associated with lower total difficulty scores. However, this relationship was not statistically significant.

Table 5: Correlation Between Authoritarian Parenting and Children's Total Difficulty Score (n = 162)

Parenting Style	Pearson Correlation (r)	Sig. (2-tailed)	N
Authoritarian	0.100	0.204	162

Table 5 shows the bivariate Pearson correlation between authoritarian parenting style and children's total difficulty scores. The positive correlation ($r = 0.100$) suggests a slight tendency for higher authoritarian parenting to be associated with higher total difficulty scores; however, this relationship was not statistically significant ($p = 0.204$).

Discussion

Parenting style plays a crucial role in shaping a child's emotional and behavioral development, influencing how they respond to internal and external challenges. Internalizing behaviors, such as anxiety and withdrawal, and externalizing behaviors, such as aggression and



hyperactivity, are key indicators of a child's psychosocial adjustment. Therefore, this cross-sectional study was conducted to investigate how different parenting styles influence internalizing and externalizing behaviors in children aged 5 to 10 years.

The demographic profile of the children in the present study ($n = 162$) shows a fairly even distribution across the age groups of 5–6 years (33.3%), 7–8 years (34.7%), and 9–10 years (32.1%), with a mean age of 7.48 years ($SD = 1.73$). Regarding sex, slightly more children were girls (55.6%) than boys (44.4%). These characteristics are comparable to the sample reported by Akhter et al.[20], where children aged 8–12 years were examined, and both age and gender were considered important contextual variables influencing behavioral outcomes. Similar to their findings, the present study acknowledges that age and sex may play a role in shaping internalizing and externalizing behaviors, while parenting styles—authoritative, authoritarian, and permissive—remain central predictors. The inclusion of children across a narrow developmental range in both studies ensures that observed behavioral variations are more likely attributable to parenting practices rather than large developmental differences, supporting the relevance of demographics in interpreting the relationship between parenting styles and child behavioral outcomes.

The distribution of parenting styles among the respondents indicates that authoritative parenting was the most commonly practiced style, with a mean score of 4.27 ($SD = 0.451$), while authoritarian and permissive styles had lower mean scores of 1.68 ($SD = 0.429$) and 1.50 ($SD = 0.624$), respectively. This pattern aligns with findings from the meta-analysis by Pinquart et al.[21], which synthesized over 1,400 studies and reported that authoritative parenting is generally associated with lower levels of externalizing problems, whereas harsher styles such as authoritarian or permissive parenting tend to correlate positively with behavioral difficulties. The higher prevalence of authoritative parenting in the current sample reinforces the relevance of examining its potential protective role in child behavioral outcomes. Furthermore, the presence of lower mean scores for authoritarian and permissive styles is consistent with the expected distribution observed in prior research, suggesting that even modest variations in parenting style can meaningfully influence internalizing and externalizing behaviors among children.

In this study, the distribution of externalizing behaviors among the children showed that the majority (61%) scored within the close-to-average range, while smaller proportions exhibited slightly raised (25%), high (12%), or very high (2%) levels of externalizing behaviors. These findings are consistent with McKee et al.[22], who reported that externalizing behaviors such as aggression and non-compliance are commonly observed in young children and are meaningfully associated with parenting practices. The predominance of children in the average range in the present study may reflect the buffering effect of more frequently practiced authoritative parenting, while the smaller percentages of children with elevated externalizing behaviors underscore the influence of less optimal parenting styles, such as permissive or authoritarian approaches. This distribution supports the relevance of examining parenting styles as predictors of externalizing behavior, highlighting the variation in behavioral outcomes even within a relatively homogeneous sample of early school-aged children.

In this study, the distribution of internalizing behaviors among the children revealed that only a small proportion (4.3%) scored within the close-to-average range, while the majority exhibited elevated levels, with 43.2% slightly raised, 34.6% high, and 17.9% very high. This indicates that internalizing problems, such as anxiety, withdrawal, or somatic complaints, are relatively prevalent in the sample, highlighting a substantial proportion of children who may be at risk for emotional difficulties. The pattern suggests the need to consider how variations in parenting styles and family dynamics could influence these internalizing behaviors, as children experiencing less optimal parenting practices may be more prone to higher levels of emotional and psychological distress.

In this study, the association between child age and total difficulty scores revealed no statistically significant differences across the three age groups (5–6, 7–8, and 9–10 years), with the proportion of children in the normal, borderline, and abnormal ranges remaining relatively similar. This finding aligns with Almeida et al.[23], who reported that although age significantly predicted externalizing behaviors in middle-school children, it was not a significant predictor for internalizing behaviors. Similarly, in the present sample, age did not appear to have a substantial influence on overall behavioral difficulties, suggesting that other factors, such as



parenting styles and family environment, may play a more pivotal role in shaping children's internalizing and externalizing outcomes within this early school-aged population.

In this study, the correlation analysis between SDQ total difficulties and its subscales revealed that total difficulties were strongly associated with both internalizing ($r = 0.856$) and externalizing ($r = 0.819$) problems, with moderate to strong correlations observed for emotional ($r = 0.736$), conduct ($r = 0.609$), hyperactivity ($r = 0.648$), and peer problems ($r = 0.444$). Prosocial behavior showed a small negative correlation ($r = -0.161$) with total difficulties. These findings align with Goodman et al.[24], who reported that the broader internalizing (emotional + peer problems) and externalizing (conduct + hyperactivity) SDQ subscales demonstrated good convergent validity with the total difficulties score. The results from the present study similarly indicate that higher scores on emotional, conduct, hyperactivity, and peer problem subscales contribute meaningfully to overall behavioral difficulties, while higher prosocial scores are associated with fewer difficulties, highlighting the multidimensional nature of child behavioral outcomes in relation to total difficulty.

In this study, the relationship between authoritative parenting and children's total difficulty scores showed a negative correlation, indicating that higher levels of authoritative parenting were associated with lower overall behavioral difficulties, although this relationship was not statistically significant. This finding is consistent with prior research, including Pinquart et al.[21], who reported small negative associations between authoritative parenting and externalizing problems, and Williams et al.[25], who found that authoritative parenting was linked to fewer internalizing and externalizing behavior problems over time. Together, these results suggest that even when the effects are modest or non-significant in a given sample, authoritative parenting tends to be protective against broad behavioral difficulties in children, reinforcing the value of supportive and structured parenting approaches.

In this study, the correlation between authoritarian parenting and children's total difficulty scores was positive ($r = 0.100$), indicating a slight tendency for higher levels of authoritarian parenting to be associated

with increased behavioral difficulties, although this relationship was not statistically significant ($p = 0.204$). This finding aligns with previous research, such as Almeida et al.[23], who reported that authoritarian parenting significantly predicted internalizing behaviors and, to a lesser extent, externalizing behaviors in children. Together, these results suggest that more controlling or harsh parenting may be linked to greater behavioral challenges, even if the effect is small or not statistically significant in certain samples, highlighting the potential influence of parenting style on children's emotional and behavioral outcomes.

Limitations of the study

The study had a few limitations:

- The study sample was limited to respondents residing in urban areas of Dhaka city, which may not represent child behavior patterns across the entire country.
- The cross-sectional design prevents establishing temporal or causal relationships between parenting styles and child behaviors.
- Participants were required to recall past symptoms and feelings, introducing potential recall bias.
- Sampling was purposive and restricted to selected areas of Dhaka, limiting the external validity of the findings.
- Face-to-face interviews were challenging due to the ongoing pandemic and time constraints, which may have affected data collection.

Conclusion

The study indicates that authoritative parenting was the most commonly practiced style, while authoritarian and permissive approaches were less frequent. Most children exhibited average externalizing behaviors, whereas internalizing behaviors were generally elevated. Total difficulties were strongly associated with both internalizing and externalizing behaviors. Although authoritative parenting tended to relate to lower behavioral difficulties and authoritarian parenting to higher difficulties, these associations were not statistically significant. Overall, the findings highlight the potential protective role of supportive parenting on child behavioral outcomes.



References

1. van Lier PA, Vitaro F, Barker ED, Brendgen M, Tremblay RE, Boivin M. Peer victimization, poor academic achievement, and the link between childhood externalizing and internalizing problems. *Child development*. 2012 Sep;83(5):1775-88.
2. Min MO, Minnes S, Park H, Ridenour T, Kim JY, Yoon M, Singer LT. Developmental trajectories of externalizing behavior from ages 4 to 12: Prenatal cocaine exposure and adolescent correlates. *Drug and alcohol dependence*. 2018 Nov 1;192:223-32.
3. Rinaldi CM, Howe N. Mothers' and fathers' parenting styles and associations with toddlers' externalizing, internalizing, and adaptive behaviors. *Early Childhood Research Quarterly*. 2012 Apr 1;27(2):266-73.
4. Calkins SD, Blandon AY, Williford AP, Keane SP. Biological, behavioral, and relational levels of resilience in the context of risk for early childhood behavior problems. *Development and psychopathology*. 2007 Jun;19(3):675-700.
5. Alizadeh S, Talib MB, Abdullah R, Mansor M. Relationship between parenting style and children's behavior problems. *Asian social science*. 2011 Dec 1;7(12):195-200.
6. Newell CH, Olsen SF. Parenting Skills and Social--Communicative Competence in Childhood. In *Handbook of communication and social interaction skills* 2003 Feb 26 (pp. 771-816). Routledge.
7. Cole PM, Zahn-Waxler C, Fox NA, Usher BA, Welsh JD. Individual differences in emotion regulation and behavior problems in preschool children. *Journal of abnormal psychology*. 1996 Nov;105(4):518.
8. Farrington DP. Key results from the first forty years of the Cambridge study in delinquent development. In *Taking stock of delinquency: An overview of findings from contemporary longitudinal studies* 2003 (pp. 137-183). Boston, MA: Springer Us.
9. Moffitt TE. Adolescence-limited and life-course-persistent antisocial behavior: A developmental taxonomy. *Biosocial theories of crime*. 2017 Jul 5:69-96.
10. Baumrind D. Necessary distinctions. *Psychological Inquiry*. 1997 Jul 1;8(3):176-82.
11. Belsky J. The determinants of parenting: A process model. *Child development*. 1984 Feb 1:83-96.
12. Baumrind D. Parental disciplinary patterns and social competence in children. *Youth & Society*. 1978 Mar;9(3):239-67.
13. Baumrind D. Child care practices anteceding three patterns of preschool behavior. *Genetic psychology monographs*. 1967.
14. Baumrind D. Authoritarian vs. authoritative parental control. *Adolescence*. 1968 Oct 1;3(11):255.
15. Jewell JD, Stark KD. Comparing the family environments of adolescents with conduct disorder or depression. *Journal of Child and Family Studies*. 2003 Mar;12(1):77-89.
16. Leiner M, Villanos MT, Puertas H, Peinado J, Ávila C, Dwivedi A. The emotional and behavioral problems of children exposed to poverty and/or collective violence in communities at the Mexico-United States border: A comparative study. *Salud mental*. 2015 Apr;38(2):95-102.
17. Stoltz S, van Londen M, Deković M, Prinzie P, de Castro BO, Lochman JE. Simultaneously testing parenting and social cognitions in children at-risk for aggressive behavior problems: Sex differences and ethnic similarities. *Journal of Child and Family Studies*. 2013 Oct;22(7):922-31.
18. WenLi Z, Tiemei X, Shuangqi L, Qun Y, Jingbo Z, Sijie S. Parenting styles and externalizing problem behaviors of preschoolers: mediation through self-control abilities and emotional management skills. *Frontiers in Psychology*. 2025 Feb 5;16:1433262.
19. Ministerio de Salud, Colciencias. *Encuesta Nacional de Salud Mental*. Colombia: Ministerio de Salud; 2015 [cited 2025 Nov 2]. Available from: http://www.odc.gov.co/Portals/1/publicaciones/pdf/consumo/estudios/nacionales/CO031102015-salud_mental_tomo1.pdf
20. Akhter N, Hanif R, Tariq N, Atta M. Parenting styles as predictors of externalizing and internalizing behavior problems among



- children. *Pakistan Journal of Psychological Research*. 2011 Jun 30:23-41.
21. Pinquart M. Associations of parenting dimensions and styles with externalizing problems of children and adolescents: An updated meta-analysis. *Developmental psychology*. 2017 May;53(5):873.
 22. McKee L, Colletti C, Rakow A, Jones DJ, Forehand R. Parenting and Child Externalizing Behaviors: Are the Associations Specific or Diffuse? *Aggress Violent Behav*. 2008;13(3):201-215.
 23. Almeida D, Santos G. Parenting styles and youth's externalizing and internalizing behaviors: does self-control matter?. *International Criminology*. 2024 Sep;4(3):248-64.
 24. Goodman A, Lamping DL, Ploubidis GB. When to use broader internalising and externalising subscales instead of the hypothesised five subscales on the Strengths and Difficulties Questionnaire (SDQ): data from British parents, teachers and children. *Journal of abnormal child psychology*. 2010 Nov;38(8):1179-91.
 25. Williams LR, Degnan KA, Perez-Edgar KE, Henderson HA, Rubin KH, Pine DS, Steinberg L, Fox NA. Impact of behavioral inhibition and parenting style on internalizing and externalizing problems from early childhood through adolescence. *J Abnorm Child Psychol*. 2009 Nov;37(8):1063-75.