

Elements affecting adolescent anxiety - from the angles of peer relationships and parenting styles

Lifu Deng

Shenzhen senior high school, Shenzhen, China

Abstract. The causes and processes of teenage social anxiety disorder (SAD) are examined, with a focus on the combined effects of parenting practices and peer connections. According to recent studies conducted in China, teens experience significant levels of anxiety, which has a detrimental impact on their ability to focus, feel good about themselves, and interact with others. The roots of anxiety are explained by theoretical frameworks such as behavioural, cognitive, and humanistic approaches. While peer abuse intensifies symptoms, high-quality peer support reduces anxiety through emotional connection and resilience. Anxiety is greatly impacted by parenting styles: authoritative parenting lowers risk, whereas authoritarian and permissive parenting raises it. Other important aspects are attachment type and fear of bad appraisal. Adolescent anxiety levels are shaped by the combined influence of peer pressure and parents. In order to assist youth mental health, the study ends with multi-level intervention options encompassing families, schools, and society.

Keywords: social anxiety disorder, Practice in Childcare, peer relation

1. introduction

Anxiety is now a very prevalent problem among teenagers, especially the Social Anxiety Disorder, SAD. According to the research has been done by Zhou Han , among 637 of teenagers samples, there are 3.3 percent and 11.5 percent of them respectively have severe and mild social anxiety disorders. Xing Yanyan has pointed that from her research, in a community in Zhenzhou city, 33 percent of teenagers have some degree of SAD, of which 18 percent of them have severe symptoms of anxiety. Thus, anxiety now is a very general problem between teenagers. High degree of anxiety will cause lack of concentration of study, recession in memorizing and chaotic of thought, thus making teenagers feel hard in focus their mind on studying, and cannot achieve a desired goal or finish a text. Anxiety also will make teenagers more likely to be self-doubt, and trying to avoid socializing. They are afraid of other's talking, losing their friend and be isolated. When they are chatting with others, they often behave lack of confidence and lack of communication skills. Anxiety is highly related to depression. Anxiety symptoms and depression comorbidity are as high as 58%, and the risk is 1.8 times higher in girls than in boys. Adolescent anxiety, recognized as a global public health problem, is not devoid of hope. In China, studies have pointed out that the rate of detecting depression in 14 - 18 - year - old teenagers is as high as 14.8%, and the proportion of anxiety - symptom prevalence exceeds 20% (China Internet Psychological China, 2023; Educator, 2021). Nevertheless, anxiety is not an immovable dead - end. It can be mitigated (Du, 2023; Guangxi Medical Journal, 2023). The academic community has gradually started to examine the interactive mechanism of peer relationships and family parenting styles on adolescent anxiety over recent years. By applying theoretical analysis and empirical research, this paper systematically explores the action paths of these two core factors. It advances a multidimensional intervention strategy, a beam of hope, to supply a scientific basis for framing a youth mental health service system. It advances a multidimensional intervention strategy, a hint of hope, to give a scientific basis for constructing a youth mental health service network.

2. Theoretical starting - point for adolescent anxiety

2.1. Definitions and spurring causes of anxiety disorders

Social anxiety is the response to stress, when people are facing some challenging things like a

broken relationship or a dangerous disaster. Social relationship refers to the social connection and interaction pattern established between individuals and others. Social relationships are particularly important during adolescence because they are a critical stage in transition from childhood to adulthood and have a profound impact on the mental health and development of adolescents. A good social relationship can be helpful for social support, peers can provide emotional support for others which is really essential for the reduction of social anxiety. Others' understanding, encouragement and companionship can enhance teenagers' self confidence and security, give them a sense of safety. Since humans are a social animal, the sense of belonging is very important for teenagers, and can give them the idea that they are not isolated.

Anxiety disorders are characterized via excessive worry and fear. The causes of them may be accounted for by different theories, for example, behaviorism (conditioning reinforces anxiety), cognitivism (negative attribution bias), and humanism (lack of self - worth). In the time of psychosocial transformation for adolescents, the development of the prefrontal cortex lags behind that of the emotional center (amygdala), giving rise to poor emotional regulation capabilities (Educator, 2021). At this juncture, peer relationships (associated with social recognition needs) and family parenting styles (functioning as a source of security) become vital environmental factors for shaping anxiety susceptibility. Peer relationships (corresponding to the aspiration for social recognition) and family parenting styles (regarded as a source of stable security) at this stage turn into key environmental factors in shaping anxiety susceptibility (Educator, 2021; Guangxi Medical Journal, 2024).

2.2. Construal of core concepts

Peer relationships, containing peer support, bullying, exclusion and similar phenomena. are crucial indicators of adolescents' social adaptation.

Parenting style: sorted into authoritative, authoritarian, and permissive according to responsiveness and demand. Authoritarian parenting considerably increases the likelihood of anxiety, and the mechanism involved is associated with excessive activation of the amygdala and elevated cortisol levels. Authoritarian parenting remarkably boosts the risk of anxiety, and the mechanism through which it affects is associated with excessive activation of the amygdala and increased cortisol levels (Educator, 2021). Parenting style refers to the behavior patterns and strategies adopted by parents in the process of educating and raising children. Parenting styles have an important impact on the mental health and development of teenagers, it is also an important variable in the formation of social anxiety disorder. There are several explanations for the formation of social anxiety disorder,: behaviour theory, cognitive theory and the humanistic theory. Behaviour indicates the function of the outer world environment stimulus to the behaviour of people. The idea insists that anxiety is resulted in the classical conditioning, operant conditioning and observational learning form the learned response. For example, a car accident which can be considered as a unconditioned stimulus, when a person was undergo a car accident, they have a scar response to the car horn which is a neutral stimulus. After several times of relevance of these two stimulus, car horn is transfer to a conditioned stimulus and cause anxiety. That can also be an explanation for the happening of PTSD. The second explanation is the cognitive theory. Cognitive theory concentrates on the effort of individual's way of thinking and their difference between thinking. Considering anxiety as an overlook of threatening or the underestimate of their ability to deal with challenges. For example, the Beck's Cognitive Triad.

3. The way peer relationships affect adolescent anxiety

3.1. Support from the social sphere and anxiety relief

The risk of depression can be lessened by more than 30% thanks to high - quality peer relationships. Supportive networks formed by peers strengthen individual psychological resilience through emotional resonance (e.g., empathetic interaction) and instrumental support (e.g., academic mutual progress). For instance, if there is a 10% increase in the proportion of happy peers in the class, the

anxiety level will go down by 12% (You, 2024). Studies of neural mechanisms make evident that positive peer interaction can heighten the functional connectivity between the prefrontal lobe and the amygdala and improve the emotion - adjustment capacity (Absolute Children's Laboratory, 2024).

3.2. Two baneful consequences of peer abuse

Anxiety symptoms are directly generated by bullying (physical abuse, relationship rejection).. For instance, relationship abuse leads to abnormal functional connectivity between adolescents' amygdala and prefrontal lobe and undermines their emotional regulation ability.

4. Impact of family education on adolescent anxiety

4.1. Differentiation outcome of parenting style

Authoritative parenting integrates high responsiveness and reasonable requirements, thus resulting in the lowest incidence of anxiety (about 15%). This sort of family furthers the development of adolescent self-efficacy through emotional support and rule negotiation. This kind of family fosters the growth of adolescent self-efficacy via emotional support and rule negotiation (Educator, 2021).

Authoritarian parenting, characterized by high control plus low emotional support, results in overactivation of the amygdala and multiplies the risk of anxiety (Neural vulnerability research on adolescent anxiety, 2023).

Permissive parenting: low supervision and emotional neglect render adolescents without stress - coping strategies and at risk of online game addiction (Educator, 2021).

Liu chunmei and her etc research on the relationship between attachment style and social anxiety in adolescents, they have discovered different type of attachment styles had a significant effect on the level of anxiety. For the safety attachment, teenagers can have a sable relationship between parents and children, so they can form a sense of high value of themselves. They are unlikely to show the behaviour of avoiding and low level of anxiety. Then, for the avoiding attachment emotional requirement is unsatisfied for a long time, so they are tend to repress need of socializing. Their innermost being still exists implicit anxiety but they have no one to express. They behave as socializing avoiding and high sensitivity of interpersonal communication. The worst type of attachment is the ambivalent attachment. In this type of attachment, people are highly sensitive to others' comments. They desire socializing but are afraid to be refused. Thus, during some socializing scene, they have repeated feelings of tension and worry. This type of attachment has the highest level of social anxiety disorder. Attachment style plays a critical role in teenagers' self cognition and adjustment ability of emotion. Safety attachment style is easier to build the relation of reliance, other attachment styles are hard to deal with the uncertainty among socialization because of their lack of emotional support thus intensify social anxiety disorder. Xu siyu's research additionally reveal the core status Fear of negative evaluation play in social anxiety disorder. There was a significant positive correlation among fear of negative evaluation like fear to be laughed with social anxiety disorder which $r=0.52$ and $p<0.001$. It shows that excessive attention to the evaluation of others is a core cause of anxiety. Regression analysis shows the fear of negative evaluation can be used to explain the 34% of the variation in social anxiety which $\beta = 0.58$, $p < 0.01$, indicates that is a core predicting factor of social anxiety disorder. Moreover, there is a difference between the groups of people. The fear of negative evaluation and social anxiety of non-only children are significantly higher than that of only children, which may be related to scattered parental attention and ambiguous feedback in families with many children. Other scholars also examine the impact of family factors (Besteiro & Quintanilla, 2023; Wolfradt et al., 2003; Yaffe, 2021).

4.2. Specific behavioral mechanisms

Parental hostility causes an increase in anxiety symptoms by interfering with the integration of the central executive network (Educator, 2021). Too much academic intrusion (like "helicopter parents") leads to an escalation of cortisol levels in adolescents and the stifling of prefrontal executive function.

According to neuroimaging evidence, in an authoritarian parenting environment, the anti - correlation between the pre - salience network and the default mode network is strengthened, thus increasing susceptibility to peer pressure. Neuroimaging proof demonstrates that in an authoritarian parenting context, the anti - correlation between the pre - salience network and the default mode network becomes stronger, exacerbating the sensitivity to peer pressure (Educator, 2021).

5. Interaction between peer - related relationships and parenting modes

Risk superposition effect: The risk of anxiety climbs by 4 when authoritarian parenting and peer aggression work in tandem. 8 times. Such adolescents suffer from dysfunctional amygdala - prefrontal circuits, and impairments occur in both emotional regulation and cognitive control. Such adolescents experience dysfunction in their amygdala - prefrontal circuits, and both emotional regulation and cognitive control are compromised (Educator, 2021).

Protective buffering: Authoritative parenting can curtail the negative impact of peer rejection. Regarding adolescents with a high - paced parent - child communication, the anxiety level triggered by peer rejection is lessened.

Neural mechanism interaction: The hostile family environment leads to a decrease in the functional connection between the prefrontal lobe and the amygdala, thus causing adolescents' oversensitivity to peer stressors (Educator, 2021).

6. Multiple suggestions for soothing anxiety

6.1. Family level

Family members should ease excessive control and build up an "emotional support + rule negotiation" model. For instance, via weekly family meetings to deliberate on emotional issues and mitigate the adverse effects of maternal hostility on the central executive network.

6.2. School level

Schools should initiate a "peer support group" to cultivate an anti - bullying campus culture. Studies have proved that anti - bullying intervention can diminish the incidence of anxiety by 28%. Findings from studies show that anti - bullying intervention can bring about a 28% reduction in the incidence of anxiety ([China Academy of Educational Sciences, 2021).

Schools should integrate mental health courses into the compulsory course arrangement and teach cognitive reconstruction skills (e.g., the ABCDE emotion management technique) (China Youth Daily, 2023).

6.3. Social level

The society Aid the dissemination of AI psychological counseling platforms and issue alerts to high - risk individuals via big data analysis. For instance, using EEG signals allows for the monitoring of the prefrontal lobe's functional status. As an illustration, EEG signals are applicable for monitoring the prefrontal lobe's functional state (Educator, 2021).

The community forms a "parent school" to diffuse neurodevelopmental knowledge (such as the rules of prefrontal cortex maturation) and dissolve the misunderstanding of "forcing growth" education (Educator, 2021).

7. Conclusion

Through the pathways of neuroplasticity, cognitive attribution, and others, peer relationships and parenting styles jointly sculpt adolescent anxiety. Nonetheless, sorting out this issue calls for a combined effort. The 'family - school - medical - community' collaborative mechanism is not simply a recommended scheme but a necessary step. Policy - level initiatives should be launched to transform

brain science research results (like amygdala - prefrontal cortex circuit regulation) into educational practice. This collective action is indispensable for attaining precise prevention and effectively alleviate adolescent anxiety. This collective project is essential to reach precise prevention and effectively deal with the problem of adolescent anxiety.

References

- [1] Absolute Children's Laboratory. 2024. The influence of siblings on theory of mind in Chinese preschoolers: The role of parenting styles and peer interactions. *Early Education and Development*, 45(3): 1–15.
- [2] Besteiro, E. M., & Quintanilla, A. J. 2023. The relationship between parenting styles or parenting practices, and anxiety in childhood and adolescence: A systematic review. *Revista Espanola de Pedagogia*, 75(267): 11.
- [3] China Academy of Educational Sciences. 2021. Research on the impact of class size on peer relationships in middle school students. *Educational Research*, 6: 105–121.
- [4] China Internet Psychological China. 2023, October 25. Survey: "Academic pressure" and "family environment" become main causes of adolescent mental health issues. China.com.cn. <https://www.china.com.cn>
- [5] China Youth Daily. 2023, February 11. Online "chatterboxes" vs offline "social phobia": Do adolescents also experience "social anxiety"? Cyol.com. <https://www.cyol.com>
- [6] Du, C. 2023. Influencing factors and treatment methods of social anxiety disorder in adolescents: A review. *Advances in Psychology*, 13(11): 5509–5515.
- [7] Educator. 2021, December. Brain science and adolescent mental health. *Educator*, 33: 5–7.
- [8] Guangxi Medical Journal. 2024. Research on influencing factors and mechanisms of adolescent anxiety. *Guangxi Medical Journal*, 46(S1): 1–8.
- [9] Institute of Psychology, Chinese Academy of Sciences. 2023. Neural vulnerability research on adolescent anxiety. *Psychological Medicine*, 53(1): 103–111. <https://doi.org/10.1017/S0033291723002325>
- [10] Wolfradt, U., Hempel, S., & Miles, J. N. 2003. Perceived parenting styles, depersonalisation, anxiety and coping behaviour in adolescents. *Personality and Individual Differences*, 34(3): 521–532.
- [11] Yaffe, Y. 2021. Students' recollections of parenting styles and impostor phenomenon: The mediating role of social anxiety. *Personality and Individual Differences*, 172: 110598.
- [12] You, X. 2024. Social relationship perspective on adolescent psychological crisis. *China Basic Education*, 4: 89–95.