

# NON-PHARMACOLOGICAL INTERVENTIONS FOR ADHD IN CHILDREN AND ADOLESCENTS



**TOGETHER**



Attention-deficit/hyperactivity disorder (ADHD) is a common neurobehavioral condition that affects children and adolescents and is often present from early childhood. Its impact frequently continues beyond adolescence and may persist into adulthood.

It is therefore important to highlight effective non-pharmacological interventions that support children and adolescents with ADHD.

These approaches typically focus on behavioral, educational, and lifestyle modifications aimed at improving self-regulation, attention, and social skills. Key strategies include behavioral management, confidence-building, organizational skills training, parent education, physical exercise, mindfulness practices, and dietary adjustments. ADHD can significantly affect a child's academic performance and social development.

Moreover, the condition can have substantial economic implications. It has been estimated that the adjusted additional annual cost associated with ADHD per individual is approximately \$949.24, and the total cross-sector costs related to ADHD in the United States may exceed \$52 billion. The role of the primary care physician (PCP) is not limited to diagnosis and medication management.



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It also includes referring families to appropriate educational and behavioral support resources. While medication has traditionally been the cornerstone of ADHD treatment, non-pharmacological interventions are increasingly showing promising results.

Since 2018, a growing body of evidence has supported the use of psychosocial treatments for children and adolescents with ADHD. A variety of interventions can be recommended, including:



- Structured upbringing and organization: Creating structured routines and organizing the child's daily life in ways that support the challenges associated with ADHD.
- Behavior management interventions: Parent training programs, classroom strategies, and peer-based interventions designed to reinforce positive behaviors.
- Training-based interventions: Cognitive training, neurofeedback, organizational skills training, and cognitive behavioral therapy (CBT).
- Physiological approaches: Regular physical activity and exercise.

More specifically, effective non-pharmacological strategies include:

- Behavioral Therapy: Cognitive behavioral therapy (CBT) and parent training programs are highly recommended to help manage symptoms and improve daily functioning.
- Educational and Organizational Training: Teaching organization, time management, and planning skills helps children manage schoolwork and daily responsibilities more effectively.
- Physical Activity and Exercise: Regular exercise, including structured sports or martial arts, can improve attention, reduce impulsivity, and help regulate energy levels.

- **Mindfulness and Relaxation Practices:** Activities such as yoga, meditation, and breathing exercises support emotional regulation and concentration.
- **Dietary Considerations:** Although not a primary treatment, some evidence suggests that reducing processed foods, identifying possible food sensitivities, and increasing omega-3 fatty acid intake may be beneficial.
- **Biofeedback and Neurofeedback:** These techniques aim to help children learn to regulate their brain activity and improve attention control.
- **School–Home Collaboration:** Consistency between home and school environments is essential for reinforcing positive behaviors and supporting learning.
- **Routine and Structure:** Maintaining consistent daily routines can reduce chaos and help children stay organized and focused.
- **Positive Reinforcement:** Rewarding appropriate behaviors, such as sharing or completing tasks, is generally more effective than focusing solely on punishment.

ADHD is a chronic condition that can affect functioning across the lifespan. As a result, it often requires a multimodal treatment approach. Numerous studies suggest that non-pharmacological interventions can play an important role in the overall management of ADHD. Although many parents explore integrative approaches, including complementary therapies, research findings remain mixed. Further studies are needed to better understand the effectiveness of mind-body therapies, herbal treatments, and other integrative interventions in ADHD management.

## References:

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