

[The Benefits of Exercise On Your Kid's Brain](#)

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When kids play tag or engage in sports and other vigorous physical activity, not only do they make their bodies become fit, they are also making themselves smart. Exercise has many good effects on the brain, not only for adults, but also and more importantly, for kids. According to Phil Tomporowski, exercise science professor at the University of Georgia, exercise has “a more long-lasting effect on brains that are still developing.”

The following are findings on how exercise help your kids become smart:

- Exercise increases the flow of blood to the brain. The blood delivers oxygen and glucose, which the brain needs for heightened alertness and mental focus. Because of this, exercise makes it easier for children to learn.
- According to U.S. researchers, exercise builds new brain cells in a brain region called dentate gyrus, which is linked with memory and memory loss. According to John Ratey MD, an associate professor of psychiatry at Harvard Medical School, exercise also stimulates nerve growth factors. "I call it Miracle-Gro for the brain," he says. People who exercise regularly have improved short-term memory, exhibit faster reaction time, and have higher level of creativity.
- Also according to John Ratey, exercise builds up the body’s level of brain-derived neurotrophic factor or BDNF. BDNF causes the brain’s nerve cells to branch out, join together and communicate with each other in new ways, which leads to your kid’s openness to learning and more capacity for knowledge.

- Psychologists in the [University of Illinois at Urbana-Champaign](#) studied how exercise affects the actual shape and function of the children's brain. They found that fit children scored better in a series of cognitive challenges and the kids' MRI showed a significantly larger basal ganglia, a key part of the brain that aids in maintaining attention and “executive control,” or the ability to coordinate actions and thoughts crisply.
- A separate study by the same institution finds that fit children also have bigger hippocampi. To do complex thinking, the hippocampus and basal ganglia regions interact in the human brain structurally and functionally.
- Activities that involve balance and jumping activities like jumping rope strengthen the vestibular system that creates spatial awareness and mental alertness. This provides your kid with a framework for reading and other academic skills.
- According to many studies, [stress damages the kid's brain](#). Exercise reduces stress by placing the brain into homeostasis and contributing to the balance of the body's chemistry, electrical and organ systems. Its effect is similar to taking anti-depressant medications.
- Studies in University of Illinois have shown a strong relationship between fitness scores and academic achievement among primary school children.
- A research by Oppenheimer Funds shows that kids who participate in organized sports learn confidence, teamwork and leadership. Eighty one percent of women business executives played team sports as girls.
- A Swedish [study](#) shows that cardiovascular fitness is associated with cognition in young adulthood. The research hypothesize that aerobic exercise produce specific growth factors and proteins that stimulate the brain.
- Exercise increases your child's strength, flexibility and endurance. This gives your kid the confidence to go through the physical challenges of childhood such as being able to run to catch the school bus, carry heavy books, and bend to tie his shoes.

The following are tips to make kids active:

1. **Make fitness a priority in your home.** Set limits on watching TV, playing video games, and being in the internet.
2. **Make fitness fun.** Engage your kids in fun sports or other games which he loves. Also, don't limit your kid to playing traditional sports. There are video games like Dance Dance Revolution that can be played actively.
3. **Encourage your kid to walk.** Don't use the car if you and your kid are going to places where you can walk to. Look for opportunities to walk, find places to stride like a mall, and stairs to climb. Build your kid's walking muscles so that distances that used to be far for him will feel near. Make your child get used to and love walking. This will benefit him throughout his life.
4. **Encourage your kid to run.** Teach him the joys of jogging. Run with your kid, or make it a social activity, with friends or relatives.
5. **Encourage your kid to use wheels.** Not wheels of a car, but bikes, scooters, rollerblades or skateboards (make sure they have adequate protection like helmet, elbow pads, long pants). On his next birthday, give him one of these gifts instead of another video game.
6. **Encourage your kid to dance.** Dancing is one thing some kids enjoy more than conventional exercise.
7. **Encourage some competition.** If your kids have other family members or friends, make them compete with each other in a fun way. For example, there's always the running race (give the younger kid a distance advantage), but you can think of other creative contests like who can do the most jumping jacks, skipping rope, etc.
8. **Go to regular outings.** Take a hike. Explore a nearby park. Enjoy the outdoors. Remember to bring a ball or a frisbee.
9. **Don't be too strict about an active life.** Although a regular routine of being active is what's best, perfection is not your goal. When your kid has a busy day, try to get him to do his best to be active, but if this is not possible, schedule longer activity days when he has more time.
10. **Set example to kids by being active yourself.** Engage in a lot of walking, running, biking or playing sports.
11. **Parents of teens should be cautioned against having their kids play contact sports like football.** According to Dr. Robert Cantu, chairman of the Department of Surgery at Emerson Hospital and co-

director of the Center for the Study of Traumatic Encephalopathy at the Boston University School of Medicine, kids under the age of 14 should not be involved in collision sports. Teenagers who played contact sports often already show signs of chronic traumatic encephalopathy, or CTE, a degenerative brain disease caused by multiple blows to the head. The symptoms are personality changes, memory loss, depression, even dementia.