



Adolescent Brain Cognitive Development

Teen Brains. Today's Science. Brighter Future.

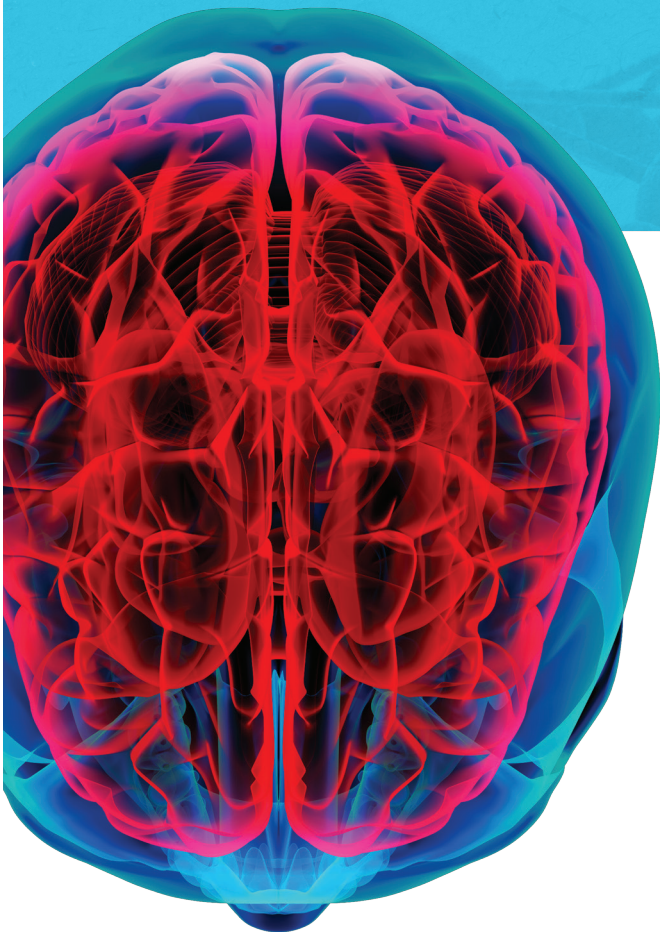
WHAT IS THE ADOLESCENT BRAIN COGNITIVE DEVELOPMENT (ABCD) STUDY?

ABCD is a landmark study on brain development and child health supported by the National Institutes of Health (NIH). This project will increase our understanding of environmental, social, genetic, and other biological factors that affect brain and cognitive development and that can enhance or disrupt a young person's life trajectory.

HOW WILL THE ABCD STUDY BE IMPLEMENTED?

Unique in its scope and duration, the ABCD study will:

- Recruit 10,000 healthy children, ages 9 to 10 across the United States, and follow them into early adulthood.
- Use advanced brain imaging to observe brain growth with unprecedented precision.
- Examine how biology and environment interact and relate to developmental outcomes such as physical health, mental health, and life achievements including academic success.



WHY DO WE NEED THE ABCD STUDY?

Adolescence is a period of dramatic brain development in which children are exposed to all sorts of experiences. Yet, our understanding of precisely how these experiences interact with each other and a child's biology to affect brain development and, ultimately, social, behavioral, health, and other outcomes, is still incomplete. As the only study of its kind, the ABCD study will yield critical insights into the foundational aspects of adolescence that shape a person's future.

WHAT WILL WE LEARN FROM THE ABCD STUDY?

The size and scope of the study will allow scientists to:

- Identify individual developmental trajectories (e.g., brain, cognitive, emotional, academic) and the factors that can affect them.
- Understand the role of genetic vs. environmental factors on development.
- Examine the effects of physical activity, screen time, and sleep, as well as sports and other injuries, on brain development and other outcomes.
- Study the onset and progression of mental disorders.
- Determine how exposure to substances (e.g., alcohol, marijuana, nicotine, caffeine) and new ways of taking them (e.g., vaping, dabbing) affect developmental outcomes and vice versa.
- Understand the impact of changing state and local policies and laws (e.g., marijuana, tobacco, alcohol) on youth drug use and related health and development.



Locations of ABCD Research Sites in the United States

	Coordinating Center	University of California, San Diego
	Data Analysis and Informatics Center	University of California, San Diego
	Research Sites	Children's Hospital of Los Angeles Florida International University Laureate Institute for Brain Research Icahn School of Medicine at Mount Sinai Oregon Health & Science University SRI International University of California, Los Angeles University of California, San Diego University of Colorado University of Florida University of Hawaii at Manoa University of Michigan University of Minnesota University of Pittsburgh University of Utah University of Vermont Virginia Commonwealth University Washington University in St. Louis Weill Medical College of Cornell University

