EXPLORING THE GENETICS BEHIND IQ
Genetics plays a role in human intelligence but perhaps not as big of a role as most people think. That’s the conclusion drawn by Richard Nisbett, PhD, a social psychologist at the University of Michigan. His research indicates that culture, social class and education also shape intelligence.

In his book “Intelligence and How to Get It: Why Schools and Culture Count” (2009), Nisbett uses evidence drawn from neuroscience and genetics, as well as from studies of educational interventions and parenting styles, to counter decades of research that he claims give too much credit to the role of genetics in intelligence.

“We know … middle-class children are much more likely to get a good education,” Nisbett says, “and to think that this [socioeconomic factor] makes no difference in intelligence seems impossible.”

One of the classic theories he deconstructs through his research is that identical twins adopted by separate families can end up with similar IQs and academic achievements due to genetics. He debunks this theory by arguing that adoptive environments tend to be quite similar in terms of affluence and culture. When you look at twins raised in very different environments, Nisbett says, the correlation decreases dramatically.

Though it is their environments that make the twins similar, this similarity often gets credited to heredity.

EDUCATION IN ALL ENVIRONMENTS
There are many physical and psychological strategies caregivers can use to expand kids’ minds and contribute to their IQs, such as breastfeeding and reading and simply talking to them. However, a wide body of research shows that parents with higher socioeconomic status tend to do more than working-class parents to encourage intellectual development in their children.

Nisbett points to the educational system as the potential intellectual equalizer.

By providing better training and more competitive compensation, schools can retain a teaching workforce equipped to provide students with the cognitive stimulation they need to thrive intellectually. One example Nisbett cites is a shift in instructional method. Rather than point out errors in students’ work, research shows that it is more effective to let students continue to work and ask questions, forcing strategic thinking that allows them to uncover their own mistakes.

“Working your way out of a box you got into is a more effective way to learn,” Nisbett says.

BACK TO THE BOOKS
In addition to promoting a stronger educational system, Nisbett is a passionate advocate for more rigorous and experimental education research, much of which is currently anecdotal rather than evidence-based. The U.S. Department of Education’s What Works Clearinghouse for education research is a terrific start, he says, but he would like to see entities such as this grow stronger.

“We need an FDA [Food and Drug Administration] for education research,” he says.