MIND Institute Statement on Vaccines and Autism

Baby boomers are the last generation in the United States to have witnessed the devastation of rubella epidemics. Before development and widespread dissemination of effective vaccines in 1969, rubella epidemics occurred every six to nine years. In the United States, the last of these was in 1964 and infected an estimated 10 percent of pregnant women. There were at least 12.5 million cases of rubella with more than 13,000 fetal or early infant deaths, 20,000 infants born with major congenital defects, and 10,000 to 30,000 infants born with moderate to severe medical and cognitive consequences of the epidemic (Duszak, 2009). Stella Chess, a Child Psychiatrist at New York University, studied 243 children exposed to rubella during pregnancy and found that 37 percent of them had intellectual disability. Of these, 7 percent were also diagnosed with autism, suggesting that rubella is a cause of some cases of autism (Chess, 1971). It has been estimated that through the use of the Measles, Mumps and Rubella (MMR) vaccine between 2001 and 2010, more than 1,200 cases of rubella-caused autism were prevented in the United States (Berger, Navar-Boggan, & Omer, 2011).

Many parents have expressed concern that the MMR vaccine may actually be a cause of autism. This concern was prompted by flawed research that has been retracted from the scientific journal in which it was published and by most of the paper's authors. But because of parental concerns, many subsequent studies have examined potential links between the MMR vaccine and autism, using many different methodologies, from studies of the human gastrointestinal and immune systems, to animal models, to large-scale epidemiological studies. None has found a link. One recently published review of previous epidemiological studies that together analyzed more than 14 million children found no evidence of an association between MMR vaccination and autism (Demicheli, Rivetti, Debalini, & Di Pietrantonj, 2012). This is not to say that there aren't some adverse responses to vaccination. Like all medical interventions, immunizations are not completely without risk. But, as confirmed by the U.S. Institute of Medicine (Stratton, Ford, Rusch, & Clayton, 2012), there is no evidence that the MMR vaccine causes autism. It is also important to point out that there is increased evidence that verifiable causes of autism generally affect the individual during fetal life, and the biological changes are seen prior to vaccination and to the emergence of the behavioral signs of autism (Nordahl et al., 2011).

The MIND Institute was established to carry out research on neurodevelopmental disorders with the goal of decreasing disabilities. We have evaluated the evidence and do not believe that investing in vaccine research is a productive use of limited resources. But we are also concerned that an increasing number of families are refusing vaccination in the hope that this will protect their children from autism. We believe that this practice is doing just the opposite – exposing children to vaccine-preventable disorders that evidence has shown can be deadly and that can, in fact, cause autism. We highly encourage parents to discuss vaccinations with their children's health care provider and to use these highly effective medical interventions, because there is no scientific evidence that they cause autism.

SEP-2017

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