

TESTIMONY OF THE MAINE MEDICAL ASSOCIATION

IN SUPPORT OF

**ESTABLISHING BISPHENOL A AS THE FIRST PRIORITY
CHEMICAL IN MAINE ACCORDING TO L.D. 2048 SECTION 1694
SUBSECTION 1.**

Board of Environment Protection
Holiday Inn and Ground Round, Augusta, Maine
1:00 pm, Thursday, August 19, 2010

Good Afternoon Chairwoman Lessard, and members of the Board of Environmental Protection. My name is Mariah Gleaton, and I am an intern at the Maine Medical Association (MMA). I am here to give testimony on behalf of Dr. Norma Dreyfus and the Maine Medical Association. The Maine Medical Association is a statewide professional organization representing more than 3,300 physicians, residents, and medical students in Maine whose mission is “to support Maine physicians, advance the quality of medicine in Maine, and promote the health of all Maine citizens.” Dr. Dreyfus is a practicing Pediatrician and the Chair of the MMA’s Public Health Committee. The exposure of children to various toxic chemicals and the impacts that these chemicals have on the health of children has been discussed at length in the Public Health Committee deliberations. The MMA is pleased to endorse the Maine Department of Environmental Protection’s choice in establishing Bisphenol A (BPA) as the top chemical of concern based on the specific direction provided to the Department by the Maine Legislature.

BPA has been implicated as an endocrine disrupting chemical (EDC) at *low doses* and seen to have impacts on neuropsychological development. As an endocrine disruptor, BPA interferes with normal hormonal balance, especially in developing fetuses and infants, who are so vulnerable to the effects of both natural and synthetic hormones (1). The effects of BPA are fairly pervasive and include effecting receptors involved in metabolism, obesity and brain signaling. Some studies have linked BPA to breast and prostate cancers, diabetes, obesity, learning disabilities, and reproductive health problems.

The Center for the Evaluation of Risks to Human Reproduction concluded in 2008 that there is “*some concern* for effects on the brain, behavior, and prostate gland in fetuses, infants and children at the current human exposures to bisphenol A” (2).

We know that BPA is found in body fluids at levels that are biologically active and endocrine disruptors have even been found in amniotic fluid and breast milk. There is also an implication that endocrine disrupters affect DNA.

In 2009 the Endocrine Society published in their position statement that they held a *strong concern* for endocrine disruptors (1). Although the Endocrine Society realized that the science was not yet conclusive and further research was necessary, it recognized that the science available was still controversial. The implicated effects of EDCs takes years to manifest in an exposed child that grows into adulthood, and there are many other compounding variables. However, the Endocrine Society supported the position that “until such time as conclusive scientific evidence exists to either prove or disprove harmful effects of substances, a precautionary approach should be taken in the formulation of EDC policy.”

This approach called the *precautionary principle* involves “a willingness to take action in advance of scientific proof [or] evidence of the need for the proposed action on the grounds that further delay will prove ultimately most costly to society and nature, and, in the longer term, selfish and unfair to future generations” (3). In looking back at policy in the past it parallels the experience that Maine had with the heavy metal lead. It took many generations of severely damaged children before regulation came into play. Dr. Dreyfus writes from personal experience: I will never forget the children lying stiffly in their hospital cribs, backs arched, with intractable seizures from lead exposure.

Although the toxicity to the growing child of even low levels of lead was suspected, it was years before public policy came into play limiting exposure. During those years, many children, their families, and society as a whole suffered and continue to suffer from the childrens’ neurological and behavioral injury.

There is enough evidence *now* to suggest that Bisphenol-A poses the potential to cause grave harm to our most vulnerable population, our children, and it would be most appropriate to designate it as a priority chemical, which would allow action to be taken to eliminate the use of this chemical where children may be exposed.

Thank you for considering the views of the MMA on designation of BPA as a priority chemical. I would be pleased to answer any questions that you might have.

Mariah Gleaton, Intern
Norma Dreyfus, MD
Chair, Maine Medical Association Public Health Committee

References

1. The Endocrine Society Position Statement: Endocrine-Disrupting Chemicals, June 2009
2. National Toxicology Program, US Department of Health and Human Services, Center for Evaluation of Risks to Human Reproduction, NTP-CERHR Monograph on the Potential Human Reproductive and Developmental Effects of Bisphenol. September 2008. NIH Publication No. 08-5994.
3. Interpreting the Precautionary Principle, Edited by Tim O'Riordan and James Cameron; Earthscan Publications Ltd, 1994. ISBN 1-85383-200-6 Available from Island Press