

Partnership on Flame Retardant Alternatives to Hexabromocyclododecane (HBCD)

Scope Statement:

EPA has issued an Existing Chemical Action Plan for the flame retardant hexabromocyclododecane (HBCD)¹. The Plan includes a Design for the Environment (DfE) multi-stakeholder alternatives assessment that will aid users in selecting safer alternatives to HBCD. The partnership on flame retardant alternatives to HBCD will identify viable² alternatives to HBCD, evaluate their human health and environmental profiles, and inform decision making as organizations choose safer alternatives to HBCD. The primary use for HBCD is for expanded polystyrene (EPS) and extruded polystyrene (XPS) foam insulation. While the project scope will not include alternatives to HBCD for its minor uses in textile back coatings (approximately 2-3% of total HBCD use)³ and high impact polystyrene (HIPS) used in electronics housings (approximately 4% of total HBCD use)⁴, stakeholders interested in alternatives for these uses may refer to the flame retardants assessed in the Partnership on Alternatives to Decabromodiphenyl Ether (decaBDE)⁵.

The assessment will provide comparative hazard information (human toxicity, ecotoxicity, environmental fate) on flame retardants that are viable alternatives to HBCD. Viable alternatives are those that may have similar performance and function to HBCD when used in building insulation. While the report will not attempt to include comprehensive life cycle assessment information, it will include relevant life-cycle considerations, other relevant information and a general overview of potential alternative materials that may aid in the selection of alternatives to HBCD. The information provided by this Partnership will help stakeholders select preferable alternatives to HBCD. The report will not recommend specific flame retardants or alternative materials.

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http://www.epa.gov/oppt/existingchemicals/pubs/actionplans/RIN2070AZ10_HBCD%20action%20plan_Final_2010-08-09.pdf.

² Viable refers to the functional performance of a chemical, not the environmental preferability.

³ Great Lakes Solutions

⁴ Great Lakes Solutions

⁵ <http://www.epa.gov/dfc/pubs/projects/decaBDE/index.htm>