Monsanto

SPECIALTY CHEMICALS DIVISION

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Dr. George Wallis
P.R. Mallory Company
Laboratory for Physical Science
Northwest Industrial Park
Third Avenue
Burlington, MA 01803

Dear Dr. Wallis:

I have reviewed your economic impact positionpaper and suggest the following changes:

Page 1, Paragraph 3 - Change word "nonflammability" to "fire resistance"

Page 1, Paragraph 4, 5 and Page 2, Paragraph 6 --- be revised as follows:

"PCBs have been discovered to have a widespread distribution in the environment and some environmental occurrences have been associated with adverse effects on certain forms of animal life. Beginning in 1971, the Monsanto Company, the sole U.S. producer, voluntarily reduced the volume of PCB production and restricted the use of its PCBs solely to closed electrical systems, for which no viable alternate existed. In January 1976 Monsanto announced that it intends to phase out the production of PCBs as soon as they are satisfied that the electrical power supply industry's need for usable, acceptable alternative dielectric fluids has been met.

"Although a tremendous effort has been expended to find an alternative, no product has yet to be developed which equals the critical characteristics of PCBs' fire resistance, dielectric properties and stability. With the pronouncements

of EPA to ban the use of PCBs and the announcement of Monsanto, time is running out on finding an alternative fluid.

"Monsanto has developed an alternative capacitor fluid identified as MCS 1238, which is equivalent to PCB in all respects except fire resistance. Dow also has developed a capacitor fluid, Dow XFS 4169 L, which appears to only be suitable for power capacitors. Other companies such as Exxon and Prodelac have offered alternative fluids.

"In reviewing the impact of using an alternative fluid, the most obvious economic impact is the high cost per pound of the fluid. These higher costs are due to cost of raw materials, new facilities, safety and environmental testing and other costs now associated with the introduction of a new chemical into the marketplace. It is estimated, for example, that Monsanto's MCS 1238 and Dow's XFS 4169 L will cost twice as much as Aroclor 1016, the commonly used PCB for capacitors. It is not expected that the cost would drop over the next few years."

I understand that David Wood discussed the economics of MCS 1238 and you may want to revise your calculations.

If we can be of any more help, please let us know.

Sincerely yours,

J. Coleman Weber

J. Coleman Weber, Manager
Product Acceptability

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