Arochlors

File	
Destroy	
CDB	
JTG	
[illegible]	
[illegible]	
[illegible]	
RAM	
EPW	

June 5, 1968

Mr. Wayne Thornburg, Manager
Organic Chemistry Research
California Packing Corporation
Plant No. 554
4204 Hollis Street
Emeryville, California 94608

Dear Mr. Thornburg:

We do not have any subacute oral toxicity on the chlorinated biphenyls. We have, however, carried out a 90-day subacute oral toxicity test on Aroclor 5460, a chlorinated terphenyl, on rats. These were fed at 100, 300, and 1000 ppm. The 300 ppm group was entirely negative. The 1000 ppm group showed some change in the liver to body weight. Microscopic pathology findings in all groups were normal.

Tests comprising 18 weeks were carried out with chickens with the same compound at levels of 500, 1000, and 2000 ppm. There seemed to be a drug related effect on mortality on the dose levels of 1000 and 2000 ppm.

All our work on chlorinated biphenyl has been either by inhalation or by skin absorption because the compounds are not intended to be taken internally. I attach a Hygienic Guide series reprint on the chlorinated diphenyls. The long-term study on inhalation is No. 3, by J. F. Treon. In addition, I attach a summary of our unpublished data on the chlorinated diphenyls when applied to the skin of rabbits.

If you will let me know what your particular planned use of the Aroclors is, I might be more helpful.

Sincerely,

R. Emmet Kelly, M. D.
Medical Director

REK/ln

DSW 018315

STLCOPCB4004859

UNPUBLISHED DATA

20 Day Subacute Dermal Toxicity to Rabbits

Aroclor 1221

LD_{50} 250 mg/kg/day
No adverse effect on body weight, local skin reactions, hematology, urine analysis, or gross or micropathologic findings

Aroclor 1242

LD_{50} 75 mg/kg/day
Slight adverse effect on body weight at 75 mg/kg/day. None at 50 mg/kg/day
No adverse effects locally on skin, hematology, urine analysis, or gross or micropathologic findings.

Aroclor 1268

LD_{50} 1250 mg/kg/day
Moderate to severe adverse body weight effects at 1500 and 2000 mg/kg/day. Slight at 1000 and none at 500 mg/kg/day.

Local skin reactions were slight erythema, subdermal hemorrhages, drying, wrinkling and fissuring from all doses (500-2000 mg/kg/day).

There were no adverse effects on hematology or urine analysis.

No gross pathologic effects at 500 or 1000 mg/kg but 1500 and 2000 mg/kg/day produced liver discoloration (lighter).

No micropathologic effects at 500 or 1000 mg/kg/day but moderate hepatic necrosis from the 1500 and 2000 mg/kg/day doses.

STLCOPCB4004860