

DOCKET NUMBER
PROD. & UTIL. FAC. 50-329, 330

REILLY, LIKE AND SCHNEIDER
COUNSELLORS AT LAW
200 WEST MAIN STREET
BABYLON, N. Y. 11702

MOHAWK 9-3000

CABLE ADDRESS
RELIK

IRVING LIKE
BERNARD J. REILLY
WILBUR H. SCHNEIDER
GEORGE HOFFMAN
EDWARD A. BROOKS JR.
PAUL H. ADES
ENRICO CONSTANTINO

June 21, 1972

Hon. Arthur W. Murphy, Chairman
Atomic Safety and Licensing Board
Columbia University School of Law
Box 38, 435 West 116th Street
New York, N.Y. 10027

THIS DOCUMENT CONTAINS
POOR QUALITY PAGES

Re: In the Matter of Consumers Power Company
Midland Plant, Units 1 and 2
Docket Nos. 50-329 and 50-330

Dear Chairman Murphy:

During Dr. Sternglass' testimony on June 15, 1972, he referred to a letter written by Prof. Morris H. DeGroot, Professor of Mathematical Statistics & Head, Department of Statistics, Carnegie-Mellon University bearing upon Dr. Sternglass' hypothesis that exposure of a population to radioactive gaseous discharges at the levels currently being observed from the Dresden plant increases the infant mortality rate for that population.

The letter referred to by Dr. Sternglass is the enclosed copy of Professor DeGroot's letter of October 20, 1970 to Senator Edwin G. Holl, Chairman of the Select Committee Investigating Nuclear Power Plant Construction, State Capitol Building, Harrisburg, Pa. Dr. DeGroot states: (p. 2)

"After having carried out the statistical analyses mentioned herein, I believe that there is substantial probability that this hypothesis is correct and that increased exposure to radioactive discharges does cause an increase in the infant mortality rate."

Mapleton intervenors respectfully request that the enclosed letter be received in evidence, not for the truth of Dr. Sternglass' hypothesis, but as evidence of the belief of Dr. DeGroot that there is substantial probability that such hypothesis is correct.

Respectfully yours
REILLY, LIKE & SCHNEIDER

Irving Like

IL:mc
Enc.
copy to: 8007240 546
ASLB members
Secretary
All counsel of record

Carnegie-Mellon University

Department of Statistics
Schenley Park
Pittsburgh, Pennsylvania 15213
(412) 621-2500

BOOKLET NUMBER
PROD. & UTIL. FAC. 50-329,330

October 20, 1970

Senator Edwin C. Holl
Chairman of the Select Committee Investigating
Nuclear Power Plant Construction
State Capitol Building
Harrisburg, Pennsylvania



Dear Senator Holl:

I have recently had the opportunity to examine data pertaining to the Dresden nuclear power plant near Morris, Illinois, a plant of the boiling water type. These data were collected in order to study the question of whether there is a relationship between the infant mortality rate among people living in a given location and the amount of exposure of those people to radioactive gaseous discharges from the Dresden plant. Two types of data were examined:

1. The first type pertained to the entire state of Illinois. The annual infant mortality rates in the states of Illinois and New York were compared for the ten-year period from 1959 to 1968. For the last six years of this period, the differences between the rates in Illinois and New York were also compared with the amounts of radioactive gases that were discharged annually from the Dresden plant. A statistical analysis was carried out to determine whether excessive infant mortality in Illinois was related to excessive discharges from the Dresden plant.
2. The second type of data pertained to individual counties in the state of Illinois. For each of several counties, the infant mortality rate for the years 1964 and 1965 was noted, and the percent change in this rate was recorded. These changes were then compared for counties adjacent to the site of the Dresden plant (excluding Grundy County in which the reactor is located) and counties

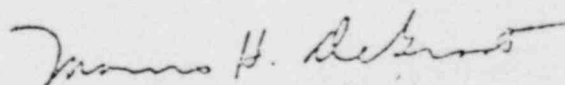
further away from the plant. In each adjacent county, the relative exposure of the population to the discharges of the Dresden plant was also determined from prevailing wind directions. A statistical analysis was again carried out to determine whether excessive infant mortality in certain counties was related to excessive exposure of those counties to discharges from the Dresden plant.

At the present time, a certain segment of the scientific community maintains the hypothesis that exposure of a population to radioactive gaseous discharges at the levels currently being observed for the Dresden plant increases the infant mortality rate for that population. After having carried out the statistical analyses mentioned here, I believe that there is substantial probability that this hypothesis is correct and that increased exposure to radioactive discharges does cause an increase in the infant mortality rate.

Of course, these statistical analyses can neither prove nor disprove the hypothesis, but they can increase or decrease the probability that the hypothesis is correct. Indeed, large-scale statistical studies based on some of the vast amounts of data, that are presently available could go far toward bringing the scientific community into agreement on this question.

I strongly urge that further studies be carried out before any decision is reached with regard to the construction of nuclear power plants in Pennsylvania. Such studies, performed by biological, physical, and medical scientists, together with statisticians, could provide information that will be of great help in reaching decisions that might vitally affect all Pennsylvanians.

Sincerely yours,



Morris H. DeGroot
Professor of Mathematical Statistics
and Head, Department of Statistics