

Dr. Philip Handler, President
National Academy of Sciences
Washington, DC 20418

Dear Doctor Handler:

Several of the scientific reports presented at this year's Gordon Research Conference on Nucleic Acids (June 11-15, 1973, New Hampton, New Hampshire) indicated that we presently have the technical ability to join together, covalently, DNA molecules from diverse sources. Scientific developments over the past two years make it both reasonable and convenient to generate overlapping sequence homologies between DNAs of, for example, bacteria and animal viruses. Such sequence homologies can then be used in order to combine the diverse molecules by Watson-Crick hydrogen bonding. Application of existing methods then permits covalent linkage of such molecules. In this way new kinds of viruses with biological activity of unpredictable nature may eventually be created.

Certain of these hybrid molecules are potentially hazardous to both laboratory workers and the public. This possibility was recognized and agreed upon by a majority of those attending the Conference, who voted to communicate their concern to you and to the President of the National Academy of Medicine (to whom this letter is also being sent). We suggest that the Academies establish a study committee of appropriate individuals to consider this problem and to recommend specific actions or guidelines should that seem necessary. Related problems such as the risks involved in current large-scale preparation of animal viruses might also be considered.

A list of participants in the Conference is attached for your interest.

Sincerely yours,

Maxine Singer
National Institutes of Health
Room 9N-119, Building 10
Bethesda, MD 20014

Maxine Singer
Dieter Soll
Co-Chairmen

Dieter Soll
Associate Professor of Molecular
Biophysics
Yale University
New Haven, CT 06520