UNIVERSITY of PENNSYLVANIA

PHILADELPHIA 4

The College

ZOOLOGICAL LABORATORY 38th St. and Woodland Ave.

March 5, 1952

Dr. Joshua Lederberg
Department of Genetics
College of Agriculture
The University of Wisconsin
Madison 6, Wisconsin

Dear Dr. Lederberg:

Thank you for your letter of February 28th. Dr. Hutchinson shares your skepticism about the reliability of the evidence being offered for chromosomes in bacteria. My interest is from the following point of view. In organisms higher than bacteria in which definite nuclei are seen, these nuclei divide by mitosis with the formation of chromosomes. In all higher organisms, most of the genetics is correlated with the behavior of the chromosomes and sex (syngamy) is also tied up with the chromosomes. If it can be shown that bacteria have chromosomes, then these chromosomes can be thought of as the vehicle for the behavior of the genes, thus placing the bacteria in harmony with higher organisms. If the genetics of bacteria is an indication of sex, then the demonstration of chromosomes could be considered important additional evidence for sex in bacteria. I believe that De Lamater has very good evidence for mitosis and, therefore, for the evidence of chromosomes. However, I do not want to push this point against the opposition of both Dr. Hutchinson and yourself. Dr. Hutchinson thought a final decision might await the presentation of papers at the forthcoming meeting of the S. A. B. Suppose we let the matter rest until after the meetings of the S. A. B.

Most sincerely yours,

JHWEnnih

D. H. Wenrich

DHW: sc