



DIVISION OF NATURAL SCIENCES  
THIMANN LABORATORIES

SANTA CRUZ, CALIFORNIA 95064

March 28, 1977

Professor Joshua Lederberg  
Dept. of Genetics  
The School of Medicine  
Stanford University  
Stanford, CA 94305

Dear Josh:

I am afraid I cannot add much to your material on Tatum nor answer most of your questions. I think some light is shed on Tatum's decision to go into the fly eye pigments by the fact that Beadle and I at Harvard, in the year before Beadle went to Stanford, developed a quantitative method for assaying the  $v^+$  hormone in small quantities. It had been deduced to be a diffusible substance, but we were able to get it in extracts and to quantify the effect on the eye color. In fact we published a paper on this (PNAS 23 143-146, 1937). Beadle got very stimulated by this rather simple development and saw that an exciting project could be worked up, using active extracts. I think it was in this way that he communicated his excitement to Tatum and persuaded the latter to go in with him. It was indeed too bad that after they had got Haagen Smit to collaborate on the isolation of the  $v^+$  substance that they should have been preceded in publication. The work was very well done and the result must have been very disappointing.

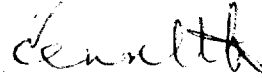
In regard to the *Drosophila* work, you might have mentioned that Tatum did an important job of working out the nutrient requirements. At that time very little was known about this and the flies had been grown on a yeast medium since the early days. He identified several B vitamins as necessary for the growth of the larvae (PNAS 25, 490-497, 1939).

Another point you raise is the question about the work on *Penicillium*. There was a report on this work; you will find it in *J. Bact.* 49, 101-104, 1945. In this work, however, Tatum's collaboration is not mentioned (at least in the authorship); they extended the previous methods to larger scale procedures, but did not make important changes. From the fact that Tatum's name is not on the authorship I suspect that he was only peripherally involved in this rather routine job. Why Tatum went to Yale I never did understand (marital affairs, perhaps?). I felt that he had a good future at Stanford. However, as it happened, Beadle left shortly thereafter and no harm was done.

Incidentally, it was my memory that at Cal Tech Beadle was very scornful of Lindegren's work on Neurospora; it was only later that he began to take it more seriously.

I wish you luck with the write-up, and am sorry I can not help more.

Yours sincerely,

A handwritten signature in cursive script, appearing to read "Kenneth V. Thimann".

Kenneth V. Thimann  
Professor of Biology