of the area's five most favored institutions. The distributional evils arising from such unbalanced screening panel membership have already received adequate consideration (*1*). Is there any possible justification for such unbalanced representation of the large institutions when an ample supply of scientists is available in the country's smaller colleges and universities?

Everything considered, the National Science Foundation does seem to be getting off to a good start. It has achieved a more equitable distribution of its research and fellowship awards than any other granting agency, public or private, up to now. As it settles into more formalized activity through the years, however, it must guard against domination by well-established cultural influences if it would achieve its basic goal—maximal development of scientific manpower in all areas of the nation.

The time may be at hand for transfer to the foundation of many of the National Institutes of Health grants-in-aid activities, perhaps along the lines recently announced by the director of the Biological Sciences Division, Office of Naval Research (*4*).

CLARENCE A. MILLS

Laboratory for Experimental Medicine
University of Cincinnati

References

1. MILLS, C. A. *Science*, **107**, 127 (1948).
2. *Ibid.*, **108**, 438 (1948).
3. DEIGNAN, S. L., and MILLER, E. *Ibid.*, **115**, 321 (1952).
4. REYNOLDS, O. E. *Am. Inst. Biol. Sciences Bull.*, **2**, 18 (1952).

Binucleate Cell Formation in *Melanoplus differentialis* Spermatocytes

THE spermatocyte cysts of the grasshopper testis contain many nuclei, each without a definite cell membrane. The formation of a binucleate cell has been recorded in the course of a time-lapse cinematographic study of cell division, in which Leitz phase-contrast equipment was used.

Spermatocytes in a dextrose-Belar solution in bicarbonate buffer, pH 7.0, were placed on a roto-compressor slide. One of the cells began to divide from a prophase stage, and the metaphase and anaphase stages passed in normal fashion. When early telophase was reached, there was a narrow tubular bridge between the two newly forming daughter cells. The nucleus in each cell developed a nuclear membrane. During the ensuing 6 hr the contracting cell membrane displaced part of the cytoplasm from one daughter cell to the other. In this phase the nuclei remained undisturbed. Finally, at the tubular bridge, between the two daughter cells, a piece of protoplasmic material resembling mitochondria was extruded from the cytoplasm. After this extrusion the narrow bridge began to expand and the cells came together, forming the binucleate cell.

In 1942 Beams and King (*1*) formulated a theory for such binucleate cell formation while they were studying fixed tissue from regenerating rat liver. This work confirms their theory. There may be other types of binucleate cell formation; this is one kind, however, that has been observed and recorded.

T. N. TAHMISIAN

Division of Biological and Medical Research
Argonne National Laboratory, Chicago

Reference

1. BEAMS, H. W., and KING, R. L. *Anat. Record*, **83**, 281 (1942).

Review of Medical and Veterinary Mycology

SINCE 1944, the Commonwealth Mycological Institute of England has been publishing an annual (now a semiannual) annotated bibliography of the world's literature on medical mycological subjects. The publication, entitled *Review of Medical and Veterinary Mycology,* is very complete in coverage and presents precise summaries of the articles reviewed. We of this laboratory have found the bibliography to be invaluable in keeping informed on developments in this active field of medicine. Undoubtedly, others who are not already acquainted with it will also find this publication to be of value.

It is sold at the nominal charge of 10s. annually. The first number appeared in 1944 (covering the year 1943) under the title *An Annotated Bibliography of Medical Mycology,* and single yearly issues have been published covering the years through 1950. Issues for the years 1943–48 are still available at 6s. each, and the 1949 and 1950 issues at 10s. each. Parts 1 and 2 of the 1951 issue are sold together at 10s.

We are urging those interested to support this publication in order that this service may continue and be utilized by a greater number of workers in medical mycology.

Orders and subscriptions should be placed with The Commonwealth Mycological Institute, Kew, Surrey, England.

LIBERO AJELLO*
LUCILLE K. GEORG
MORRIS A. GORDON

Mycology Unit, U. S. Public Health Service
Communicable Disease Center
Atlanta, Georgia

* The opinions expressed are those of the writers, and do not necessarily constitute endorsement by the U. S. Public Health Service.