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A SIMPLE METHOD FOR MAINTAINING PARAMOECIUM CULTURES IN THE LABORATORY OVER LONG PERIODS OF TIME*

J. R. Mundie, Norman, Oklahoma

An Erlenmeyer flask of 250 cubic centimeters capacity containing a hay infusion culture of Paramoecia accidently had a plug of absorbent cotton pushed into it. The culture was set aside in the laboratory on a shelf about twenty feet from a window. At intervals it was examined and Paramoecia were found to be present. As the water level fell slowly in the flask, the Paramoecia diminished in numbers. Distilled water was then added to within about two inches of the mouth of the flask and in a few days the culture showed a marked increase in number of Paramoecia The culture has continued for nearly ten years and still contains numerous Paramoecia.

A second flask was prepared about five years ago by placing a one-half inch layer of absorbent cotton in the bottom of a one liter Erlenmeyer flask and then filling it with hay infusion made from distilled water. Paramoecia were added from the culture described above. This culture continued for about three years with numerous Paramoecia. It was given practically no attention except once or twice a year when distilled water was added to replenish that which had evaporated.

In March 1936 a quart fruit jar was prepared with hay infusion and about two inches of absorbent cotton placed in the bottom. After three days Paramoecia were introduced from the culture described above. The glass top was turned upside down on the jar. Except for the addition of distilled water about September 1, 1936, it has been given no further attention. During the entire time (observations ceasing January 15, 1937), it has been teeming with Paramoecia.

An attempt was made to grow Amoeba proteus by placing about one-half inch of absorbent cotton on the bottom of a one-half liter Erlenmeyer flask. This was covered with an infusion made by boiling several grains of wheat in 300 cubic centimeters of distilled water. Several days later Amoebae were introduced into the culture. The culture was successful and Amoebae could be secured without difficulty from the surface of the cotton for a period of eighteen months. Several other attempts at culturing Amoeba proteus in a similar way have failed to yield specimens for a period of more than two or three months.

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