

avored by conditions associated with intermediate temperatures. No species was found which preferred cold water, but several forms became active in water which had been ice not more than one hour previously. Most species observed showed a wide range of tolerance to changes in temperature as well as in all the other environmental factors which were studied.

Two fundamentally different sequences of protozoan forms were observed at the ends of piers extending into the lake. Here, the planktonic fauna was markedly different from the fauna on the piles of the piers, although no measurable differences in environmental factors could be found.

It is concluded that: (1) most free-living Protozoa show wide ranges of tolerance to individual environmental factors, a fact also shown by the data of Noland² and of Wang;³ (2) most free-living Protozoa are affected by very slight changes in the physical and biotic conditions of the environment, in spite of the wide ranges of tolerances shown; (3) the sequence of protozoan species at any one place passes very quickly under natural conditions; (4) an abundance of food is very important for the distribution of most species of ciliates, as Noland² also found; it is also the major factor in the distribution of the saprozoic flagellates, but is not so necessary to other flagellated types, and it has not been shown to be important in the distribution of the amoeboid forms; (5) flagellates tend to react more directly to individual factors in the environment than do ciliates; amoeboid forms seem to be intermediate in this regard; (6) seasonal maxima in number of species occur approximately one month earlier in the spring and later in the fall in Oklahoma than is common farther north (see Wang³). This apparently shows that such maxima are controlled by climatic factors associated with the seasons.

A full report of this study will be published elsewhere.

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LEMNACEAE IN FLOWER

ON June 5, 1937, in a small pond north of St. Paul, Minnesota, *Lemna minor* L. was found in flower. About one thallus in ten had flowers. This colony continued to bloom for six weeks, the seed of the first flowers maturing about the time the last flowers appeared. Because of this find and the abundant rains in this area other *Lemnaceae* were watched and were found in flower as follows:

Spirodela polyrrhiza (L.) Schleid. in three ponds near Lake Minnetonka, the earliest flowers appearing on July 2, 1937.

² L. E. Noland, *Ecology*, 6: 437, 1925.

³ Chia Chi Wang, *Jour. Morph.*, 46: 431, 1928.

Lemna trisulca L. in a pond at Glenwood Park, Minneapolis, Minnesota, on July 10, 1937.

Lemna sp. in a small pool in a woodlands near Lake Minnetonka. The flowers were few, but germinating seeds and seedlings were found on July 27, 1937.

Wolffia punctata Griseb. with young flowers in a lake along the Minnesota river bottom on July 26, 1937.

Wolffia columbiana Karst. was found associated with *Wolffia punctata* and about as abundant; however, very few of the plants of this species were in flower on July 26. A few days later both species of *Wolffia* were found in flower in the Lake Minnetonka region.

This is the first report of *Wolffia* in flower in the state of Minnesota and may be the first report of this matter for the United States. Material of all these *Lemnaceae* is being collected with the intention of making morphological and cytological studies.

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GROWTH IN THE ADULT

SINCE the publication of my study on "Growth During Adult Life,"¹ a number of unexpected letters have reached me with reports of individual experiences in this line. Some of these reports are so interesting and bring to light such curious and novel conditions that I should be thankful for more records of similar nature, particularly by scientific men who are used to precise observation. I therefore appeal to all who in themselves or among their relatives or friends have observed or come to know of accretive normal growth changes in the body or any of its parts during the adult life, to inform me of same. What is desired are as far as possible rigidly accurate data and details, which could reliably be used for further elucidation of the process of normal growth during the adult stage of life.

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THE STATEMENT OF THE RUSSIAN PROFESSORS

THE statement recently reprinted in *SCIENCE* and said to have been signed by many professors of the Russian Academy, may, I think, do injustice to these men. A friend of mine, who not very long ago held a temporary academic position in another European country, was confronted by a document strongly endorsing the policies of that country, intended to be sent to the American press, and requiring only his signature. This he refused to supply, and for a time the resulting situation was annoying and even alarming. Being a distinguished American, he was able to

¹ *Proc. Amer. Philos. Soc.*, 1936, LXXVI, 847-897.