

## SOME ALGAE OF THE LOWER WABASH VALLEY

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This paper is a preliminary report of the algae of the Lower Wabash Valley and, at the present, includes a partial report from Sullivan, Clay, Vigo, Vermillion, Parke and Knox counties.

The collections were made by the writers during the months of July, August, September and October of 1932, the material being, in most cases, immediately preserved in a 6-3-1 solution of water, alcohol and formaldehyde. This solution seems to cause a minimum of distortion to the cell walls and contents.

We are reporting a total of thirty-nine species, varieties and forms. Of these, one genus, five species, five varieties, and one form have not been previously reported from the state, and the others here reported are new for the counties listed. The writers hope to extend this work during the coming year so as to cover the extreme southwestern counties of the state.

As a matter of simplicity, we are omitting the technical classification of the algae, and listing them simply in alphabetical order.

### LIST OF ALGAE

- <sup>3</sup>*Aphanocapsa pulchra* (Kuetzing) Rabenhorst. Parke Co., July 4, 1932. <sup>4</sup>*Chrococcus minutus* (Kuetzing) Naegeli. Parke Co., September 14, 1932. <sup>4</sup>*Closterium acerosum* (Schrank) Ehrenberg. Vigo Co., October 1, 1932. <sup>4</sup>*Closterium acerosum* (Schrank) Ehrenberg. var. *elongatum*. Bréb. Vermillion Co., September 14, 1932; Vigo Co., October 1, 1932. <sup>4</sup>*Coelastrum cambricum* Archer. Sullivan Co., July 4, 1932. <sup>4</sup>*Coelastrum microporum* Naegeli. Sullivan Co., July 4, 1932. <sup>4</sup>*Desmidium aptogonium*. De Brébisson. Sullivan Co., July 4, 1932; Vigo Co., August 28, 1932. <sup>4</sup>*Dictyosphaerium ehrenbergianum* Naegeli. Sullivan Co., July 4, 1932. <sup>4</sup>*Dictyosphaerium pulchellum* Wood. Sullivan Co., July 4, 1932. <sup>4</sup>*Dimorphococcus lunatus* A. Braun. Sullivan Co., July 4, 1932. <sup>2</sup>*Euastrum verrucosum* Ehrenb. var. *reductum*, Nordst. Vigo Co., October 1, 1932. <sup>3</sup>*Gomphosphaeria lacustris* Chodat. Vigo Co., October 16, 1932. <sup>3</sup>*Hyalotheca mucosa* (Dillwyn) Ehrenberg. Sullivan Co., July 4, 1932. <sup>3</sup>*Kirchneriella obesa* (W. West) Schmidle. Sullivan Co., July 5, 1932. <sup>3</sup>*Micrasterias americana* (Ehrenberg) Ralfs. Sullivan Co., July 4, 1932. <sup>3</sup>*Micrasterias truncata* (Corda) De Brébisson. Sullivan Co., July 4, 1932. <sup>4</sup>*Nephrocytium agardhianum* Naegeli. Sullivan Co., July 4, 1932. <sup>4</sup>*Oedogonium borisianum* (LeClerc) Wittrock. Sullivan Co., July 4, 1932. <sup>2</sup>*Oedogonium crassum* (Hassall) Wittrock. var. *longum* Transeau. Sul-

<sup>1</sup> Species not previously reported from state.

<sup>2</sup> Variety or forms not previously reported from state.

<sup>3</sup> Genus not previously reported from state.

<sup>4</sup> Genus or species not previously reported from county.

livan Co., July 4, 1932. <sup>2</sup>*Oedogonium crenulatocostatum* Wittrock. *form cylindricum*. Hirn. Clay Co., September 8, 1932. The longitudinal ribs of the oospore vary from crenulate to dentate. <sup>3</sup>*Oedogonium gunnii* Wittrock. Vigo Co., August 28, 1932. No antheridia were found. *Oogonia* 1-6 seriate. <sup>1</sup>*Oedogonium kurzii* Zeller. Sullivan Co., September 7, 1932. <sup>2</sup>*Oedogonium macrandrium* Wittrock. *var. propinquum* (Wittrock) Hirn. Vigo Co., August 28, 1932. <sup>1</sup>*Oedogonium plagiostomum* Wittrock. *var. gracilius*, Wittrock. Sullivan Co., July 5, 1932. Smaller than measurements given by Tiffany. <sup>4</sup>*Oedogonium sexangulare* Cleve. Sullivan Co., July 4, 1932. <sup>1</sup>*Onychonema filiforme* (Ehrenberg) Ray and Bissett. Sullivan Co., July 4, 1932. <sup>2</sup>*Onychonema laeve* Nordstedt *var. latum*, W. and G. S. West. Sullivan Co., July 4, 1932. <sup>4</sup>*Pediastrum duplex* Meyen. *var. clathratum* (A. Brown) Lagerheim. Sullivan Co., July 4, 1932. <sup>4</sup>*Pediastrum duplex* Meyen. *var. cohaerens*, Bahlin. Vigo Co., October 1, 1932. <sup>4</sup>*Pediastrum tetras* (Ehrenberg) Ralfs. Sullivan Co., July 4, 1932. <sup>4</sup>*Pleurotaenium maximum* (Reinsch) Lund. Vigo Co., August 28, 1932; Clay Co., September 8, 1932. <sup>1</sup>*Scenedesmus abundans* (Kirchner) Chodat. *var. longicauda*. G. M. Smith. Vigo Co., October 16, 1932. <sup>1</sup>*Scenedesmus arcuatus* Lemmermann. Vigo Co., September 15, 1932. <sup>1</sup>*Scenedesmus obliquus* (Turpin) Kuetzing. Vigo Co., October 16, 1932. <sup>1</sup>*Scenedesmus quadricauda* (Turpin) De Brébisson. *var. westii*. G. M. Smith. Vigo Co., August 28, 1932. <sup>1</sup>*Sorastrum americanum* (Bahlin) Schmidle. Sullivan Co., July 4, 1932. <sup>4</sup>*Spirogyra decimina* (Mueller) Kuetzing. Sullivan Co., September 14, 1932. <sup>4</sup>*Volvox globator* L. Sullivan Co., September 14, 1932. <sup>1</sup>*Volvox mononae* G. M. Smith. Sullivan Co., July 4, 1932. <sup>1</sup>*Westella botryoides* (W. West) De Wildeman. Vigo Co., October 1, 1932.

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