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JoVE
1 Alewife Center, Suite 200,
Cambridge, MA 02140
Attn: Ronald Myers, PhD., Senior Science Editor

Dear Dr. Myers:

I am pleased to submit an original research article entitled "Preparation of Prokaryotic and Eukaryotic Organisms Using Chemical Drying for Morphological Analysis in Scanning Electron Microscopy (SEM)" for consideration for publication in *JoVE*. We previously described methodologies we use in our lab in a recent publication (Trotter MB, Stephens, TD, McGrath JP, Steinhilb ML. The *Drosophila* model system to study tau action. *Methods Cell Biol.* (2017) 141: 259-286) and I was invited to submit an article that uses some of these techniques for *JoVE*.

In this manuscript, we describe how to fix, wash, dehydrate, dry, mount, sputter coat, and image three organisms: cyanobacteria (*Toxifilum mysidocida*, *Golenkina* sp., and an unknown sp.), two euglenoids from the genus *Monomorphina* (*M. aenigmatica* and *M. pseudopyrum*), and the fruit fly (*Drosophila melanogaster*). The purpose of this protocol is to describe a fast, cheap, and simple method to obtain detailed information about the structure, size, and surface characteristics of specimen that can be broadly applied to a large range of organisms for morphological assessment.

We believe that this manuscript is appropriate for publication by *JoVE* because it describe methods for examining specific morphological details of three representative types of organisms that would be broadly applicable to examining features of many organismal and tissue types.

This manuscript has not been published and is not under consideration for publication elsewhere. We have no conflicts of interest to disclose. If you feel that the manuscript is appropriate for your journal, we suggest the following reviewers:

Dr. Brian Leander, University of British Columbia (bleander@mail.ubc.ca) – SEM expertise
Dr. Mark Farmer, University of Georgia (mfarmer@uga.edu) – SEM expertise
Dr. Ken Colodner, Mount Holyoke College (kcolodne@mtholyoke.edu) – fly expertise
Dr. Karl Johnson, Pomona College (karl.johnson@pomona.edu) – fly expertise
Dr. Greg Colores, Central Michigan University (color1gm@cmich.edu) – cyanobacteria expertise

Thank you for your consideration!

Sincerely,

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