



Osmosis in Elodea Lab

Purpose:

To view the movement of water into and out of cells

Materials:

Elodea plants

Microscopes

Microscope slides

Cover plates

Droppers

Hypotonic and hypertonic solutions (saline)

Microscope drawing circles

Procedure

1. Materials Manager will receive a slide, cover slip, water dropper and *elodea* leaf section from instructor
2. Slide Preparer will prepare a temporary slide of *elodea*.
3. Microscope Manager will find the *elodea* through the microscope under low magnification
4. Microscope Manager will allow other members to view *elodea* under low magnification
5. Microscope Manager will find the *elodea* through the microscope under high magnification in the same manner as in the Onion Lab
6. Microscope manager will allow other members to view *elodea* under high magnification
7. All members will draw what they see at high magnification
8. Materials manager will return temporary slide to instructors and receive Hypotonic and Hypertonic *elodea* slides
9. Microscope Manager will follow procedures 3 through 6
10. Students will draw what they see for the Hypotonic and Hypertonic *elodea* slides

Wrap Up Questions

1. What happened to the size of the cells which had been placed in hypotonic solution?
2. What happened to the cells which had been place in the hypertonic solutions?
3. Where were the chloroplasts in the normal cells?
4. Did you see any cells which had burst? Where?