



Science Sauce Online

A source for free flipped learning lessons

Flipped learning reverses the traditional classroom process of “learn it in school, practice at home”. Flipped learning involves students learning new content at home through a video, reading, listening or other activity. They then come to class with the foundation knowledge, ready to really engage with the topic. This is a flipped learning lesson with self-study materials and suggested class activities.

Resources for this lesson, including the student tasks, can be found at:

ScienceSauceOnline.com

Enter lesson code:

01901

Lesson Topic:

FLOWER DISSECTION

Age: 14-16

Self study input method: Video

Self study task: Question sheet

Classwork prep time: Moderate

STUDENT PRE-CLASS TASK

- Watch the video: “Flower dissection: Reproduction in flowering plants”.
- Answer the questions on the student homework task sheet.

IN-CLASS TASKS

PRACTICAL - FLOWER DISSECTION: Students choose a flower from the school grounds*, dissect it and produce a labeled diagram of a cross section.

*Alternatively students could bring flowers from home or they could be supplied from a local flower shop. Any insect pollinated flowers will suffice, but the larger the better.

Time (mins)	Students...	Teacher...
2	In groups of about 4 or 5, review answers to the homework task.	Monitors
3	Review answers (and make corrections if necessary).	Gives answers to the student task sheet.
5	Listen to and follow instructions. Collect apparatus.	Instructs students on the task.
5	Collect flower samples from school grounds.	Guides students as to which flowers will make appropriate samples.
10-15	Dissect flowers.	Guides the students, helping to find the relevant structures in the flowers. Flowers vary widely from species to species and guidance will be important.
15	Draw and label their flower.	Monitors.
10	Plenary: Display flower drawings on their desks. Work in pairs while viewing the drawings around the room. Assign two pluses and a wish to each one (two strengths, and one thing they wish was included/a target for improvement).	Monitors.

PRACTICAL REQUIREMENTS FOR TECHNICIANS

Each student will need the following:

- Insect pollinated flower (students may find this themselves in the school grounds if available).
- Scalpel.
- Cutting board.
- Magnifying glass.
- Pointer.
- Small forceps.

ANSWERS TO STUDENT TASK

Answers to the student task sheet will be relatively obvious for subject teachers, and can all be found by reviewing the student self-study resources.

Answers are not published here, as these sheets are easily accessible by students. If you need clarification on any of the questions please feel free to email me and I'll get back to you ASAP.

contact@sciencesauceonline.com