INCORPORATING THE HEMLOCK WOOLLY ADELGIS INTO HIGH SCHOOL ECOLOGY AND FIELD BOTANY CURRICULUM

ALANA ARCHANGELO
THE CHALLENGES

- HOW TO INCORPORATE NEW “CITIZEN SCIENCE” LONG TERM PROJECT INTO TWO ESTABLISHED CURRICULA SPANNING TWO SEMESTERS OF (MOSTLY) DIFFERENT STUDENTS
- HOW TO GET STUDENTS ENGAGED IN PROJECT
ANOTHER ENVIRONMENTAL SCIENCE TEACHER BEGAN THE PROJECT THE YEAR BEFORE...

- IS SHE USING THE SAME TREES I WOULD?
- *She was not continuing the project this year*
- WOULD I BE EXPECTED TO OR BE ABLE TO CONTINUE THE PROJECT TO THE SAME EXTENT SHE HAD?
- *Had to make the project match my strengths and not try to emulate someone who had different strengths*
- CAN I FIND THE TREES SHE USED?
- *There are two different plots marked on the campus. I was able to find most of the trees on one plot so that is the one I used*
Students had to sample and analyze different Abiotic and Biotic components of three different sites: A field, deciduous edge, and hemlock forest. This was already a part of the curriculum.

Students researched the value of hemlocks in our ecosystem.

Viewed a power point on the HWA and why we should care about it

Read Pest Alert article and answered questions about HWA infestation

Visited one hemlock site and recorded crown health and seasonal growth
ASSESSMENT

FORMATIVE:
- STUDENTS COMPLETED FIELD DATA CHARTS
- STUDENTS ANSWERED QUESTIONS ON THE ARTICLES GIVEN ON HWA

SUMMATIVE:
- QUIZZES-
  - TYPES OF SCIENTIFIC INVESTIGATION
  - HOW TO IDENTIFY A HEMLOCK
  - LIFE CYCLE OF HWA
WHAT I WILL DO IN FIELD BOTANY

- REVIEW CHARACTERISTICS OF HEMLOCKS
  This is already a part of the curriculum
- GIVE STUDENTS A PRETEST ON HWA
- VALUE OF HEMLOCK FORESTS
- VIEW HWA POWERPOINTS
- CHECK SAME TREES AS WE CHECKED FIRST SEMESTER FOR PRESENCE OF EGG SACS
- READ ARTICLES ON HWA
- GIVE POST TEST ON HWA