



# **Students' Group report**

## on E-learning and Flipped Classroom Activities (IO4)

Students' names and surnames: Budai Andrei Luca, Barna Ana Maria, Suciu Miruna Maria, Creangă Ana Maria

Class: 9th grade

Institute: Liceul Teoretic Sfântu Nicolae

**Country: Romania** 

#### Specific in-depth topic of own home study and why this topic has been chosen

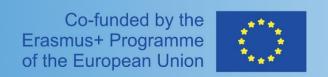
As part of the flipped classroom, our group chose "Water pollution in Romania" topic to study. Water pollution occurs when pollutants are released into bodies of water, making them unsuitable for human consumption and disrupting aquatic ecosystems. Water contamination can result from a variety of contaminants, including toxic waste, petroleum, and disease-causing microorganisms. Romanian groundwaters are polluted locally from point sources (landfills) and from diffuse sources of pollution (fertilizers, pesticides and canals, in urban areas). Over-exploitation of underground water wells can lead to indirect diffuse pollution, causing salty water intrusion, exploitation of mineral aggregates.

We considered this topic interesting and useful to give it a special attention as it is something that affects all of us.

The flipped classroom activity consisted in a project-based task, a PPT presentation, then we gave a presentation, followed by a Q&A. Then, we also participated in a group question-and-answer exercise called Kahoot quizzes, which we created and played with our peers.

We conducted a brainstorming session for our project and agreed on the above topic, because of the importance of water protection and the consequences of contaminated water.

We thought that water pollution is more difficult to deal with than soil pollution.





#### Comment about the activity done at home

We looked for materials for our presentation once we agreed on the topic that each of us would research. We met several times to choose the materials to make the presentation, divide the tasks and establish who does what.

Once the PPT was made we sent it to the teachers to get feedback and make the final form. Then we gave a presentation to our classmates and other project members about our project.

A Q&A session and feedback from our peers and teachers followed the presentation.

Another assignment was to make a Kahoot game based on the water pollution. It was a game that we played with our classmates. At the end of the session, we did a reflection activity and received comments.

### Comment about the interactive activity in the classroom (at least 400 characters)

In conclusion, the flipped classroom method seemed unusual and difficult to do at first because of its contrast with our traditional learning methods, but as the teachers described it and we started working with it, I found it to be engaging. From obtaining resources from our teachers to exploiting and trying to use them, the process was interesting.

We consider that the flipped classroom activity, at its fullest, gave students more control over their learning. They guided class discussion to elicit explanation from teachers, allowing them to control time in the classroom. Students had more liberty in class when they did hands-on experiments and practiced new abilities. They could experiment with new ideas in a safe and comfortable environment.