

Sciences de la Vie et de la Terre - Earth and Life Sciences

4^{eme} (8th Grade) [1.5 periods per week]

Mme. Laurence Laneque

Course Description

The goal of this class is for students to acquire fundamental cognitive skills and knowledge in two experimental sciences: Biology and Geology (Earth Science). Scientific knowledge will be built by students as often as possible, through guided document and data analysis and/or practical activities, allowing them to acquire reasoning and technical skills and develop a sense of self-efficacy, initiative and autonomy.

Skills mobilized during the SVT class are embedded in 5 domains of skills, knowledge and culture as follows:

- Practicing scientific languages (Domain 1): oral and written expression; reading and analyzing documents presented in different formats (texts, tables, graphs...); choosing appropriate formats to represent data.
- Using tools and methods (Domain 2): searching and obtaining relevant and reliable information from the internet; using relevant data from a database or a program to solve a scientific problem.
- Citizenship education (Domain 3): Engaging in ethical, responsible and rational behaviors in terms of health and sustainable development; engaging in the elaboration of safety rules in the lab and on the field.
- Practicing a scientific approach (Domain 4): formulating a scientific question; formulating hypotheses; designing an experimental protocol; collecting, analyzing and interpreting data; drawing conclusions from data.
- Making, creating, implementing (Domain 4): choosing the appropriate tool to measure and observe; implementing a protocol.
- Representations of the world (Domain 5): situating scientific discoveries in time; comprehending scales of space and time; distinguishing beliefs or opinions from scientific knowledge.

Timeline

Part 1: Life on Earth and its Evolution / 20 hours (13 weeks).

Part 2: Human Body and Health / 22 hours (14 weeks).

Part 3: Planet Earth, the Environment and Human Actions / 10 hours (7 weeks).