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# Two weeks as a chemist

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## **Abstract**

“Two weeks as a chemist” is a project developed for sixteen-year-old students from the Secondary School Santorre di Santarosa (Turin). The project aims to increase students’ motivation and interest in science by providing them a working experience in a chemist’s store and is made with the collaboration between schools and local stakeholders. It encourages the use of new methodologies in the classroom and the contextualization of STEM learning.

**Keywords:** STEM Careers, work, Pharmacy, Technology, Gender equality

## **Introduction**

In our territory there are several avant-garde realities in the sector related to technologies for life sciences, very often, however, students do not know about them. The goal of the school is to help them get closer to the productive sector and develop integration paths to acquire more professional skills and make increasingly informed future career choices.

## Concept

In the first stage, the students reflected on the pharmaceutical work, learned about the technology production. They begun by reporting their ideas and fears about the world of work, then imagined what they will do during an internship. They brainstormed on their needs and their expectations.



## Implementation

Students were involved in different activities inside and outside the school: they received lessons from university experts, they did preliminary meetings with professionals, they conducted visits to companies, and participated in labs activities.

The implementation phase started with four meetings where university experts spoke about cosmetics and homeopathy. It continued with a training course on workplace safety. Later students spent two weeks at a chemist's store: they formed a close contact with work with the opportunity of an internship. During these two weeks students learned the chemist's management, the disposition of drugs, the organization of a warehouse, the preparation of galenics in the chemist laboratory. After the internship students decided to visit a cosmetic company called REYNALDI, to experience also the productive process.

The outcomes of the activities were presented at the 3rd Scientix Conference, 4-6 May in Brussels as a Poster contribution. Their work won the Premio Storie di Alternanza - Camera Commercio Piemonte- Menzioned'Onore.





## Conclusions

The students' feedback was overall very positive. This was a unique opportunity for them to experience a professional field from many angles and to get a first hand understanding of the professional life. One student said "This was my first working experience and I think it was amazing. I met great people that explained to me lots of interesting things. I loved the atmosphere that my colleagues created so much. I liked seeing that a chemist is not only a person who reads a prescription and sells medicinal products, but a chemist has to listen to the patient and find the best treatment for his/her problems"

According to another student the experience gave her much more understanding in the professional sphere. C. "In this period I understood a lot of things about drugs and about the world of work. I enjoyed in this experience because I found funny and nice doctors."



## Bibliography

- (1) STEM Professionals Go Back To School: <http://www.stemalliance.eu/pgbs>
- (2) Hayden, K., Ouyang, Y, Scinski, L., Olszewski, B., Bielefeldt, T (2011) *Increasing student interest and attitudes in STEM: Professional development and activities to engage and inspire learners*. Contemporary Issues in Technology and Teacher Education, 11(1), 47-69. <https://www.learntechlib.org/p/35368>

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