

Future Classroom Lab workshop

Innovative Practices for Engaging STEM Teaching

24 - 28 April 2023, Brussels

Description

The course provides STEM (Science, Technology, Engineering and Mathematics) teachers with resources and ideas to develop more engaging science lessons and to increase students' interest for STEM subjects and careers.

The course takes place in the Future Classroom Lab with six learning zones each representing a core pedagogical concept.

The workshops will cover several topics and areas of interest, ranging from sustainability to connections between STEM and other subjects, to innovative practices in education.

Learning objectives

In this course the participants will learn to:

- Develop more engaging lessons to increase students' motivation
- Connect STEM with other subjects
- Connect all subjects with real-life situations
- Develop presentation skills beyond the classroom

Course pre-activities

1. Introduce yourself in the Padlet: [FCL workshop: Innovative Practices for Engaging STEM Teaching \(padlet.com\)](https://padlet.com/FCL-workshop/Innovative-Practices-for-Engaging-STEM-Teaching)
2. **Example of pre-course activity:** *Take some pictures of the learning spaces and other parts of your school building. Please take for each of the following categories 1 or 2 pictures in your school building. (If you are not working in a school, you can search the internet.)*

- A. a learning spaces which is most appropriate for nowadays pedagogical needs
- B. a classroom which is difficult to host innovative learning, including collaboration
- C. a (potential) learning space in your school building, outside a traditional classroom
- E. a classroom with technology

- F. a classroom which displays the learning outcomes of the pupils*
- G. a classroom which contains objects which may not be strictly needed*

Please add these pictures on your laptop (or tablet) so that you will be able to show them in a small group.

3. You are encouraged to follow **@scientix_eu** on Twitter, Facebook and Instagram. Please also feel free to follow **@fcl_euschoolnet**.
4. In preparation for the workshops, please check out the following materials:
 - o For the Open schooling and STEAM education – Make it Open workshop, please have a look at the [Open Schooling Navigator](#). Additionally, please feel free to watch the following videos:
 - <https://youtu.be/wplDeJ8ylxg>,
 - https://youtu.be/A5KNUhV_Tcl

DAY 1 – Monday, 24 April 2023	
9.15	<i>Doors open. Arrival and registration</i>
9.30	Introduction. Objectives and practicalities
10.00	Bioeconomy in education? – GenB
11.00	<i>Coffee break</i>
11.20	Terra Mission Challenge – Life Terra
12.30	<i>Lunch</i>
13.20	Three Rs in education – Three Rs
14:40	<i>Coffee break</i>
15.00	NBS and sustainability in STEM teaching – NBS EduWORLD
16:30	<i>End of the day</i>

DAY 2 – Tuesday, 25 April 2023	
9.30	Discussion: integration of students from different backgrounds – SPERE
10.40	<i>Coffee break</i>
11.00	ScientixTV and tips on presenting – Scientix
12.30	<i>Lunch</i>
13:20	New trends in education: new solutions and support from the industry partners – STEM Alliance
14:40	<i>Coffee break</i>
15:00	Research and edTechs in Education - EmpowerED
16:30	<i>End of the day at the FCL</i>

DAY 3 – Wednesday, 26 April 2023

9.30	The future of STEM Education – The SEER
10.40	<i>Coffee break</i>
11.00	Particle physics in secondary education? – Accelerating Teaching
12.30	<i>Lunch</i>
13:20	Open schooling and STEM education – Make it Open
15.00	<i>End of the day. Social and cultural activity: Museum/cultural visit (optional)</i>

DAY 4 – Thursday, 27 April 2023

9.30	The power of STEM in building an NBS community – NBS EduWORLD
11.00	<i>Coffee break</i>
11.20	STEM School Label – Scientix
12.30	<i>Lunch</i>
13:20	Digital Education with cultural Heritage – Europeana
14.40	<i>Coffee break</i>
15:00	STE(A)M Education training: now and in the future – Scientix
16:30	<i>End of the day</i>

DAY 5 – Friday, 28 April 2023

9.30	STE(A)M Learning Ecologies – SLEs
10:15	Group-work 1: Prepare the script
11.00	<i>Coffee break</i>
11.20	Group-work 2: Prepare the setting and rehearsal
12.30	<i>Lunch</i>
13:20	Group-work 3: Present your results
14.40	Evaluation, certificates, group picture
15.00	<i>End of the course</i>

Cultural & social programme

The course participants are invited to take part in the following cultural & social activities:

- **Wednesday:** suggested activity: Visiting [Parlamentarium](#) (European Parliament's visitor centre) or the House of European History (Free access)

Brussels offers also many other options to spend time:

- What to visit/see: http://visitbrussels.be/bitc/BE_en/do-see/to-see/
- Parks and gardens: <http://www.brussels.be/artdet.cfm/5443>
- Free exhibition on the city of Brussels: <http://experiencebrussels.biponline.be/en/exhibition>
- Free museums/exhibitions: <http://www.brusselmuseums.be/en/faq.php?id=5>
- Discover Belgium beers: <http://belgium.beertourism.com/belgian-beers>
- Discover Belgium chocolate: <http://www.visitbelgium.com/?page=chocolate-lovers>

Accommodation

The participants who take care of their own accommodation arrangements can find many options at www.booking.com or www.airbnb.com/s/Brussels--Belgium. The following hotels are some of the options close to the course venue:

- Adagio Access Bruxelles Europe; www.booking.com/hotel/be/adagio-access-bruxelles-europe.en-gb.html
- Hotel Motel One: www.booking.com/hotel/be/motel-one-brussels.en-gb.html
- Hotel Chambord: www.booking.com/hotel/be/chambord.en-gb.html
- Chelton Hotel: www.booking.com/hotel/be/chelton.en-gb.html
- Hotel Le Berger: www.booking.com/hotel/be/le-berger.en-gb.html
- Silken Berlaymont Brussels: www.booking.com/hotel/be/silkenberlaymont.en-gb.html
- Thon Hotel EU: www.booking.com/hotel/be/thon-eu.en-gb.html

If you would like to stay in the Brussels city centre, it is only 10 min away by metro from the course venue (by foot 20-30 min). It is advised to avoid immediate vicinity of the two train stations Gare du Nord and Gare du Midi, which some visitors may find less comfortable.

Hotel rates: The hotel prices can vary a lot in Brussels, so it is good to book in advance. You can find examples of rates and compare them at www.booking.com. The participants' comfort requirements are different which reflects their selection of accommodation. As a general tip, some hotels can have tempting "non-refundable" rates but we recommend selecting the "refundable" rate even if it may be a little bit more expensive.

If you have any questions, e.g. regarding the hotel location, public transport connections to the course venue or similar, please let me know: fcl_courses@eun.com.

How to arrive to Brussels

Brussels has two airports: Brussels National airport (Zaventem), about 30 min to the city centre, and Brussels South airport (Charleroi), about 60 min to the city centre. You can arrive conveniently to Brussels also by train from London (Eurostar), Paris, Amsterdam and Cologne (Thalys).

From the Brussels airport (Zaventem) to the city:

- **BY TRAIN to the city centre:** The train takes you to the main train stations in the Brussels city area: Gare du Nord, Gare Centrale, and Gare du Midi. The ticket costs €11.10€. The trains go every 15-20 min and leave from the level -1 of the airport terminal: <https://www.brusselsairport.be/en/passengers/access-parking/train>
- **BY BUS to Schuman-Luxembourg:** From the level 0 of the airport, the bus 12:
 - **Number 12**
 - The bus takes you to **Diamant, Schuman and Luxembourg**.
 - The ticket costs 7,50 € from the automat (paper ticket) and 7,00 € with contactless payment
 - You find the bus schedules here: www.stib.be/horaires-dienstregeling.html?l=en
- **BY BUS to Gare du Nord:** Take the bus "De Lijn" N° 471 (level 0 of the airport). The bus takes you to the train station Gare du Nord / Brussel-Noord. Timetables: [www.delijn.be/en/lijnen/lijn/3/471/1/471_Zaventem - Brussel?vertaling=true#2](http://www.delijn.be/en/lijnen/lijn/3/471/1/471_Zaventem_-_Brussel?vertaling=true#2)

From the Charleroi airport to the centre:

- **Take the Flibco Shuttle** bus which takes you to the Brussels Gare du Midi (main train station).
- For the bus schedule, see here: <https://www.flibco.com/en#/booking>
- At Gare du Midi you can continue your journey by using different metro lines, buses or pre-metro. See the [metro map here](#).

Course venue and how to arrive

The courses will be organised in Brussels, at European Schoolnet's Future Classroom Lab.

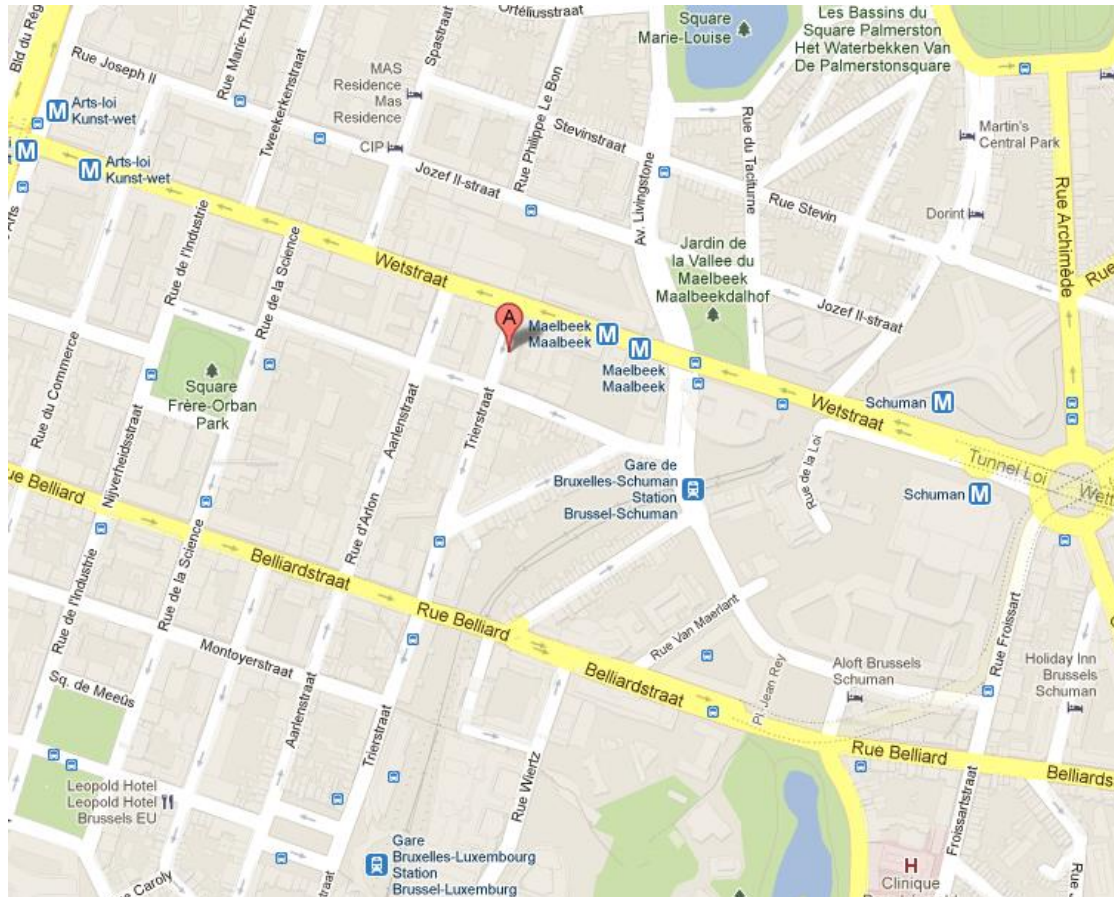
Address: European Schoolnet, Rue de Trèves 61 – 3rd floor, 1040 Brussels (see the map below) www.europeanschoolnet.org/

Future Classroom Lab - The Future Classroom Lab is a fully equipped, reconfigurable, teaching and learning space developed by European Schoolnet, its 34 supporting Ministries of Education and leading educational technology providers. Future Classroom Lab helps to visualise how conventional classrooms and other learning spaces can be reorganised to support changing styles of teaching and learning. Read more: <http://fcl.eun.org>

How to best reach the EUN office and Future Classroom Lab

The office is close to the following places:

- Schuman (buses, metro lines 5 & 1, train, airport bus): 10 min walk
- Luxembourg (buses, train, airport bus): 10 min walk
- Arts-Loi (metro lines 1, 2, 5, 6): 10 min walk
- Maelbeek metro station (lines 1 and 5): take the exit "Rue de la Loi", 2 min walk
- Thon EU hotel: 1 min walk (across the street)



Be aware of pick-pockets whenever you are in public places, especially when using public transports.

Insurance

Participants are responsible for their own safety and belongings. The registration fee does not cover insurance for the participants. We recommend that participants take out insurance in their home country to cover pre-journey cancellation for personal reasons and necessary insurance to cover accidents, medical expenses and loss of personal belongings during the visit. EU citizens can obtain a free European Health Insurance Card (EHIC).

Cancellation policy

If the participant cancels his or her participation up to 6 weeks before the course begins, there are no cancellation fees. If the participation is cancelled between 6 weeks and 2 weeks before

the course starts, 50% of the course fee will be charged. If they cancel any later, there will not be any refund. Substitutions are possible right up to the start of the course.

About European Schoolnet

European Schoolnet is the network of 34 European Ministries of Education, based in Brussels. As a not-for-profit organisation, we aim to bring innovation in teaching and learning to our key stakeholders: Ministries of Education, schools, teachers, researchers, and industry partners. www.eun.org.

Contact: fcl_courses@eun.com.