

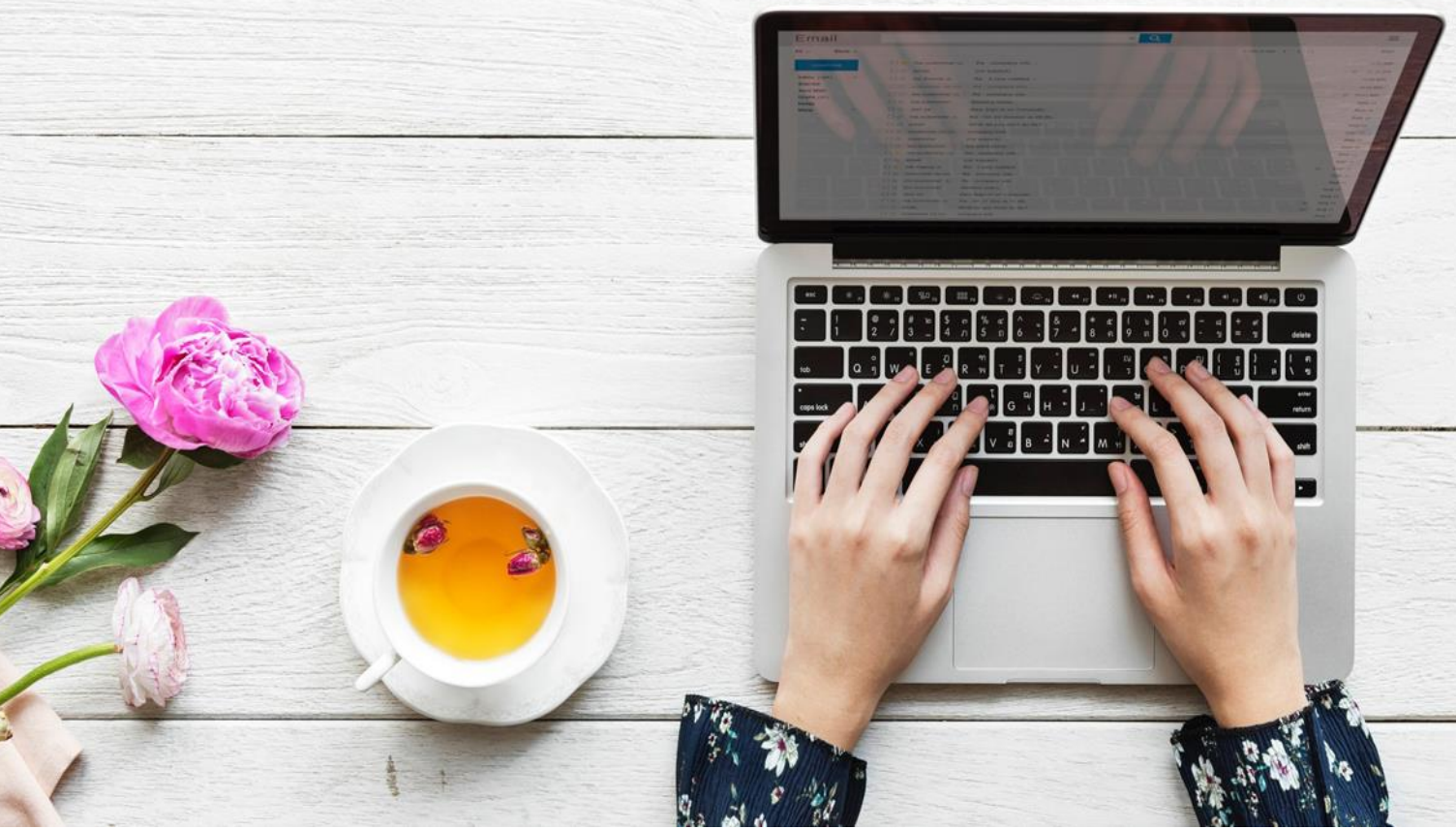
DIPLOMA

Development of Inclusive and Participatory Learning in
Organisations through Multicultural Ambassadors –
nr.2021-1-RO01-KA220-HED-000027615



Co-funded by
the European Union

Development of Student Ambassador Training Curriculum



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INTRODUCTION

Student ambassador schemes are increasingly widespread across universities in Europe. Despite the widespread use of university student ambassadors and volunteers, there is very little focus on the training that these young people receive. A survey of UK universities (Gartland, Hayton & Roberts, 2020) revealed significant gaps in the training available for student ambassadors, especially regarding training focusing on careers education and supporting young people in particular subject areas, despite these both being areas in which ambassadors are frequently working.

The purpose of the curriculum is to present an example of a model of how to train student ambassadors. Future student ambassadors were involved in the design of the content of this curriculum during the Learning and Teaching activities that was held in Bucharest in February 2023.

THE ROLE OF STUDENTS AMBASADORS – PROVIDING DIFFRENT CONTEXTES

Romania

In Romania, students are viewed as full partners of the university in all decision-making and consultative processes, having the right to elect their representatives and to be elected to the university's governing structures and being part of the university community.

Students are represented in the consultative, decision-making and executive structures of the university, according to the provisions of the National Education Law no. 1/2011, as amended and supplemented, the Code of Student Rights and Obligations, the University Charter and the Regulations for electing student representatives. Student representatives are elected by direct, secret and universal vote of all students at the level of the faculty, respectively of university. Legally constituted student organisations at faculty/university level may delegate representatives in these structures. The number of representatives delegated by student organisations in these structures shall be determined on the basis of university autonomy.

Students participate in decision-making within the university on the basis of the following rights:

1. the right to elect and to be elected to the governing structures of the university, in accordance with the National Education Law No 1/2011, as amended;
2. the right to be represented in the Faculty Council by at least 25% and in the University Senate by at least 25%, in accordance with the National Education Law 1/2011, as amended and supplemented, and the University Charter;
3. the right to be represented in the structures of the university that manage social services, including the committees for accommodation, scholarship allocation, allocation of theme camps;
4. the right to participate in the procedures for determining the method of appointing the rector through representatives, as well as in the process of appointing the rector, regardless of the method of appointment, according to Article 209, paragraph 2 of the National Education Law No 1/2011, as amended;
5. the right to be informed and consulted by student representatives on decisions voted in the governing structures of the institution to which they belong.

Moreover, higher education institutions may not make student representative status conditional on academic performance, attendance at courses, seminars and laboratories or any other type of discriminatory measure. Teaching staff shall not be involved in the procedures for electing student representatives, irrespective of the level of representation. Interventions are sanctioned according to the provisions of art. 312 of Law no. 1/2011, with subsequent amendments and additions.

The students' union

The National Alliance of Student Organisations in Romania (ANOSR) is an independent student union, non-governmental and non-partisan. Since its establishment, ANOSR has brought together the most traditional student organisations, established immediately after the revolution, together constituting a team based on principles and professionalism. This representativeness is recognized and supported by important organisations from civil society, the media, the academic community and important central actors such as the Ministry of Education.

Following a long negotiation process, at the proposal of ANOSR, by Order of the Minister of Education, Research, Youth and Sport no. 3666/30 March 2012, the Students' Rights and Obligations Charter (hereinafter referred to as "the Code" or "CDOS") was adopted, this being the first legislative initiative belonging entirely to students. Both the introduction in the National Education Law of the existence of a Student Statute, and promotion of the Code have been long-standing wishes of the ANOSR initiated in 2006. The Code is also known as the Student Statute and comprises the main rights and obligations that students enrolled in HEIs have to comply with. OMECTS no. 3666/2012 establishes that each university has to adopt its own Students' Rights and Obligations Charter, which takes over all the rights and obligations of the national Code.

Students' rights

When talking about equity and inclusion, the national Charter and the National Education Law stipulate most of the students' rights. The ones directly or indirectly dedicated to inclusion and social dimension to higher education are to be read above:

- the right to quality education;
- the right to access to internal and external mobility programmes, with the credits obtained in this way recognised by law;
- the right to transfer from one university to another, in accordance with the legislation in force and the university charters;
- the right to receive, at the beginning of the first year of study, a "Student Guide", including information on: the rights and obligations of the student, the subjects in the curriculum, the services provided by the university, the assessment procedures, the fees, the material base of the university and the faculties, information about student unions that are legally constituted, how to access grants and other funding, mobility, and other facilities and grants;
- the right of access to the regulations, resolutions, decisions, minutes and other documents of the institution at which they study, in accordance with the legislation in force;
- the right to participate in the evaluation of courses, seminars, workshops, practical work, teaching staff performance and other educational and/or organisational aspects of the programme, to participate in the evaluation and assessment of the educational programme followed by amendments and subsequent additions. The results of the evaluations are public information and are used in the evaluation of performance of the respective courses, seminars, internships, study programmes and frameworks;

- the right to benefit free of charge from academic and professional information and counselling services, psychological and social services related to the educational activity, provided by the higher education institution in accordance with the University Charter;
- the right to interrupt and resume studies in accordance with the University Charter and the legislation in force;
- the right to study in one's mother tongue or in a language of international communication if the possibility exists in the higher education institution, within the limit of the places allocated for this type of study programme;
- the right to an objective and non-discriminatory assessment of the competences acquired during a course, in accordance with the syllabus, and the right to know the scale according to which has been assessed;
- the right to examination in an alternative method when suffering from a disability, certified by a doctor;
- the right to benefit from a student-centred educational process with a view to continuous developing;
- the right to benefit from flexible learning pathways;
- the right to free medical care offered by the higher education institutions;
- the right for accommodation in the universities campuses or accommodation grants;
- the possibility to have access to student projects or to carry out internal activities, outside of class hours and other pre-established activities, in accordance with provisions of the University Charter;
- the right to report abuses and irregularities and to request verification and evaluation of such reports by specialised bodies provided by the legislation in force, and the right to benefit from protection for those who report them;

It is also relevant to iterate the fact that students from disadvantaged backgrounds or those with outstanding results in their professional, cultural or sports education and training shall benefit from places in the student campuses within the budget allocated for this purpose.

The annual report

According to Article 19 of the Students' Rights and Obligations Charter, "national unions of students shall draw up an annual report on compliance with the provisions of this Code in HEIs". The purpose of this report is to analyse how the provisions of the Code are taken up by higher education institutions in Romania.

The report which follows the implementation of the Charter in the academic year 2021-2022 is the tenth report produced by ANOSR, which initiated this in 2012 (ANOSR Report, 2022, p. 4). Recognising the importance of student involvement in developing the quality of services offered by the higher education institutions, ANOSR consults with student leaders enrolled in universities across the country in producing reports on the respect of rights and obligations (ANOSR Report, 2022, p. 5). On the basis

of its findings, ANOSR makes a number of recommendations to universities, the Ministry of Education, student unions and student representatives with a view to increasing the implementation of the provisions of the Code, but more especially with a view to improving the whole educational process, guaranteeing access and inclusion.

Career guidance and counselling services available at university (ANOSR Report, 2022, pp.61-62)

Regarding the Career guidance and counselling services available at university, 95.8% of universities have such a centre, but only 4.2% of respondents said that they used the services of a career guidance centre (ANOSR Report, 2022, p. 61). When asked how accessible career advice and guidance centres (CCOC) are, student representatives from 54.2% of universities surveyed consider that they are accessible, but that few students know about them, and 8.3% of respondents stated that they are accessible, known but not used by students (ANOSR Report, 2022, p. 62)

Situation of students with disabilities in the Romanian universities (ANOSR Report, 2022, p. 57)

In terms of adapting the universities study spaces to the needs of students with disabilities, in 12.5% of universities respondents reported that their universities had adapted their teaching to the needs of students with locomotor disabilities, whileas 83.3% of respondents reported that only some of the premises are adapted in their universities and 4.2% stated that the premises are not adapted at all to the needs of the for students with locomotor mobility (ANOSR Report, 2022, p. 57). Analysing the existence of any structure dedicated to students with disabilities, there are only two HEIs that have such structures, assuring a certain level of access and inclusion. Further on, with regards to the training of university staff in establishing an interaction with students with disabilities, representatives of student organisations mentioned that in 33.3% of the universities their staff did not receive support in this matter and in 12.5% of the universities only some staff participated in such trainings. (ANOSR Report, 2022, p.58). On the other hand, with regard to the adaptation of study spaces (classrooms, laboratories or libraries), accommodation and dining areas in relation to the needs of students with locomotor disabilities, the situation is as follows:

Regarding the bathrooms especially adapted to the needs of people with disabilities in the vicinity of the study areas (lecture/lab buildings, libraries), 54.2% of universities are not offering such facilities in all buildings where students carry out teaching activities. As regards the presence of lifts, there are at least 5 universities where there are no elevators as a means of facilitating access to all the spaces intended for teaching activity. A large number of them are not equipped with access ramps and that also includes the dining areas (ANOSR Report, 2022, p. 59).

Pointing to the importance of using alternative teaching and examination methods for students with disabilities, who belong to categories other than locomotor disabilities, one of the questions asked in the questionnaire aimed to identify which alternative methods are used in universities. (ANOSR Report, 2022, p. 60). As a result, a worrying 62.5% of universities have no type of alternative teaching and examination methods for students with disabilities. Furthermore, when asked whether alternative teaching and examination methods for people with disabilities are available in all study programmes, representatives of student unions state that in only 8.3% of the universities surveyed this is the case, whereas in 33.3% of universities alternative methods are available only in certain study programmes and 37.5% have no such methods for their study programmes (ANOSR Report, 2022, p. 61).

Thus, all the above mentioned aspects can represent a source of training needs for the student ambassadors, especially when it comes to getting involved in working in the interest of students with disabilities.

Secondly, according to a survey delivered by the Learning Centre at the University of Bucharest 3 main specific training needs arose and are related to the area of:

1. Coaching and personal development program in the area of social and emotional competences
2. Professional counselling and career guidance programme
3. Remedial learning programme and development of critical thinking and scientific reasoning skills and academic writing skills.

*All the courses provided are NOT specifically dedicated to students ambassadors, but to all students (<https://unibuc.ro/wp-content/uploads/2022/10/Oferta-workshopuri-oct-2022-1.pdf>).

France

There is no much scientific work on the practices using student ambassadors. Often, each university decides its own strategy in order to employ and form the student ambassadors.

Generally, a student ambassador represents the University during events: fairs, forums, open days, testimonies, etc. As a student ambassador, his or hers role is multiple:

- Promote the University where the student is enrolled, its global training offer, in particular the field of student of the student;
- To testify of the students' study course at the University;
- Inform and guide future students in their choice of training;
- To answer possible questions from future students and their parents

It is mostly a paid job and the different departments of professional orientation or communication services of the universities accompany the students. This support often consist of :

- Training by a career guidance ;
- A communication kit (posters, flyers, training sheets, goodies etc.)
- A quick training on how to respond the answers of future students (example, is there any integration activities for the students, are there services that help to seek different internship programs, etc.)

For example, the University of Cergy Pontoise proposes the courses called "UE LIBRE" where the students create and manage different projects. One of the projects could be "students ambassadors" which consists of two parts: the first one, a "tutoring" component where the student will work on how to best support a group of learners and their learning process. And the second part is A "knowledge

of the panorama of higher education" section to discover the various training courses, possibilities and organizations of higher education. The student will also be trained to communicate on these elements in different contexts (Fairs, Salons, amphitheatre etc.) with different audiences (parents, high school students etc.).

At the end of the course, the student will be able to develop the following transversal skills:

- Lead and facilitate a group
- Work with collective intelligence
- Use active teaching methods
- Communicate, present and introduce oneself
- Move a group towards an objective
- Create a link between different actors

UCO recruits students ambassadors each year. The profiles searched are: second year students with communication skills. It is a paid job and it is considered as a professional experience.

The mission of the students ambassadors at UCO :

- participation at fairs, high school forums, during open days of the university
- promotion of their field of study

The communication service at each campus train and prepare the students. The training is mostly based on the exchange with a students, the explanation of the mission. It is also about the acquisition of communicative skills.

There is an interesting example of students ambassadors at the University of Bretagne Sud: students ambassadors 'social link' : "student tutor COVID". The 19 "social link" student ambassadors receive specific training from the UBS Student and Campus Life Department, the Crous de Bretagne and the MGEN. This training allows them to familiarize themselves with the University's services and the assistance mechanisms set up at the UBS, the mechanisms for identifying psychological suffering, the health instructions contained in the University's activity plan and all aspects of campus life. They can thus answer all the questions of the University's students and staff and pay special attention to students who have been weakened by the pandemics. The main mission of these ambassadors is to foster social ties and communication between students at the University through face-to-face and/or distance learning support.

Educational System in Turkey is very centralized. Ministry of Education controls all k12 education, develops curriculum, assigns teachers and regulates everything. Higher Education Council controls all higher educational institutions (universities). Student Selection and Placement Center (SSPC) is a centralized system to regulate an entire education system and organizes national exams such as high school placement exam and university placement exam.

Constitution states:

Item 10

- All individuals are equal in law regardless of their language, color, race, gender, political view, belief, religion, religious sect.
- Women and men have equal rights. The state is responsible for making this equality real.
- Children, elder, disabled, and veterans are not exempt from the equality rule.
- No individual, no family, no social group is privileged, on any basis.

Regulations in official higher education law

I – Generality and equality

Item 4 – Educational institutions are open to any one regardless of their language, race, gender, disability, and religion. In term of accessing to education, no individual, no family, no social group, is privileged.

II – Needs of the individual and the society:

Item 5 – National educational services are designed to meet the needs of the Turkish society with the desire and and skillset of Turkish citizens.

III – Orientation:

Item 6 – Individuals are advised to attend programs and schools based on their own interests, abilities, and talents.

V – Equal opportunity:

Item 8 – In education, all individuals, men and women, are provided with equal opportunities. Students are both successful and lack economic resources to attend a school are offered several options such as dorm, scholarship, and study loans. Special units are designed to protect children with special needs.

IV – Non-free higher education:

Item 38 – Higher education is not free. However, students who show success or talent in an area are supported with several options such as registration fees, course fees, exam costs, scholarships, or free housing.

Specific training needs for ambassadors within our university.

Although there are not any regimented student ambassador programmes in Turkey, university students can represent their universities to prospective students in University Preference Fairs and voluntarily help other university students with special needs.

If there were student ambassador programmes in Turkey, student ambassadors should take the following courses and/or trainings.

- Communication skills
- University system, rules, and regulations
- Peer mentoring
- Inclusive education
- Self-assessment & self-knowledge
- Career planning
- Effective study skills, concentration, and motivation
- Basic humanitarian services

United Kingdom

The Office for Students (OfS) is an independent regulatory body that is responsible for disbursing funding for teaching to English Higher Education Institutions (HEIs). Funding for students to attend HE is available via publicly supported student loans from the Student Loans Company for tuitions fees and maintenance; all full-time students qualifying for courses can take out a loan to cover their tuition fees (Hubble and Bolton, 2018) whereas only students from low -socio economic backgrounds are entitled to full maintenance loans.

Under the Equality Act (2010) the OfS is legally obliged to address equality issues when making policy decisions regarding universities (OfS, 2018). All HEIs charging higher level tuition fees are legally obliged to ensure access and participation for students from all backgrounds (Higher Education and Research Act, 2017 & Equality Act, 2010). The OfS requires all universities planning to charge students higher level tuition fees to have an approved Access and Participation Plan (APP) <https://www.officeforstudents.org.uk/apps/>

HEIs must also ensure that they take reasonable steps to comply with their APP and publish an access and participation statement (OfS, 2021a). The OfS also sets out priorities for HEI access and participation activities. The focus of activity set out in APP plans varies between different groups of universities: the most selective HEIs focus predominantly on recruiting students from under-represented groups, while many Post 92 HEIs already recruit high proportions of under-represented groups and focus on their retention and success (Ayling & Gartland, 2022).

HE retention and success

HEIs use a range of strategies to meet the requirements of their APP plans and promote retention and success. Holistic approaches are seen as effective with a focus on HE cultures, approaches to learning and teaching, approaches to assessment, embedding support for employability and progression, and

a focus on the student experience and participation (Advance HE, 2022). Approaches and focus on supporting retention and success varies across the higher education sector.

Access and Outreach

HEIs have developed a range of access and outreach interventions with pre-entry students aiming to raise attainment, raise aspirations, support the development of soft skills and improve students' knowledge of HE.

In early 2022, in the aftermath of the Covid 19 pandemic, the OfS set out new priorities that included that HEIs should 'partner with schools and other local organisations to raise the attainment of young people' (OfS, 2022c, p.1). HEIs had to refocus their APPs to demonstrate how they were going to address these priorities (Ayling & Gartland, 2022). In response, HEIs have developed a range of access and outreach interventions with pre-entry students aiming to raise attainment, raise aspirations, support the development of soft skills and improve students' knowledge of HE. With the instruction to focus on raising attainment there has been a large increase on HEIs running tutoring programmes in schools, with this constituting 40% of all UK HEI outreach activity in 2022 (Ayling & Gartland, 2022).

The OfS also funds Uni Connect which brings together twenty-nine different partnerships across the country between HE and FE institutions, schools, and other local partners to deliver targeted and coherent outreach activity (NCOP, 2019). Uni Connect activity is driven by OfS key priorities: to support well informed decision making; to address local outreach gaps; to improve academic attainment and progress of school pupils; to offer an efficient route for schools and colleges to engage with HE outreach activity (OfS, 2022d). UniConnect and HEIs also support careers provision in schools and colleges and align activities to the Gatsby benchmarks (Ayling & Gartland, 2022)

Student ambassadors

Students employees and volunteers are used extensively in UK. HEIs and these students have various roles. Roles include simple marketing activity such as giving tours; widening participation activity to promote the inclusion of underrepresented groups. including outreach activity with pre-entry students to promote recruitment and progression to HE; as well as activity to promote HE retention and success. Student employee roles can involve working with groups of students and supporting activity planned by recruitment and widening participation teams and academics and/or more intensive one to one peer mentoring. The term student ambassador has been used as an umbrella term to describe student employees with these varying roles (Gartland, 2015) though there is often a distinction made between student ambassadors and student mentors.

Mentoring for retention and success

Mentoring activity aiming to support retention and success in HE varies across the sector. The focus on mentoring support and resources allocated to this within HEIs is dependent on their positioning in the sector and the requirements agenda set by their APP. Some HEIs have informal buddy schemes whilst others have more carefully designed programmes focusing on supporting success transition to HE for underrepresented groups. The organisation of mentoring schemes also differs between institutions and can be led by widening participation teams, student support teams or student unions. Student ambassadors undertaking mentoring activity have various titles such as peer mentor and learning champion. Literature points to the value of mentoring underrepresented groups in supporting self-efficacy and sense of belonging in HE, though there is more limited evidence of a direct

impact on retention and success (Collings, 2014; Accardo et al., 2019; Hillier et al., 2019; Rillotta et al., 2020; Venegas-Muggli, 2021; Beals et al, 2021).

Outreach with pre-entry students

In outreach activity, student ambassadors are widely considered role models to school students given their similarity in age, background, gender or interests, and they are a ubiquitous part of HE outreach programmes (Gartland, 2015). They are often recruited from underrepresented groups themselves and are considered an important bridge between students from underrepresented groups and universities (Gannon et al., 2018). Student ambassadors from underrepresented groups are seen as able to understand the challenges regarding university students from similar backgrounds face (Sanders et al., 2021). In Gartland's UK study (2014; 2015) ambassadors were often first generation in their family to progress to HE, and some had lived in the same disadvantaged geographical area as the pre-entry students they worked with and had at times even attended the same schools as school students.

Research exploring student ambassadors' work with pre-entry students indicates this has a range of benefits including developing subject specific skills, promoting motivation and commitment and improving knowledge and understanding of HE. Ambassadors have worked with younger school students in supporting learning of other languages and have been found to help build younger students' confidence, improve speaking skills and their knowledge of grammar, promote engagement with languages post 16 and knowledge of university (Bissoonauth-Bedford & Stace, 2017; Corradini, 2012). Student ambassadors have also been found to effectively challenge views about subject areas, particularly in STEM, promote engagement and enthusiasm, and interest in engineering (Williamson et al., 2014; Gartland, 2015; Miel et al., 2018). Sanders et al. (2018) found that inspirational talks given by student ambassadors from selective HEIs in the UK encouraged school students to apply to a wider range of HEIs and to more selective institutions.

Working as a student ambassador has also been found to benefit student ambassadors themselves including in supporting their own subject knowledge and improving their grades (e.g., Haas et al., 2013; Williamson et al., 2014; Gartland, 2015; 2016; Gannon et al., 2018), promoting their confidence, commitment to their studies and sense of belonging at university (e.g. Haas et al., 2013; Talbot et al., 2013; Gartland, 2015; 2016; Gannon et al., 2018) and supporting their development of communication and employability skills (e.g. Corradini, 2012; Ylonen, 2012; Haas et al., 2013; Gartland, 2015; 2016; Gannon et al., 2018).

University of Suffolk: Specific training needs for ambassadors

Outreach with pre-entry students

Existing training at UoS.

Mandatory training for ambassadors commonly focuses on safeguarding, effective presentation techniques, shadowing experienced ambassadors, behaviour management, knowledge of campus and understanding widening participation. Limited training time is also often allocated to graduate careers, mentoring techniques, training in subject knowledge, inclusive learning and teaching, and effective questioning. Training is usually provided by outreach staff and experienced ambassadors. Student support staff and careers teams also provide training in some institutions. Academic staff have

very limited involvement in training ambassadors (Zivtins et al, 2020 in Gartland & Negrea, 2022). As a Student Ambassador at UoS, training is currently limited to five compulsory online training modules which SAs need to complete: Fire Safety Interactive, Manual Handling Interactive, Health & Safety - We are all responsible, Safeguarding Children and Vulnerable Adults Interactive and COVID-19.

Extending training at UoS

Gartland (2016; 2020) highlights the vital importance of careful consideration of pedagogy in student ambassador outreach activity. A range of approaches to training ambassadors and supporting their work with pre-entry students has been identified in the literature. These approaches could support existing ambassador training at UoS. The importance of the development of training with a focus on the different purposes and learning contexts in which ambassador activities take place has been noted (Gartland, 2020).

Outreach. Extended training activities to support the work of ambassadors that could be developed include:

- collaboration and partnerships between the university and schools to inform the focus of outreach activity, develop knowledge of the school curricula, plan learning and teaching approaches, and develop detailed knowledge of school contexts and cohorts of younger students (e.g., Gartland, 2016; 2020; Bissoonauth-Bedford & Stace, 2017)
- collaboration between HEIs to develop workshops for student ambassadors providing a forum for sharing of good practice (e.g., Thole et al., 2013)
- student ambassadors observing and working with more experienced ambassadors and the provision of mentors for ambassadors (e.g., Williamson et al., 2014)
- developing presentation skills through observing and then practising presentations (e.g., Garner et al., 2018)
- practising and rehearsing hands-on learning and teaching activities that younger students will undertake (Gartland, 2015; Green, 2018; Halim et al., 2020)
- developing expertise in how to ask and answer questions (Anagnos et al., 2014; Moison et al., 2020)
- training on student ambassador roles in supporting the provision of careers information (not providing advice and guidance as they are not qualified to give this support. Training could include for example: understanding of how HE subject areas link to careers; signposting to different sources of information about careers and progression routes; how outreach activities relate to the Gatsby benchmarks (please refer to CIAG section for more information).

Retention and success

Training for ambassadors undertaking peer mentoring to support retention and success:

- Developing a collaborative approach to supporting effective mentoring has been found to be effective (e.g., academic staff, post-graduate students and student mentors liaising regularly to develop training, materials and emotional support for mentees (Beals et al., 2021)
- experienced mentors working with and supporting newer mentors (Moschetti et al., 2018)
- providing support in structuring mentoring meetings (e.g., in identifying specific tasks that must be accomplished by a mentor/ mentee in a given schedule or sessions planned around CV preparation, learning strategies and academic integrity) (Venegas-Muggli et al., 2021; Edwards et al., 2022)

Supporting the development of a community of ambassadors through face-to-face training events as well as social activities has been highlighted in the literature as an effective way to support the creation of a network of ambassadors, build a sense of community and create a sense of belonging and commitment to HE amongst student ambassadors from underrepresented groups (Baker & Sela, 2018; Anagnos et al., 2014; Williamson et al. 2014).

NATIONAL CAREERS INFORMATION ADVICE AND GUIDANCE (CEIAG) PRACTICES AND THE ROLE OF UNIVERSITIES IN ESTABLISHING A COLLABORATION WITH LOCAL INDUSTRIES

Romania

Counselling and Career Orientation Centres

In accordance with Ministerial Order no. 3235/2005, universities need to have Counselling and Career Orientation Centres in order to guide students in their own trajectories, which should include everything from offering information to helping them find jobs, and, most importantly, the counselling needs to be free for all students. Nevertheless, the centres are not promoted well enough amongst students, so not many actually benefit from them, and that they're largely understaffed.

Further on, In Romania, the National Order 1804/2012, Art 12. stipulates the structure of career counselling and guidance services, stating that counselling services in university education are provided through the career counselling and guidance centres in universities.

At the University of Bucharest Educational counselling is provided through the CEIAG centers aiming to support future students with:

- choosing their Bachelor's degree studies;
- choosing their Master's degree studies;
- choosing educational opportunities (practice internships, grants abroad etc.);

Here are some projects:

1. Career Education - this project is meant for high school students who wish to join a faculty. Within this caravan, presentations are held about what a career plan means, or a career decision, about how important self-knowledge is when it comes to choosing a faculty. Within specific seminars we talk about what career education entails and we promote the educational offer of the University of Bucharest.

2. The Different Week at the University of Bucharest - this project implies the development of non-formal activities for high school students and others. Every year, our visitors have been students of prestigious high schools in the country and of course, in Bucharest. The students ask for information regarding the study programmes, the credit system, the rules of the University of Bucharest, they ask about lodging, about how grants are awarded, about the libraries which exist in the University, about NGOs in order to perform volunteering activities, and about the academic life; they receive orientation and educational counselling, career counselling, as well as career education and information. Each meeting has ended in sessions of various questions and answers.

3. Alternative Lodging – the project has seen great success among students, as more and more join this programme. Through partnerships with private universities and companies which own private dormitories, the students who do not have accommodation within the University campus are directed to other lodging places, private dormitories, apartments or hosts. Every year there are approximately 400 students who use this type of services.

Also, professional counselling is provided . Through professional counselling we contribute to the planning of the direction of the students’ and of the graduates’ careers by mainly focusing on:

- Identifying the professional interests and the abilities through specific screenings
- Assistance in the creation of the instruments used to search for a job: a CV, a motivation letter
- Training for selection interviews for jobs
- Support in taking decisions regarding the career and in creating a personalized plan
- The identification of opportunities to develop the abilities and competences necessary on the labour market

Here are some ongoing Projects

1. UB Career Days

Within this programme there are presentations of well-known figures in the field, workshops for personal and professional development as well as other events meant to prepare the students for “the confrontation” with the labour market. Having reached its 6th edition, we are determined to make this event a tradition in the University of Bucharest, just as it was with the UB Education Fair.

2.THE LIVING LIBRARY – Chatting to Successful People

The Living Library works similar to a normal library, where readers borrow books in which they are interested and read them in a limited time, after which they return them to the library keeper for them to be made available to other people who wish to read them. At the Living Library, books come alive. The pages full of stories the reader browses are nothing else but the personal experiences which those who took the role of “books” choose to share during a relaxing conversation with their “readers”. Within the career event “THE LIVING LIBRARY – Chatting to Successful People”, the “books”

are represented by professionals from different fields of activities who are invited to tell their story in a direct dialogue with the “readers”, who are the students.

ANOSR is also a national stakeholder in peer to peer support counselling that is dedicated to students. The union provides support, knowledge and help for the future and actual students’ in need, working permanently towards equity and inclusion. Secondly, the union also stays in permanent contact with students from underrepresented categories in higher education and has dedicated projects that facilitate their course in higher education. To be more specific, some of the steps constantly undertaken by ANOSR in its activity are: dedicated social media groups for different categories of underrepresented students and periodic calls with them in order to acknowledge their problems and find together solutions that can be proposed and worked for further; constant communication with the local NGOs and regional meetings dedicated to the issues that appear in a certain region or university city; a public questionnaire on all ANOSR platforms and its website, where students anonymously address problems or unfortunate events and for which ANOSR comes with an answer and communicates with the institutions in question.

France

Careers Information Advice and Guidance in schools and high schools

Student orientation is built up from the sixth grade onwards and throughout the schooling process thanks to the "**parcours Avenir**", a regular dialogue between students, parents, teachers, educational advisors, school management and psychologists from the French Education Ministry.

Information and guidance centers (CIO), university information and guidance services (SCUIO), local missions, youth information centers (CIDJ): these information and guidance centers exist in all regions. These organizations cater to specific audiences: middle school students, high school students, students, and young people aged 16 to 25.

Parcours Avenir: the individual pathway for orientation and discovery of the economic and professional world:

- Improving the integration of young people and better preparing them for the professional world requires that each student be able to learn about the professions in their environment.
- The aim of the Avenir pathway is to enable each student from the 6th to the 12th grade to acquire the first keys to understanding the professional world in order to build his or her academic and professional orientation project.
- It aims to facilitate and develop exchanges between the school and the economic world, particularly at the local level.

At the middle school level, the Avenir pathway can be based on the EPI "discovery of the professional world", the observation internship in the 3rd grade, and on the middle school-high school discovery activities.

In both middle school and high school, it is based on a meeting with a professional, a visit to a company, participation in an educational project based on a spirit of initiative, commitment and group work (mini-company, mini-cooperative, competition, etc.). To do this, it can rely on numerous local partnerships and educational activities dedicated to discovering the professional world: School-Business Week, Social and Solidarity Economy Week at School, Women's Entrepreneurship Week, Industry Week at School, etc.

The "parcours Avenir" is developed by the head of the school in collaboration with the entire educational team.

Partnerships with economic, social and professional circles allow students to consolidate their knowledge and skills through :

- discovery activities (company visits, forums, conferences and debates)
- awareness-raising or training activities (presentations by company managers or professionals in classes as part of educational projects)
- immersion in the professional environment (class in a company, internships)
- accompanied projects (mini-companies, reports on professions).

During their schooling, students must have visited a company, met a professional (e.g. a professional from a sector comes to the school to talk about his or her job), participated in a project (e.g. a mini-company project), and completed an internship in the ninth grade.

At the middle grade school

The Avenir pathway is intended for all students from the sixth to the third grade, including those in a special education section (SEGPA) or in a localized unit for school inclusion (ULIS). This pathway helps to give meaning and value to the content of learning by promoting the link between learning and the discovery of the socio-economic world offered to students by the educational teams. Students learn about the training possibilities and access routes to the various professional fields available to them after high school. The pathway organizes the student's discovery of the complexity of any professional activity, the knowledge and experience that it requires. It should encourage commitment to an individual or group project by fostering creativity.

In high school

The aim of the Avenir pathway is to help students build a coherent training and orientation pathway that includes preparation for the post-bac, thus enabling students in the three educational streams to review, refine and consolidate their study choices - including apprenticeships - and career plans. For each level, the three objectives of the program are combined: the discovery of the economic and professional world, the development of a spirit of initiative and creativity, and the formulation of career choices, particularly in the context of active orientation.

It is also within the framework of the "parcours Avenir" that days of discovery of trades and the professional world are organized in the schools. These days are also an opportunity to discuss the possibility of taking a work-study program, either through an apprenticeship or in a vocational high school.

Examples of practices supporting CEIAG in Science

There are still too few women who take up a career in science. However, those who dare and try their luck are sought after by engineering schools, science faculties and recruiters. Work on orientation can encourage girls to enter scientific careers. One of the levers used here to overcome reticence is to present women working in the digital sciences.

The "1 Scientist - 1 Class, Chiche!" program

The "1 Scientist - 1 Class, Chiche!" program proposes a meeting between 10th grade students (general and technological high school and vocational high school) and digital scientists to arouse curiosity about digital sciences, enlighten career choices and spark vocations, especially among young girls.

The aim of this meeting is to host a scientist in school. The main goals are to give the desire to better understand digital science and more generally the impact of science in society, to introduce the world of research by telling the story of the careers of researchers to young people who may never have had the opportunity to meet and talk with a scientist, to encourage vocations, especially among girls.

For more than a year now, the associations Femmes et mathématiques and Animath, in collaboration with the Blaise Pascal Foundation, have been offering "***Girls, math and computing: a luminous equation***" days. These days take place all over France and help to promote scientific careers for girls, careers in which they are clearly under-represented. During these days, volunteer girls can learn about careers related to mathematics and computer science through a conference, a workshop, a speed-meeting and a theatre-forum.

The ***Faq2Sciences*** digital tool was developed by UNISCIEL, with the help of students, in order to allow high school students to position themselves with respect to the level expected and conducive to successful studies in science. This tool is a real challenge, both in terms of orientation and in anticipation of broader problems such as the high rate of repetition in the first year of a degree.

Encourage the development of collective science and technology projects

Each secondary school is invited to build and develop a collective science and technology project. Class or school projects, both cross-curricular and multidisciplinary, will be set up in close collaboration with the scientific and technological world, not forgetting the world of associations. To do this, the teaching teams will be able to use competitions or educational actions set up with school partners. All of these

measures are monitored by the local inspectorates and the academic delegations for artistic education and cultural action (DAAC).

C.Génial

The agreement signed between the Ministry of National Education, Youth and Community Life and the C.Génial Foundation aims to expand the C.Génial competition, allowing all middle school students to present an innovative project. The academic correspondents of "Sciences à l'École" are in charge of setting up the academic variations of the national contest in accordance with the agreement between the Ministry and the Foundation.

Course en cours

The Course en cours operation offers students the opportunity to design and build a mini racing car with the support of Dassault Systèmes and Renault. It is based on a project approach with the support of the Course en cours resource centers.

MathC2+

MathC2+, in conjunction with the Animath association and the Fondation des Sciences mathématiques de Paris, offers volunteer students mathematics courses outside of school (universities, research centers, large research and development companies, etc.) during the short vacations.

Guidance and Career in higher education

A vast literature indicates that students make better choices when they receive more information on higher education. In recent years, about 50 percent of new entrants to higher education have successfully completed their first year directly. The other half are equally divided between repeaters and those who reorient themselves or leave higher education (MSER, 2010). The importance of failure in the first year of higher education, and particularly in university, is often attributed to poor orientation, with most of the time the choice of enrolment pathway being poorly adapted to the student's profile (Gury, 2007). Up to 62% of high school students say they are poorly informed about the study paths available to them after the baccalauréat (Lemaire, 2004) (Pistolesi, 2015).

The different measures, grouped together under the heading of "active orientation," were defined by the law on university freedoms and responsibilities (LRU) passed in August 2007. This law defines career guidance and integration as one of the key missions of the public higher education service. More specifically, active guidance aims to advise future baccalaureate holders on their university career path and thus reduce the number of wrong orientations in the first year of study due to choices of course of study that would be unsuitable for the student's profile.

Generally, the French system is free and non-selective at the time of entry to university. Public institutions of higher education, mainly universities, are free to define the precise contours of active guidance. A number of universities have sought to strengthen ties with local high schools. Other universities, such as La Rochelle and Angers for example, organize days for the integration of high

school students into higher education programs. However, the vast majority of universities supplement the above measures with a system of individualized recommendations. These recommendations are sent directly to high school students based on the choices they have made through the Admission post-bac website

Some strategies of student support, orientation and counselling at the universities

Some universities organize refresher courses or help in finding an internship. All universities offer documentation and individual appointments with psychologists from the French Ministry of Education at the university's orientation and guidance offices.

It is generally possible to enter another field of study within your university: the training courses encourage progressive specialization, by offering multidisciplinary courses and semesters shared by several disciplines before choosing a single one.

Depending on the sections and the equivalences set up by the establishments, the reorientation can take place either after a validated 1st semester, or after a validated L1 in its entirety. Entry will be in the 1st or 2nd year, on a case-by-case basis.

It is not always necessary to wait a year to reorient yourself: work-study programs, especially apprenticeships, are available during the year (BTS, post-baccalaureate school, etc.).

Turkey

There are a few courses in the university which provide opportunities for students to get in touch with their future employers. For example, there are three such in the faculties of technology and innovation in Turkey courses: two summer internships and training at work. Senior university students taking the “training at work” course get paid, and Turkish Government contributes to their salary, tax, and insurance.

Additionally, there are following activities which provide opportunities for students to get in touch with their future employers.

- **Career fairs**

There are the career fairs held in the university campuses. In these fairs, human resources officials come from many important companies in Turkey. They give information about their work and internship opportunities, while also collecting resumes from alumni candidates. These fairs are a great

chance for business and internship opportunities. In addition, many university career centers provide students with a variety of consultancy services, including announcement of job opportunities for post-graduation career steps, interview simulation and resume creation (Study in Turkey, 2019).

With the aim of positioning Turkey as the “World's Talent Base”, Career Fairs, which have been successfully carried out for four years in 23 different points of our country and 14 different points in the world, under the coordination of the Presidential Human Resources Office, are starting this year with thematic fairs to be held in 3 cities at an international level.

For the first time in 300.000, the Century of Turkey, with the on-site participation of approximately 2023 young people; “International Health, Aesthetics and Medical Career Fair” will be held in İzmir, “International Agriculture and Forestry Career Fair” in Adana and “International Finance, Trade, Logistics and Informatics Career Fair” in Istanbul. To the said fairs; Ministry of Treasury and Finance, Ministry of Health, Ministry of Agriculture and Forestry, Ministry of Commerce and Ministry of Transport and Infrastructure and Presidency Digital Transformation Office, Presidency Finance Office and Presidency Investment Office will be partners. In addition to the Offices of the Presidency and related Ministries, university career centers will also assume responsibility at the Fairs (RayHaber, 2023).

Every year in March, Bilkent University holds a Career Fair hosted by the Bilkent Career Center in the Main Campus Sports Hall. Many companies send representatives to the event and offer a wide range of jobs and placements for new graduates. The Bilkent Career Fair attracts a large number of students who are looking for just the right job and internship opportunities. This event offers participated students the chance to meet and network with company representatives and hand in their resumes. The fair creates an informal, friendly environment where students can explore options, network, and start their career journeys (Bilkent, 2022).

There are also other virtual career events available on the Eventbrite website (Eventbrite, 2023).

- **The Career Gate and the National Internship Program**

Career Gate, integrated with e-Government, is a digital platform developed by the Presidency of the Republic of Turkey Human Resources Office in order to share public institutions’ career and internship opportunities with the public more effectively and ensuring merit-based equality of opportunity in public employment. Also, the Platform is integrated. Candidates will be able to apply job postings of all public institutions on the Career Gate Platform. Additionally, within the scope of the Internship Mobilization Program, students can benefit from internship opportunities of all public institutions and voluntary employers from the private sector through the Career Gate. It is aimed to share job postings in public institutions in a transparent and traceable way from a single platform that works with e-Government integration, as well as to make internship opportunities in the public and private sector accessible to all university youth with the Internship Mobilization Program. At the Career Gate, public institutions can be defined to the system by the higher institutions they are affiliated with, thanks to the KAYSİS integration in the system. The process of identifying private sector employers to the system is carried out by us if they send a request to kariyerkapisi@cbiko.gov.tr. Students can log in to the

system with their e-Government password (Presidency of the Republic of Turkey Human Resources Office ,2023).

- **Teknofest**

The studies intended at developing national and original technological products and systems in accordance with the aims of Turkey's development and strengthening its independence in all spheres are being carried on. The most important elements of these studies are the fact that all social layers are motivated in line with this purpose, and the education and the support of human resources who will develop advanced technology projects. One of the prerequisites for succeeding in this process that could be defined as "the National Technology Initiative" is to be able to make progress in the spheres of aerospace, regarded as the locomotive of high technology projects around the world. TEKNOFEST Aerospace and Technology Festival is Turkey's first and only aerospace and technology festival that is organized by the Turkish Technology Team Foundation (T3 Foundation) and the Ministry of Industry and Technology, and supported by institutions that play a crucial role in Turkey's technological development. The most important element of the paradigm shift that is needed for Turkey to strengthen its competence and to have a voice in technological spheres is to raise society's support to the national technological development process and to contribute to a qualified human resource that is educated in the related spheres. Every individual's faith with the same ideal and excitement in our country's capabilities, strength, and future, in accordance with the goals above-mentioned, provides a basis for "National Technology Initiative." One of the prerequisites for achieving these goals is to be able to have a voice in spheres of aviation and space, regarded as the locomotive of high technology projects all around the world. With the fair event areas, airshows, seminars, and events, it was aimed to increase the interest of all segments of the society in the National Technology Initiative. It is also aimed to contribute to our country's educated and qualified human resources, with these activities and the technology competitions that will be organized in 41 different categories this year. The Festival is accessible for visitors of all ages and professions, and free. The visitors under the age of 13, whose participation is specifically welcomed, will be accepted with their parents or teachers. The main purpose of TEKNOFEST Technology Competitions is to contribute to our country's educated and qualified human resources and to develop our national technology ecosystem in this sense. We aim to support the competitors with Q&A sessions, training, technical visits that will be realized between the finalization of applications for the competitions in which the future technologies are central, that are realized in different spheres and the competitions, alongside with equipment support, as well as to give them time that is needed to produce their own technological equipment and ideas (TEKNOFEST, 2023).

- **Seminars/conferences**

There are virtual seminars or conferences available on the Eventbrite website such as developing resumes, getting help with applying for your other country's work visa, meeting employers and applying for jobs and trainings on how to find the dream jobs (Eventbrite, 2023).

- **Personal contacts**

The owner of companies in the organized industrial sites which are located closed to universities calls the dean of the faculty or any academic staff

Careers Information Advice and Guidance

Careers provision in schools

The limited provision of Careers Education Information, Advice and Guidance in schools has been a longstanding concern in England (House of Commons Education Committee, 2013; Moote & Archer, 2018). In 2012 Connexions, the independent government funded careers advisory service for students aged 13 to 19 (up to 25 for students with learning difficulties) was discontinued and local authority-maintained schools were given legal responsibility for providing impartial careers guidance to pupils in Years 9-11 (many academies and free schools are also responsible for providing impartial careers advice). Critiques of this change in approach have been widespread, especially given the increasingly marketized school system which sees schools and colleges in competition for students (e.g., House of Commons Education Committee, 2013). Moote and Archer (2018) note significant inequalities in the distribution of Careers Information Advice and Guidance (CIAG) with students from disadvantaged backgrounds less likely to access CIAG than their more advantaged peers. CIAG provision is important as research indicates students' subject and career interests start to form in the early years of their secondary school education (Osborne & Archer, 2007; ASPIRES, 2013) and clear links have been identified between school students' aspirations and the occupations they later move into (Croll, 2008; Archer et al., 2014: 58).

Due to these ongoing concerns, the "Baker Clause" was introduced in 2017 in an attempt to ensure schools provide students with access to information from training providers and colleges. Since 2020 the government has required schools to work towards all of the eight Gatsby benchmarks (<https://www.goodcareerguidance.org.uk/case-study/a-stable-careers-programme>):

- A stable career programme.
- Learning from career and labour market information.
- Addressing the needs of each pupil.
- Linking curriculum learning to careers.
- Encounters with employers and employees.
- Experiences of workplaces.
- Encounters with further and higher education.
- Personal guidance.

HE outreach activity and UniConnect support schools and colleges with careers provision aligning activities to the Gatsby benchmarks.

Careers Education, information Advice and Guidance for current students

There is considerable variation across the sector but most HEIs provide HE students with careers services such as CV writing and help with interview preparation. Most HEIs also provide careers support through work experience placements, a year in industry and placements with partner HEIs

and some provide support for entrepreneurship, self-employment and start-ups. HEIs also provide mentoring programmes, for example between students, and with alumni and employers. HEIs also embed employability into the teaching curriculum.

Employment sectors in the region

Suffolk is predominantly a dispersed rural economy and predominantly low-skill and low-wage (UoS APP, 2022). There are several growth areas for employment in the East of England region where the University of Suffolk is located. These include: energy, agri-food tech, digital tech, ports and logistics, life sciences and bio-economy, health and social care, advanced manufacturing and engineering, emerging technologies, financial services, construction, creative industries, visitor economy, learning and skills (NEWANGLIA, LEP for Norfolk and Suffolk) <https://newanglia.co.uk/sector-skills-plans/>).

Current Careers provision at the University of Suffolk

Pre-entry students

Unibuddy: Unibuddy connects prospective students with student ambassadors and academic staff members. When looking at going to university, pre-entry students might have a lot of questions such as:

- How do I apply to the University of Suffolk?
- What courses are offered and how to find out more?
- How can I become a Student Ambassador?
- What accommodation is available on and off campus?
- What else does the University offer? Societies, student life, events etc

Unibuddy enables pre-entry students to chat to student ambassadors and academic staff, so their questions can be answered by people who have experience of university and can help to provide pre-entry students with the confidence to make an informed decision and easy transition into university life. (<https://www.uos.ac.uk/unibuddy>)

UniCamp: UniCamp is a summer school offering a university experience for students in Year 12 (or equivalent). Students have the chance to take part in a variety of university-style subject tasters, preparing for university workshops, as well as team-building and social activities. It provides an opportunity for students to learn about higher education at the same time as developing key transferable skills that will be useful at university.

Care Leavers: The University of Suffolk participates in the National Network for the Education of Care Leavers eastern region group. The network aims to provide opportunities and support for looked after children and care leavers to progress to university, including through annual residential programmes, university application support and drop-in sessions to offer advice and support for starting university.

NEACO: The Network for East Anglian Collaborative Outreach (NEACO) is part of the National Collaborative Outreach Programme (now Uni Connect) and aims to help young people from East Anglia with little or no experience of university to explore the world of HE. For example, NEACO is working with UoS to run SPLENDID, a non-residential event over two days that aims to support students identified as having a physical or specific learning difficulty or disability to find out about university life and hear about opportunities and support HE can offer.

NEACO formerly worked with students in Years 9-13 who live in areas identified by the Government with low rates of progression to higher education but is currently being phased out. As a result, it has changed its way of working and no longer works with Year 9 students. NEACO does however undertake strategic outreach with Years 7-11. This is outreach support for any student that is part of an 'underrepresented group' including looked after children, military families, estranged students, GRT community, BAME students, low socio-economic status. From 2023-24 NEACO also will be offering attainment support, in line with the institution's APP.

HE Family Zone: The HE Family Zone was developed in recognition that it is sometimes helpful to talk parent to parent. The university has teamed up with twelve Suffolk based Parent Carer Ambassadors who are parents who have been through the process of supporting a young person's journey through higher education and want to share their experience. It is their priority to give non-biased advice that focuses on giving other parents the tools they need to make informed decisions. The team contribute to school parent events and university open days. Outside of these events they have produced a collection of blogs, podcasts, and videos for parents to access in their own time.

Current HE students

CIAG is offered to UoS students by the Careers, Employability and Enterprise Team who a range of services and support including:

- one to one CIAG support
- advice and support in job and postgraduate study application
- events and opportunities to meet employers
- support for business start-ups and freelancing
- opportunities for work experience, micro-placements, paid internships and volunteering roles
- online career development platform and job board
- FutureMe Award (a self-directed career development award that is recognised at graduation via HEAR).
-

Opportunities for extension activities in supporting Careers Information Advice and Guidance for pre-entry students

Arguments have been made for embedding careers education in lessons in schools. For example, Reiss and Mujtaba (2017) argue that embedding careers education in lessons could effectively promote interest in STEM careers and uptake of STEM subjects post-16 (Reiss & Mujtaba, 2017).

Given the demands for schools to meet the Gatsby Benchmarks, matching outreach activity to Gatsby benchmarks activities is an effective strategy in promoting buy in from schools. CIAG has been found to be effective when integrated into WP outreach activities (such as summer schools and taster sessions). A recommendation from reviews (Gartland & Negrea, 2022) was that IAG outreach activity should particularly focus on transition points to motivate and support students in making informed subject choices.

PRACTICES AND PEDAGOGIC STRATEGIES FOR WORKING WITH GROUPS OF STUDENTS UNDERREPRESENTED AT UNIVERSITY

Romania

Some underrepresented groups with which ANOSR works are students with disabilities, Roma students, students who are part of other ethnic minorities (e.g. Bessarabian students). On this matter, ANOSR has as NGOs members several organisations that work directly with these causes.

The Romanian National Institute of Statistics data show low participation rates in higher education for students from disadvantaged groups such as (UEFISCDI, 2015):

- Students from poor backgrounds;
- Students from rural backgrounds;
- Students with disabilities;
- Roma students;
- Mature Students (over 30 years old);
- Parents' educational attainment;
- Students with children;
- Immigrant students;
- Working students;
- Ethnic Romanian students coming from abroad

On the matter of support services for students with disabilities in HEI, ANOSR wrote and proposed a national methodology that contours a national framework for action, setting minimum standards for

the implementation of university services for students with disabilities, as well as the listing of rights for them.

At the national level, there is no comprehensive data on the number of students with disabilities in higher education and their disaggregation by categories of disabilities. In 2011, in accordance to the data collected by ANOSR and published in an 2011 analysis, it was showed that 0.11% of students are classified as students with disabilities, in the context where 2.06% of adults in the 20-29 age group years had disabilities (ANOSR, Equity in Education - Situation student dormitories in Romania, 2011). Moreover, the analysis identifies the shortcomings of the spaces of accommodation for students with disabilities, as well as the inapplicability of the legal provision regarding awarding the individual accommodation subsidy for students with disabilities. The data collected at the European level (Eurostudent VI, 2018) confirms that students with disabilities are one of the deeply underrepresented categories of students. Thus, although at the current time 3.79% of the population has a form of disability, in relation to the student population the percentage drops to 1.3%. Also, Romania is in second-to-last place in EHEA in regards to the number of students with health problems and disabilities enrolled, with a percentage of 8%, at 10 percentage points lower compared to the average of the countries included in the study (18%).

Some key aspects are raised by ANOSR in the proposed methodology, such as:

- the existence of dedicated support departments for students with special educational requirements - ensuring and establishing minimum conditions for the operation of this structure in all higher education institutions;
- differentiated funding for universities dedicated to students with disabilities;
- introducing different inclusion courses for both teachers and students;
- strategies for improving inclusion and access to HE.

In working with the underrepresented groups, there are different support activities provided by the UB Learning Centre that cover a wide range of topics and include career counselling and career guidance; development of academic writing skills; development of critical thinking and scientific reasoning skills, as well as coaching and personal development in the area of social and emotional skills.

Thus, first year students can participate in sessions on Career Management: How to establish harmony between career and personal life, Goal Setting - The Key to Success and Career Choices - My Conscious Decisions! They can also opt for workshops on Public Speaking - The Red Thread of Speeches, Critical Thinking: Training and Application and Personal Development: Making My First CV.

Students can also be guided on how to make a visual aid for presentations and become familiar with elements such as the theme and purpose of the speech, the speech form (presentation, interview, protest, advertisement, product launch, etc.), the core of the speech, and elements of improvisation.

Social Awareness: Empathy - A Superpower for Valuable Relationships are some of the workshops aimed at developing social and emotional skills. They are designed for students to fully understand concepts such as 'stress', 'distress', 'defence mechanisms' and 'coping', to identify stressful situations as well as their own reactions to stress, and to manage emotions and stress to regain motivation. Thus, by attending these sessions, students have the opportunity to learn both active, problem-focused strategies and passive, emotion-focused strategies, while developing a critical attitude towards the effectiveness of stress management strategies.

France

French Policy of Ethnocultural Neutrality: An Obstacle to Identifying Underrepresented Student Groups and the Pedagogical Practices to Support Them

The policy adopted in France considers the French nation as the overcoming of all tribal, ethnic, religious, regional or dynastic affiliations. This policy guarantees ethnocultural neutrality in all areas of life. Instead, it creates other institutions that ensure the coercion and cohesion of all communities (Schnapper, 1994). The cultural values of groups therefore have no place in the public space because they risk confining the citizen, depriving him of his freedom and the possibility of communicating with others. Belonging to a specific group should not prevent the citizen from deploying his talents, from carrying out his experiences, from expressing his point of view and from exercising his rights. In short, he is invited to free himself from prescribed roles and to have the capacity to break with the determinations characterized by his historical origin, his beliefs and his religious practices, which lock him into a culture and into a destiny imposed by his birth (Schnapper, 2000, p. 26). French politics is therefore rather unfavorable to taking into consideration local situations or particular interests of groups (Fenet, 2016).

This is why, in terms of education and teaching, France has decided that "the School of the Republic" and the university are "central tools for the training and development of the young generation" (Lenoir, 2006, p. 48). Their mission is to educate them, to instruct them and to transmit the same culture without any distinction, while at the same time ensuring the promotion of republican values to the detriment of the values of specific groups and transforming members of all groups into citizens, thanks to the transmission of the same knowledge and know-how, of a language, of the national ideology and of the common historical memory through the content of the teaching. The objective of the school is thus to allow homogenization, cultural unity and to give "to all the intellectual capacities necessary to really participate in public life" (Schnapper, 2000, p. 95). The school as well as the university are thus the environments of the formation of the "citizenship by excellence".

The educational, cultural or instructional contents are therefore not community-based. They are supposed to be objective and universal. In other words, secularism (secularization of society) is a source of inspiration for the realization of the republican values that should characterize the school. For many years, this model used in France succeeded in integrating people from different European groups and was able to respond effectively to the multicultural reality. Until the Second World War, the overcoming of community cultures allowed young Europeans to acquire not only knowledge and know-how, but also a tradition and universal values.

This French policy of ethno-cultural neutrality and its success especially in terms of integration has limited further studies on the problematic of underrepresented groups in France and the accompanying practices. However, in the last 60 years, the arrival of several immigrant populations from different backgrounds has changed the situation and challenged this model. Assimilation can no longer cope with the demands of the growing number of ethnic communities from all over the world who are aware of their rights (Lenoir, 2006).

Underrepresented student groups and pedagogical practices facilitating their academic inclusion in France

Today, we can identify some underrepresented groups in universities in France and in our university in particular. Among these students are those from immigrant backgrounds who represent more than 10% of the overall number of students in the city of Angers. In fact, there are about 5,000 foreign students in the various higher education institutions. There are also less than 500 students with disabilities in the city. There is also a small number of students from non-Christian religions, notably Muslims, but for reasons of secularism, their number remains unknown.

In order to facilitate the inclusion of these students, French universities deploy several pedagogical practices and strategies. We will discuss here the practices and strategies observed in our Catholic University of the West. However, these practices and strategies are perhaps not specific to our university. Among these practices, we will present

1. Tutoring.
2. Alternate learning or training courses
3. Group work (aimed at mutual aid in learning)
4. Support systems for students with disabilities in their learning process
5. Licence Plus or a propaedeutic year (a year of refresher courses for students from immigrant backgrounds or with learning difficulties)
6. TREMLIN and OPEN support system for students with learning difficulties.

1. Tutoring

Like other French universities, the UCO uses tutoring as a means of supporting its students in their learning and academic integration. Tutoring is a pedagogical procedure to address the specific cognitive, social-emotional, motivational and metacognitive needs of a student or group of students (Papaïoannou, Tsioli and Vihou, 2015). It was around the 1990s that France introduced the policy of tutoring in higher education (Annoot, 2012). Today, Tutoring is developing in this university thanks to the teachings or institutional policies promoting student engagement. Indeed, the UCO favors in several training courses opened in different faculties, the student commitment in the solidarity actions in the learning notably in the support to the accompaniment of vulnerable students in scientific subjects (mathematics) or linguistics (English languages).

In this practice and strategy of support in learning, the student tutors commit to providing a certain number of hours per week or per month to their classmates. At the UCO level, this practice is mainly developed between the Faculty of Science and the Faculty of Education. It mainly meets the needs of students in the Faculty of Education who wish to work in the teaching profession. Indeed, to enter this profession, the interested parties are called to pass the written and oral exam. The first one is composed of mathematics and French language. Accompaniment and support in mathematics

proved to be very necessary for some students who had not followed this discipline for several years of study, as it is not part of the training offered in some schools. Even though this tutoring strategy only concerns vulnerable students, they benefit from it and allow them to succeed in their learning.

This tutoring in learning is also thought in the operation of godfather and godmother opened at the beginning of each year between the students who pass license 2 and the newcomers. This operation is carried out in the form of a lottery, with each new student enrolled in the first year of the degree program drawing lots to select a sponsor. The role of the latter is to accompany his or her godchildren in the process of their integration into the university both academically and socially. They provide support in explaining course content (especially since they often have the same teachers and follow the same training model), in registering for exams, in finding relevant scientific works and especially in finding places to do internships. This bond often turns into a friendship and the students concerned continue to help each other not only in their university studies but also outside of them.

Generally speaking, the objective of tutoring is to avoid failure, dropout of students coming from underprivileged classes as well as inequalities at universities. The fact that tutoring is free of charge and is carried out between peers is a royal way to success. Indeed, student tutors better understand the problems, difficulties, needs and concerns of their peers in vulnerable situations. Since they are going through almost the same situations and are called upon to carry out the same academic projects as part of their studies, and since they often have personal discussions and exchanges, student tutors are well placed to provide answers and even solutions that can contribute to the self-esteem and success of the tutored students. Moreover, the bond that is created between tutored students favours their professional integration. Fredy-Planchot (2007) and Papaïoannou, Tsioli and Vihou, (2015) state that the role of tutoring is recognized in both the integration and transfer of knowledge in the world of work.

2. Alternance in apprenticeship or internship training

The alternation is a method of university training very widespread in France. This method is also used in the universities of the region, including the Catholic University of the West. In the latter university, students take a break of one or two weeks without going to the university, but in a company. In the courses where tutoring is offered, practical training periods based on professional activities within a structure (association, company) follow one another with training periods at the university. This work-study system is an important aid for students in difficulty or from disadvantaged classes because it is considered "a remedy for certain dysfunctions, whether unemployment or academic failure" (Causse, 2021). Indeed, the host structure introduces the student to work values, time management, creativity, etc., skills that underrepresented students often lack.

Concerning these underrepresented students at the university, it should be recalled that it was towards the end of the 1980s that work-study contracts became possible in professional higher education in France, to solve the problem of students in difficulty (Fourdrignier, 2007). For these students, work-study contracts are a work method that allows them to be in contact with real life and facilitates their integration into the professional environment and to make sense of their learning, because it is based on putting them in situations and on carrying out experiences within structures (associations, companies). In other words, since students from working-class families "have been victims of the exclusion caused by the great closure of school and the school-based formatting of knowledge" (Derouet, 2005), the opening up of work-study programs would be a response to this exclusion for them.

In addition to this system of alternation, we also note that almost all the training offers at the Catholic University of the West propose obligatory professional training courses throughout the

training. This internship of at least one month in a professional environment allows students to observe and discover the organization of professional structures, to confront representations with reality, to observe and analyze the functioning of a service, to question the posture of professionals, to analyze their practices from the observation of a practitioner, to build their professional projects, etc. The internship proposal in this university evolves at each level of study. In the first year, students generally discover the different professions, professional postures, and the functioning of structures. In the second year, they actively participate in several missions with the support of a professional. Finally, students in the third year carry out activities independently. They develop programs and tasks and take responsibility for their implementation.

Are these new forms of training (work-study and internship) offered at the various universities in the region, particularly at the UCO, university programs that are favorable to young people from working-class families, or do they consist in reinforcing their vulnerability? The initial purpose of the work-study system or of these internships in professional environments is to allow students, especially those who are underrepresented and vulnerable, to familiarize themselves with the world of work. The work of Pinto (2014) specifies that these learning practices are great riches for students, especially those from disadvantaged families. However, some researchers such as Derouet (2005) alert us to the fact that these new forms of training mainly alternation and the exponential development of unpaid internships, could be a form of method used to exploit these young vulnerable students. Often the work done by these young students and which brings profits to the company is not paid at the level of the quality and quantity of production.

3. Group work

In some faculties of the UCO, more particularly in Education Sciences, group work occupies an important place in the teaching. It represents $\frac{3}{4}$ of all the training in this faculty of education. Let's recall that this teaching practice consists in having a small group of students, often 3 or 4, work on the same project or activity. Each student is invited to collaborate and cooperate in a responsible manner with the members of the group. This teaching practice helps develop social skills. Indeed, students from different cultures, with different values and skills or with different cultural and economic capital, are associated within the same group to achieve the same task. They learn at the same time and learn together the disciplinary knowledge. Often, they are called upon to present their group work to their classmates. The feedback and questions from their classmates allow them to master the concepts covered, thanks to the explanations given to the group and the rephrasing of their comments.

With group work, we move from a transmissive pedagogy to a constructivist pedagogy that helps all students, especially those in difficulty or underrepresented, to learn from others. This mix allows these vulnerable students to discover other ways of thinking, doing, acting, explaining, etc., which are often expected not only in university courses, but also in companies or other structures that will recruit them for work. In other words, these group works help them to access the expected language codes and norms on the academic, professional and social levels. For this reason, Stern (2003) emphasizes that group work would allow to wait not only for maturation, that is to say the capacity to assume one day the adult state, but also for autonomy, because it helps the individual to adapt and to insert himself in the best way in the social reality. For him, group work offers real possibilities of relational learning, facilitating words to be "heard in the places, in the times and by the people with whom they will be able to make sense (...) and "to take into account what is lived or acted in the informal and formal fields".

In our teaching experiences in the field of education, teaching and training, we have found that students do not form groups by any affiliation (social, ethnic, cultural or religious), but by affinity.

In some courses, the teachers do not leave the choice to the students in the process of group composition. They constitute them themselves (the teachers) taking into account the competences of the members of each group. In this type of teaching practice, each student has only one objective: to succeed in the activity or task requested by the teacher. However, success is not possible without the group. It depends categorically on the other members of the group. We notice in the end that this practice and learning strategies allow students from underrepresented or vulnerable groups to integrate socially but also pedagogically into the class group. They express themselves freely and their views count as those of their classmates. In any case, they are expected to perform the same activities as others and contribute to the success of their groups.

4. Supporting students with disabilities

The issue of inclusion of students with disabilities is of concern to universities in the Western region of France, in particular the Université Catholique de l'Ouest (UCO). In addition to the work related to the accessibility of knowledge and places of learning and socialization, this university has decided to set up courses and training to raise awareness of disability among both teachers and students.

Concerning the accessibility of knowledge, the university provides students with disabilities with note-taking aids for students with physical disabilities who cannot write and accepts the presence of pets during class time and individualized support for students with visual disabilities. It allows students with these specific needs to go out freely during class time and during evaluation, while respecting medical instructions related to the implementation of extra time during evaluations for dyslexic students, etc.

As for the question of sensitizing other students and teachers to disability, the UCO offers courses or training on this issue in certain training programs, particularly in the Faculty of Education. For example, at the undergraduate level, the Faculty of Education offers courses in French sign language so that students can communicate with other students and people who are deaf. The development of simple interaction of the deaf language, through role-playing and simulations and on simple everyday topics are for example elements in the program of this teaching. In other words, other students are trained to understand, communicate and answer simple questions on familiar topics or on what the person needs immediately.

The faculty also offers a course on disability, society and education. In this teaching different forms of disability are studied so that others can not only interact with their classmates with disabilities, but also accompany and support them in their daily lives. In this teaching, students address, for example, the issue of taking care of "dys" students in order to develop adequate professional postures (identifying the different behavioral manifestations; knowing the diagnostic approaches and orienting the family entourage; developing tools and strategies adapted to each student in order to favor his/her academic success, etc.). They understand the field of visual impairment (to be aware of the specific needs related to the various forms of visual impairment, to be able to identify the specific needs of visually impaired students, to situate the place of the various educational actors acting with visually impaired students, to know the main arrangements and tools available facilitating the inclusion of students with disabilities in the school environment, etc.). In this teaching, the issue of attention deficit disorders with or without hyperactivity occupies a central place (identify the different symptoms; address the different approaches to medication and behavioral interventions, promote academic success through adapted postures and strategies, etc.).

In addition to the courses offered to students, the university also provides training for teachers at all levels so that they can better support young people and students with disabilities. In

short, to facilitate the inclusion of underrepresented students, especially those with disabilities, the university focuses on their needs in terms of accessibility to knowledge and learning spaces, but also offers training to other students and professionals who are supposed to accompany them on a daily basis.

5. LICENCE+ or a propaedeutic year

The licence + or propaedeutic year is a refresher year offered to high school students and students from immigrant backgrounds who do not have the necessary skills or do not feel ready to start university studies. Their bachelor's degree lasts four years instead of three.

The objective of this program is to allow students to

- ✓ Gradually enter into the discovery of the field of university education.
- ✓ Discover jobs in different fields.
- ✓ Discover the methodology of university work: methodology, digital culture, tutoring.
- ✓ Reinforce their basic knowledge of French and English.
- ✓ Strengthen one's skills in argumentation, discussion and analysis.
- ✓ Learn about pedagogical concepts.

The advantage of this arrangement is to help the student to:

- ✓ Capitalize on ECTS.
- ✓ Give access to high school students to succeed at university.
- ✓ Access to pedagogical engineering adapted to a new public (tutoring, accompaniment...)
- ✓ To reflect on professionalization within the training offer.
- ✓ Begin university studies (feeling of belonging to a "classic" university class)

Among the skills targeted in this scheme, we note in particular

- ✓ Identifying and mobilizing the main concepts.
- ✓ To be able to easily use the different registers of written and oral expression of the French language.
 - ✓ To use written and oral comprehension and expression in at least one modern foreign language with ease.
 - ✓ Use digital reference tools and computer security rules to acquire, process, produce and disseminate information and to collaborate internally and externally.
 - ✓ Identify the process of production, dissemination and valorisation of knowledge.
 - ✓ Identify and select various specialized resources to document a subject.
 - ✓ Characterize and enhance one's identity, skills and professional project in relation to a context.
- ✓ Step back from a situation, evaluate oneself and question oneself in order to learn.
- ✓ Develop an argument with a critical mind.
- ✓ Respect the principles of ethics, deontology and environmental responsibility.
- ✓ Work in a team as well as independently and responsibly in the service of a project.

6. TREMLIN and OPEN: A system for defining a career plan

These two programs are offered at one of the schools associated with the UCO called IFFEUROPE. TREMLIN is a 6-month program for students who interrupt their studies during the year or during the university cycle and "who wish to develop their career plans and question the meaning of their professional life". This program provides better support for students in order to successfully change their orientation through structuring training. It is thanks to the support provided by individual

interviews, group sessions (on orientation, self-knowledge, and openness to social issues) as well as a 4-week individual internship in a professional environment that students are able to find their direction.

It is important to note that this program is particularly aimed at students who drop out during the year or cycle and who leave the university system without any qualifications. The counsellors take into account the student's professional and personal project in their orientation. In other words, in this system, the assumption is made that the student's professional and personal project plays an important role in his or her university integration. This structuring course therefore allows them to take their future in hand, by enhancing the months following a "drop-out". This training allows students to deepen what gives meaning to their existence, to acquire theoretical foundations, working methods and field experiences to lead their life project, especially in the professional field.

According to IFFEUROPE, this course aims at the following objectives

- ✓ To mature and implement one's orientation project: which studies? for which professional project?
- ✓ To know oneself better and gain self-esteem and self-confidence.
- ✓ Acquire a better perception of the world's issues (meeting people from different sectors, solidarity experience, internship in a professional environment, etc.)
- ✓ Develop human and professional skills.
- ✓ Rediscover a dynamic of success in one's studies.

In addition to the TREMPILIN program, IFFEUROPE also offers a one-year OPEN program. The objective of this training is to enable students to gain confidence. In this training, the coaches also help the students to define their professional projects, with more emphasis on what gives meaning to their existence. As in the LICENCE+ program, the OPEN program allows students to acquire the theoretical foundations, work methods and internship experiences to project themselves into the future with confidence and enthusiasm.

This program is designed for young people who have completed high school (the baccalaureate), with or without previous experience in higher education. They want to take the time to develop their future career in a supportive educational environment. They want to gain confidence in themselves, in others and in the future, to discover and give the best of themselves and thus become passionate professionals.

Through the various workshops, seminars and field experiences, students will be able to take responsibility, learn to make choices and become the author of their lives. Students define and begin to implement their professional project thanks to individual coaching interviews, group sessions (orientation, self-knowledge, openness to societal issues) as well as a 4-week individual internship in a professional environment.

The objectives of the training device are:

- ✓ To gain confidence in oneself and in one's potential
- ✓ To identify one's convictions and motivations
- ✓ To broaden one's awareness of social issues and find one's place in the world
- ✓ Build a career plan that gives meaning to one's life

Definitions of special support groups

The groups defined as disadvantaged are students with special needs, students who live in rural or underdeveloped regions, students who live in poor neighborhoods, Gypsy students, students who are exposed to any sort of violence, students whose first language is not Turkish, international immigrants.

And recently, families who either work as seasonal laborers or live as nomadic – migrant people are also classified as disadvantaged, and their children were give the rights to complement their education with extra support.

Higher Education Institutions disabled consultancy and coordination regulations unit is in the higher education institution that generates regulations for making the higher education easier for the students with special needs.

Examples for inclusive practices

- “Come on Girls, Let's Go to School”: Intended for the poor regions (especially the southeast where the girl participation in primary education was way lower than boys.) (Duration: 2000-2010) (Yazan, 2014)
- Student ambassadors project in a university: In order to make renovations on methods of teaching, and study materials for the largest distance education university (Anadolu University) in Turkey; student ambassadors were asked for their opinions and ideas. Changes in teaching and curricular material were accomplished with such a contribution by the student ambassadors.
- 2021 classifications for university efforts to address handling student with disabilities:
 - Orange Flag accessibility of physical areas (52 of 197 applicant universities received this flag for 129 topics),
 - Green Flag accessibility on educational resources (21 universities applied for this category, 14 universities received this flag),
 - Blue Flag accessibility on socio-cultural activities (6 universities out of 24 applicant universities received this flag) (Council of Higher Education, 2021)
- Quota regulations: Some regulations, in favor of students with disabilities, were developed such as reserving 10% of the programs only for them. The programs entitled under this regulation are the ones who select students based on some form of talent such as music, painting etc. (Council of Higher Education, 2018)
- Special student housing regulations for higher education dorms:
 - Ramps: Whenever stairs exist at the entrance of buildings, there have to be ramps and/or elevators.
 - Bedrooms: At least one bedroom in any dorm is accessible by disabled students with conditions determined in terms of size and other standards.
 - Restrooms: There has to be at least one level of a dorms is specially designed for the students with special needs (Council of Higher Education, 2020).
- Support for the integration of Syrian children: Syrian kids attending school: 938k; Syrian kids not attending school: 432k; universities host 50k Syrian students. Total Syrians 3.8M. A program called “The integration of Syrian children to the Turkish educational system” has started in 2016. Outputs of this project are:
 - increasing the access of the Syrian children to the education,

- enhancing the capacity of the institutions and the educational work force in helping Syrian children,
- increasing the educational quality of the Syrian children (Arik Akyuz, Aksoy, Madra and Polat, 2018).
- Educational rights of the people in prison: Prisoners continue to have all the rights except for what they were prisoned for. Prisoners are allowed to take exams designed by the Student Selection and Placement Institution (SSPI) of Turkey. Under the supervision of a security official, prisoners can take their regular educational tests (Turkish Ministry of Justice, 2007).
- Exam support service examples:
 - Visually disabled candidates: Student Selection and Placement Centre (SSPC) publishes all the voiced digital documents. For these students, too complicated questions, that are hard to deliver by voice, are not asked. Students can request larger font sizes.
 - Hearing despaired candidates: SSPC exam documents are published with sign language. Students can request that they need a hearing device for the exam. (All electronic devices are prohibited during regular exams)
 - Candidates with diabetes: Candidates who have a record of diabetes can request to have their medication and medication related devices (insulin pump, food, sugar tests etc) into the exam site (SSPC, 2008).
- Removing cost of education from the students with disabilities: Students with %40 or over disability are discounted for any and at any amount of educational costs based on their disability level (Mugla Guidance and Research Center, 2018).
- Course exemption for students with disabilities: Students who cannot meet the requirements of a course at a college, by the approval of the instructor and the university, can take the course by some eliminations or modifications. If the students still cannot meet the needs of that course, that student can take another equivalent course (Council of Higher Education, 2009).
- Cost regulations for the students with disabilities: Individuals who lost their ability to work at %60 or more level, which is certified by a report from a group of doctors, are no longer need to pay their higher education study loans (General Directorate of Loans and Dorms, 2017).
- Dorms for the students with disabilities: According to the regulations of the Institution for the Loans and Dorms; students with more than %40 disability can stay at a dorm which is nearest to their most comfortable location (Mugla Guidance and Research Center, 2018).

United Kingdom

Underrepresented groups in HE

Socioeconomic Status

Studies continue to demonstrate that students from higher socioeconomic /affluent background are more likely to attend universities compared to their poorer counterparts (Sanderson & Spacey, 2021; Rose & Mallinson, 2020; Younger et al., 2019). Recent government statistics reveal that ‘young people who were not eligible for a for free school meals (FSM) at age 15 were 70 per cent more likely to enter higher education by age 19 than those who were’ (OfS, 2022a, p. 2).

Gender

British working-class boys: Citing the then Education Secretary, Damian Hinds, et al. (2019, p.9) reported that white British working-class ‘boys are the least likely of any large ethnic group to go to University’.

Female students: The latest statistic shows that in 2020/21, 50.6 per cent of female students entered HE by age 19 compared to 38.4 per cent of males while 12.7 per cent of female students gain admission into high tariff, HE by age 19 in 2020/21 compared to 10.1 per cent of male students (The U.K. Gov. 2022a). Women remain significantly underrepresented in core STEM subjects (physical sciences, mathematical sciences, computer sciences and Engineering and technology) constituting only 26% graduates (24,705 in total) in 2019 (STEM women, 2022).

Ethnic minorities

White pupils: Regarding access to HE, the latest data from the U.K. Government (2022a) shows that of all the ethnic groups, white pupils were the least likely to progress to HE by age 19 at 39.7%, compared to 48.1% for Mixed, 62.1% for Black, 65.7% for Asian and 81.0% for Chinese pupils

Minoritized groups (e.g., Black Caribbean) However, in her analysis large scale national attainment quantitative data set Crawford (2019) was able to show that ‘far from being ‘oppressed’, White boys continue to enjoy achievement advantages over numerous minoritized groups; especially their peers of Black Caribbean ethnic origin’ (p. 423).

BAME: In relation to attainment, studies have found that Black, Asian, Minority Ethnic (BAME) graduates are 13 per cent less likely to be awarded a high degree classification (Williams et al., 2019). Compared to their white counterparts, black graduates are also less likely be in employment or postgraduate programmes a year after graduating (OfS, 2021; Cramer, 2021; Jankowski, 2022; The U.K. Gov. 2022b).

Gypsy Roma and Traveller of Irish heritage pupils: Of all the ethnic group however, Gypsy Roma and Traveller of Irish heritage pupils are the least likely to progress to HE ((OfS, 2021a).

Special Education Needs & Disability (SEND)

Latest government data shows that in September 2020/21 only 8.7 per cent of pupils with SEND progressed to HE by the age of 19 compared to 48.6 per cent of pupils with no SEND.

Looked After Children Only 13 per cent of pupils who were looked after continuously for 12 months or more on 31st March 2017 progressed to HE by age 19 by 2020/21 compared to 45% of all other pupils (The U.K. Gov. 2022a).

Target groups for the University of Suffolk

Access to HE

Whilst the University of Suffolk caters for high numbers of students from lower socio-economic groups, eighteen year old students from areas of multiple deprivation (according to the IMD) are comparatively underrepresented. Another group currently underrepresented is part time students

from areas of multiple deprivation. There are also gaps in access between white and Black, Asian and ethnic minority groups. Care leavers are also a target group (UoS APP, 2022).

Continuation and attainment

There are some gaps in continuation and attainment between students from lower socio-economic groups and students from more affluent backgrounds. Students with mental health issues also have lower continuation rates than other students and there is a gap in attainment rates between students with disability and other students. Additionally, there is gap in attainment between Black, Asian and ethnic minority groups and white students. Care leavers are also a target group (UoS APP, 2022).

Effective practices and pedagogic strategies

Supporting HE outreach activity with pre-entry students

Research widely points to the value of on campus activity (e.g., Cotton et al., 2013). Rose and Mallinson (2020) in their review of UK outreach programmes, note the benefits of summer school attendance for students from underrepresented groups. Summer schools were found to narrow the gap in HE applications and students, notably from poorer backgrounds, were more likely to apply to university generally and to apply to more selective universities. Summer school attendance has also been associated with increased confidence and higher Level 2 (GCSE) grades (Cotton et al., 2013). However, on campus activity is high cost and limit the number of students who can be reached. Holistic approaches involving whole classes of students in school are seen to have the potential to reach more underrepresented students but do not so effectively target specific groups (Gartland & Negrea, 2022).

According to Office for Students (OfS) in the UK (in Harrison, 2018), interventions targeting 16–19-year-olds are effective in influencing the choice of subject and institution rather than widening participation, as the effects of disadvantage are already manifest by the time students reach Level 2. Harrison (2018) argues that the aim of outreach, targeting young people under 16 years, should be to increase their expectations, attainment and familiarisation with HE so that they can make informed

choices about HE progression. Harrison (2018) proposes interventions at four points: firstly, to expand the pool of HE related possible selves available to them; secondly to reinforce young people's belief in their ability to be successful through supporting them with short-term tasks and reflection that demonstrates their potential; thirdly, to support young people in developing detailed visions of themselves in the future in order to provide motivation; and finally to expose young people to a campus environment and provide motivating experiences, opportunities for collaboration with HE students, and information about graduate careers and other opportunities to enable them to envisage themselves as a student and/or graduate. Harrison (2018) contends that the four intervention points reinforce each other, and single one-off interventions are unlikely to be effective.

Hayton and Bengry-Howell developed the NERUPI framework to plan and evaluate and research university led outreach interventions. This framework draws on Bourdieusian theories of habitus and capital and highlights five aims of HE WP activity. These aims include to 'develop students' knowledge

and awareness of the benefits of HE'; 'develop students' capacity to navigate HE and make informed choices'; 'develop students' confidence and resilience' to manage the challenges of HE; to 'develop students' study skills' supporting academic attainment; and to contextualise subject knowledge and 'develop students' understanding by contextualising subject knowledge' (2016: 47-48).

Student ambassadors have been widely found to support HE WP activity. The identity of student ambassadors and their intersecting identities (such as gender, socio-economic status, ethnic identity, cultural background and regional identities) with the younger students they work with, is widely seen to be important. Also, the subject expertise of ambassadors and their enthusiasm and commitment to their studies is significant to working relationships. Ambassadors' and younger students' shared subject interests was found to positively impact on their working relationships. Alongside subject expertise, research highlights the value placed on student ambassadors' communication skills, a quality often required in recruitment of ambassador. Gartland (2014; 2015) highlights the importance of intersecting identities with gender being particularly significant (Gartland, 2014). Shared interests in subject disciplines, and student ambassadors and younger students coming from the same school or geographical area and able to share similar life experiences, also powerfully supported developing relationships (Gartland, 2014)

Student ambassadors worked in secondary school classrooms over several language lessons, facilitating learning and providing younger students with opportunities to practice their language skills. Ambassadors worked with younger students in school classrooms and were positioned as facilitators (in support roles)). Younger students noted that ambassadors being present contributed to a more relaxed and informal atmosphere in the classroom (Corradini, 2012; Bissoonauth-Bedford & Stace, 2017).

Current examples of practice at the University of Suffolk in Supporting Retention and Success

The University of Suffolk applies block design of learning and teaching at the undergraduate level, which a model of immersive modules, where students are taught one subject at a time rather than multiple modules simultaneously. While such approach allows students to focus intensively on one area of their studies, there is a risk of discontinuity of skill development and transfer across modules and towards future careers. The Covid-19 pandemic has also presented a challenge for the current generation of school graduates, with impacts on skill development opportunities and outcomes. However, it presented opportunities for maximising the potential of online and blended learning.

Therefore, a platform for extended learning and skill building complementing the University's block learning and teaching approach has been developed that serves as a connecting component. "The Learning Hub" is a resource pool of online, interactive, activities centred around the learning dimensions of University Life and Wellbeing, Academic, Transferable and Employability skills aligned to the Skills Builder Framework. Themed learning activities maximise the use of the interactive components of the blended learning environment and encourage progressive and active learning towards becoming independent learners. The activity pool is available to students and lecturers providing an accessible, flexible and sustainable learning and teaching resource.

The Learning Hub activities support students' individual learning needs, equalising opportunities for success in the academic environment across a diverse range of learners. Activities include e.g., IT skills,

presentation skills, referencing, building resilience and time management. Key aspect of the Learning Hubs is active learning, self-experience through applied problem solving and opportunities to meet as a learning community of peer-mentors across year groups.

ACTIVE EXPERIENTIAL LEARNING ACTIVITIES (IN STEM, HEALTH, SS&H AND ARTS)

Romania

Project-based learning to solve real-world problems (Hmelo-Silver, C. E. (2004). Problem-based learning, on the other hand, is a general term that can apply to a variety of activities, including but not limited to project-based learning.

The version of problem-based learning I do with my students is hypothetical, comprehensive, and multi-perspective problem solving. Students identify a real-world community problem, research the problem from a variety of perspectives, explore solutions, and develop comprehensive plans to solve the problem. The plans are hypothetical. Students do not act on their solutions, although they might do so if you chose to make it part of the experience.

Self-directed project-based learning is an excellent experiential learning activity for so many reasons. Experiential learning engages students, emphasises real-world issues and concepts, is authentic and collaborative, personalised and student-led. In short, this is self-directed PBL. Project-based learning is based on a unique framework with specific PBL components that make it what it is. Project-based learning is not an old poster project. Project-based learning includes authentic learning experiences and community collaborations. Students develop innovative final products to demonstrate learning and share their final products with a relevant audience, not just their classmates. It is a sustained inquiry that takes time. (Bagheri, et al. (2013)



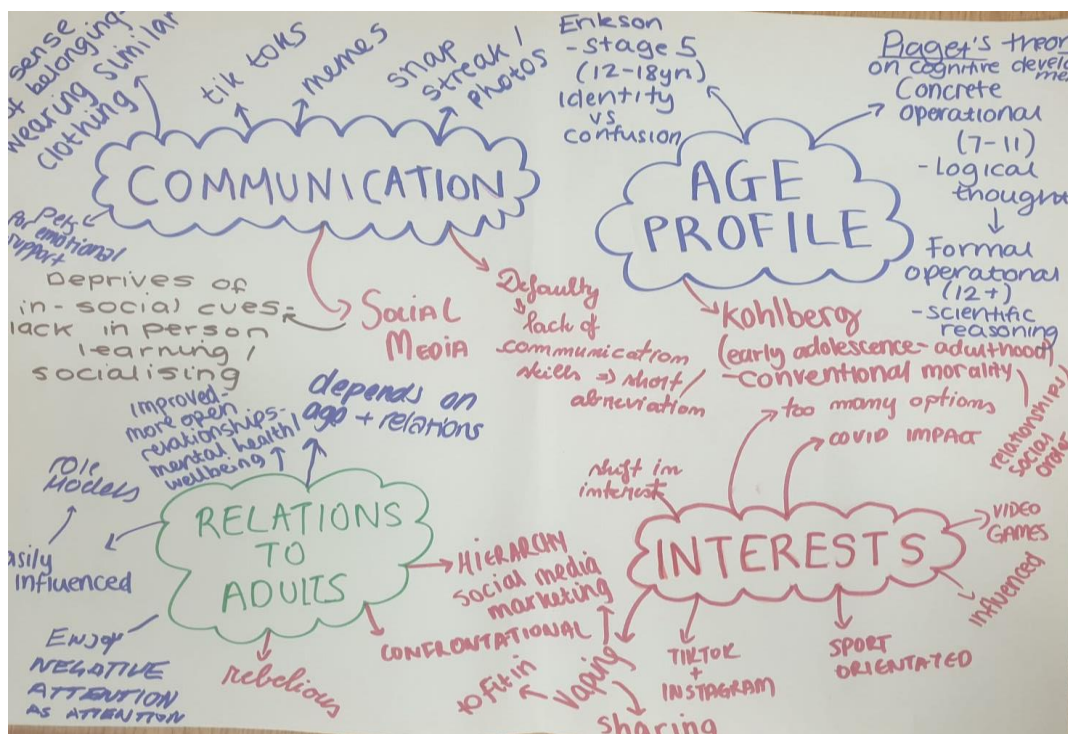
Community action projects are above all time-consuming and require a high degree of independence on the part of the learner, especially if you adopt a learner-centred approach. Community action projects have evolved into a combination of project-based learning, problem-based learning, and service learning (Casswell, 2000). Students, if self-directed, choose a community issue under a theme you assign (e.g., water quality) or a theme they identify and choose as their topic. They research that issue, gather information from a variety of community sources, explore viable solutions, develop a course of action they themselves might take, and take action.

Summer universities for highschool students are projects created and mostly coordinated by students, which help to prevent school dropout. They come to the aid of students who are undecided about the faculty they want to attend or those who want to convince themselves if the faculty they are thinking of going to is right for them. 10th and 11th grade graduates can try student life by applying

to the summer universities involved in the project, having the opportunity to go to courses and seminars, feel the excitement of exams, participate in trainings, debate important issues for education and the most important: to feel what it's like to be a student.

Both student and student representatives believe that the necessity and importance of the project is given by the fact that the counselling and guidance services in the pre-university and university environment are currently unable to offer real help to final year students who do not know what college to focus on after graduation. A study on the dropout rate in higher education, published by the Executive Unit for the Financing of Higher Education, Research, Development and Innovation (UEFISCDI, 2022) shows that for 3 and 4 years undergraduate programs, in the case of fee-financed students, the dropout rate is 55.11%, compared to that among students in the budgeted regime, respectively 38.12%. The most common reasons that lead them to drop out are related to the fact that they chose the wrong college or they run into financial problems caused by the fact that they could not estimate the true costs of student life. In addition, many students do not know from the beginning that they can get involved in student unions, what rights they have and how to defend them, or what opportunities the host city offers them.

These types of events offer a clear context of interaction between students and highschool students, through different kinds of activities (educational, social, cultural etc.). ROSE Projects are specifically dedicated to pupils from underrepresented groups that want to participate in summer universities and they contribute significantly to their Career Guidance.



Forum theatre is one of the techniques under the umbrella term of Theatre of the Oppressed (TO) (Phillip B. Zarrilli, 2002) and it is used by ANOSR in its projects, with the aim of exploring solutions to oppression featured in the performance. This relates to the engagement of spectators influencing and engaging with the performance as both spectators and actors, termed "spect-actors", with the power to stop and change the performance (Paul Dwyer, 2004). The activity allows the students spectators to collaborate in the experience by becoming 'spect-actors' (the audiences who participate in the actual performance). Through a moderator (Joker) and a group of actively engaged spectators, Forum Theatre embodies dialogues, exchanges, learning, teaching, and pleasure. At the conclusion, the play

will begin again with the audience being able to replace or add to the characters on stage to present their interventions; alternate solutions to the problems faced.

France

Active experiential learning activities (in STEM, Health, SS&H and Arts)

First of all, it is important to recall that the ideas of experiential and active activities have their origins in a pedagogical method called "learning by doing" developed by John Dewey in the early 20th century in the United States. This method aims at learning through and in action. This is why Dewey's school proposes concrete activities that must respond to the students' innate desire to learn. Dewey believes that education must be pragmatic, starting from the students' interests, their daily lives and developing their autonomy. It is therefore the experience that is at the center of learning. The main objective of this type of method is that the activities carried out during the learning process should lead to a final product. In other words, the students work collectively in a class group, get involved and play an active role, and work towards a concrete production (Philippe Perrenoud, 2002).

In order to implement this type of experiential learning activity in school programs, especially in the scientific field, schools in France promote an operation known as "La Main à la Pâte" or hands-on in the American method. This operation allows students to be actively involved in more concrete learning situations while doing science.

Operation "La main à la pâte" as a pedagogical approach promoting scientific practice in schools in France

The pedagogical approach known as "La main à la pâte" in France proposes pedagogical activities close to the activity of scientists. These activities put the student in a position to question, reflect, explore - by observing, experimenting, modeling, searching for information - and to reason, individually and in groups. At the same time, this approach reconciles the methods of the scientific community and its modes of reasoning with its values (the desire to rely on evidence and solid arguments and the construction of knowledge based on exchanges between peers). The La main à la pâte program also emphasizes the history and functioning of science (the scientific spirit, linked to the development of critical thinking). This pedagogical approach is for French teachers who practice it, a relevant tool mobilizing both the curiosity and the attention of students. Moreover, it generates meaning in their learning both in and out of the classroom. As an example, we will present below some examples of experiential learning activities related to school programs using the "La Main à la Pâte" operation.

Presentation of the experiential learning activity in Chemistry by age level.

One of the experiential learning activities in Chemistry using the "La Main à la Pâte" pedagogical approach consists in combining art and chemistry. For example, you can make your own natural paint from pigment powder, understand what gives objects their color, discover the secret of paintings through chemistry, etc. These free online classroom activities have been developed for cycles 2/3/4 (primary and secondary school). They allow to discover several points of the program around paints and dyes to explore their composition, their properties and their evolution through the ages. These activities combine science, visual arts and art history sessions.

In elementary school, many activities allow to work on language, especially during the sessions dedicated to the description of paintings.



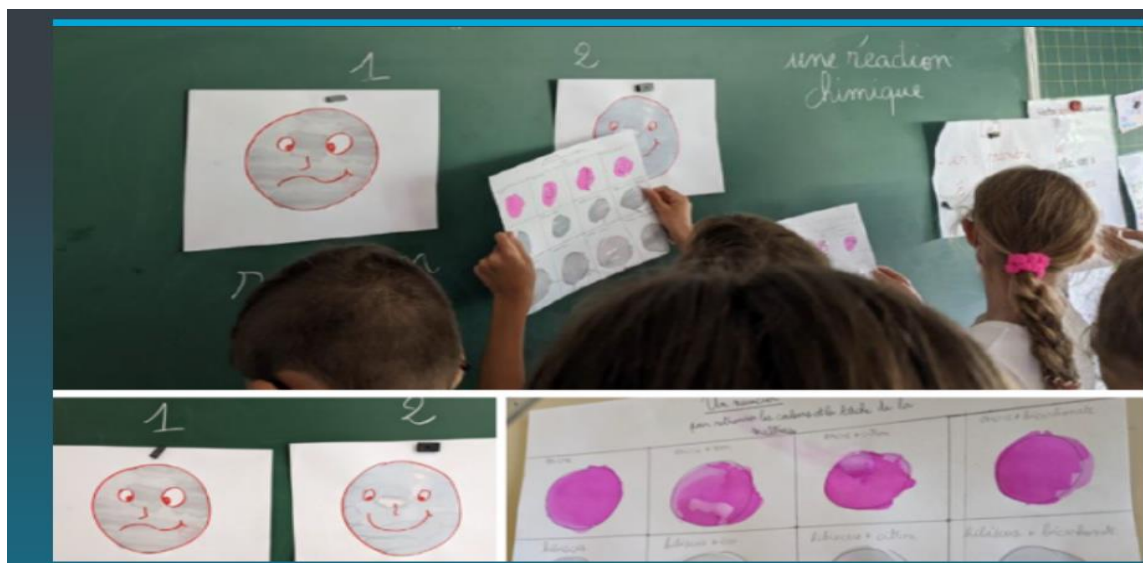
While observing rock paintings, the teacher questions the students on how these works were made. Students test their hypotheses by trying to make their own paint. The teacher then suggests that they compare their results with gouache paint and find a way to modify the texture of their paint (see the detailed sequence on the artist's palette in the appendix or by clicking on this link On the artist's palette (fondation-lamap.org). Using a card game, students match the experimental protocols they have imagined and implemented with the major stages in the history of painting techniques. Finally, the teacher suggests that they look at the media they can use to make their creations.



Activity sequences in chemistry at the elementary school level proposed by La Main à la Pâte Foundation. See the following link [On the artist's palette | La Main à la pâte Foundation \(fondation-lamap.org\)](http://fondation-lamap.org) [Sur la palette de l'artiste | La Fondation La main à la pâte \(fondation-lamap.org\)](http://fondation-lamap.org)

At the junior high school level, some devices using the pedagogical approach of "La Main à la Pâte" are used to apprehend, for example, the notion of chemical transformation through an artistic investigation (see the detailed sequence in the appendix or by clicking on this [Appréhender la notion de transformation chimique au travers d'une enquête artistique \(fondation-lamap.org\)](http://fondation-lamap.org)). This is the

case of a lesson on the transformation of a work of art where the teacher can invite the students to conduct their own experiments to identify the sources of alteration of a work of art. By studying the influence of certain products (lemon, sodium bicarbonate solution) on the color of juices and infusions, the teacher leads the students to grasp the notion of chemical reaction.



Activity sequences in chemistry at the secondary school on chemical transformation through an artistic investigation. Sequence proposed by the foundation La Main à la Pâte. See the following link <https://fondation-lamap.org/sequence-d-activites/apprehender-la-notion-de-transformation-chimique-au-travers-d-une-enquete>

In this device using the pedagogical approach of "La Main à la Pâte", students can also be encouraged to carry out science experiments at home with the help of their parents. These experiments are proposed and carried out according to the age and level of the students. For example, for students aged 5 to 8, they can conduct experiments on problems posed around the lesson theme (see the attached document on what parents can do with their children at home or the following link: How to separate colors.pdf [Comment séparer les couleurs.pdf](#)). As for the students from 6 to 12 years old, they can, for example, carry out experiential learning activities around the theme of light and shadow (see the attached document on what parents can do with their children at home or the following link: [6.12 ans - Comment créer une ombre.pdf](#)).

Turkey

Among the domains of STEM, Health, SS&H and Arts, only experiential learning activities in STEM have been recommended by Turkish Ministry of Education. Therefore, there are limited resources in other domains. One of them is the DeM project funded by European Union, and it aimed to translate the experiential learning activities in to Turkish. As of 8, March, 2023, there were only 16 experiential learning activities on the website (Experiential Training Center, 2023). However, the activities were not linked to any experiential learning theories such as Kolb's Experiential Learning Theory.

Experiential learning activities in STEM

Uygur (2019) underlined that many teacher trainings for science and math teachers about STEM had been carried out in Turkey, and one of them was in Ege University in Izmir on 15th – 26th June 2015 and 2nd – 8th September 2015.

In 2016, Ministry of National Education, General Directorate of Innovation and Educational Technologies (YEGİTEK) in Turkey published a STEM education report. This report was prepared by considering the opinions of specialists, academicians and STEM teachers by a team of teachers who work in Ministry of National Education, General Directorate of Innovation and Education Technologies and have academic background on STEM education. It included an extensive literature review on STEM illustrating the definition and background of STEM education and a critical examination of studies on STEM education conducted in United States of America, Russia, China and European Countries. This report discussed how STEM education can be integrated into Turkish education system and recommended a STEM Education Action Plan (YEGİTEK, 2016).

In 2017, with TÜSİAD (The Turkish Industry and Business Association) and PwC published a report whose title is “The STEM Need in Turkey for 2023”. This report demonstrated the importance of STEM fields and STEM skills. The report also included information about Turkey’s ranking in relation to emerging and developed countries in terms of the number of STEM graduates, and changes in this ranking over the years. In addition, PwC analysed and forecasted the employment need in STEM fields and the number of potential employees expected to graduate from STEM-related departments and join the workforce, outlining STEM employment needs by industry.

In 2019, YEGİTEK (2019) published sample lesson plans related to standards-based STEM applications for pre-school and primary school teachers.

Example: An Experimental Study About the Application of Kolb’s Learning Cycle on Biology Lesson (Güneş, 2017)

“1st lesson: 45+45=90 minutes

Subject: Cell division and its significance; the types of cell division (mitotic and meiosis division); prophase, metaphase, anaphase, and telophase of mitotic division; and cytokinesis.

1. Phase (Concrete Experience-CE): The lesson started off by showing students information was given and no comments were made while students, whose attention was drawn to the subject, were examining the materials demonstrated to them. Afterwards, a silent animation was displayed to the students. Meanwhile, all of the basic concepts (cell division, interphase, prophase, metaphase, anaphase, telophase, cytokinesis, chromosome, chromonema, chromatid, sister chromatid, isochromatid, DNA, aster and spindle fibre, nuclear, nuclear membrane, nucleolus, centriole, centromere, metaphase surface, diploid chromosome, haploid chromosome, amitosis division),

which were to be mentioned in the lesson, were written on the board. By drawing students’ attention to the subject, it was aimed to enable them to think, feel the situation, and see the phases taking place in the event; so that they would have an experience, equal to concrete experience.

2. Phase (Reflective Observation-RO): First of all, two voluntary students were chosen as clerk. Afterwards, by paying regard to the concepts written on the board, the photographs and figures they viewed, the animations they watched; the student were promoted to brainstorm in order to make them find and understand the concepts about the subject and the events taking place in the phases of mitosis division. The clerks wrote the thoughts of the students, which were later discussed, on the board. Meanwhile, no information about the subject was revealed and no comments and directions were given. In this phase, in which the teacher pretends to be the moderator, the activities had the intention to promote students to develop a different perspective and more deeply think about the experience, which was supposed to be acquired by the students in the previous phase called concrete experience.

3. Phase (Abstract Conceptualization-AC): The subjects, including cell division and its significance, types of cell division, and the phases of mitosis division, were taught by the teacher by using a computer. Afterwards, animations about the subject were displayed out loud. The concepts, mentioned while discussing mitosis division, and the phases of mitosis division, were explained and later the slides of the mitosis division phases, were distributed to the students and were individually examined by them on the microscope. During their examinations, the students were asked to answer the previously determined questions; and they were individually talked to while they were in front of the microscope. Thereby, in this phase, theoretical information regarding the subject was transformed to the students in a specific order.

4. Phase (Active Experience-AE): The students were asked to draw what they saw in the microscope. Later, those drawings were investigated and existing errors were corrected and students were made to collect those drawings. The pre-prepared study papers were distributed and completed, examined and given back to the students after correcting the errors. Next, the students were asked to examine those study papers and put them in their folders. The groups, which were constituted according to the learning styles in the class, were asked to study in groups; prepare models or posters irrelevant to the lesson based on their own preferences; and bring them to the next lesson. By doing so, it was intended to enable students to apply the information, they acquired in the previous phases, on other situations.

2nd lesson: 45+45=90 minutes

Subject: Meiosis division and its importance, the phases of meiosis division, phase I of meiosis and its prophase I (leptotene, zygotene, pachytene, diplonema, diakinesis), and metaphase I, anaphase I, and telophase I stages.

1. Phase (Concrete Experience-CE): The posters and models, which were brought to the class and conducted on phases of mitosis division mentioned in the previous lesson, were examined, discussed; and existing errors were corrected. Later, they switched to the subject of the day. Firstly, original photographs and drawings of meiosis division's meiosis I phase, prophase I (leptotene, zygotene, pachytene, diplonema, diakinesis), metaphase I, anaphase I, and telophase I stages, were demonstrated to the students. Then, a silent animation was displayed. Meanwhile, all of the basic concepts (cell division, interphase, prophase I, metaphase I, anaphase I, telophase I, cytokinesis, chromosome, chromonema, chromatid, sister chromatid, isochromatid, homolog chromosome DNA, aster and spindle fibre, nuclear, nuclear membrane, nucleolus, centriole, centromere, metaphase surface, diploid chromosome, haploid chromosome, zygotene, pachytene, diplonema, diakinesis, synapsis, tetrahe, diathe, chiasma, crossingover), which were to be mentioned in the lesson, were

written on the board. By drawing students' attention to the subject, it was aimed to enable them to think, feel the situation, and see the phases taking place in the event; so that they would have an experience, equal to concrete experience.

2. Phase (Reflective Observation-RO): By paying regard to the concepts written on the board, the photographs and figures they viewed, the animations they watched; the student were promoted to brainstorm in order to make them find and understand the concepts about the subject and the events taking place in the prophase I of meiosis I stage of meiosis division (leptotene, zygotene, pachytene, diplotema, and diakinesis), as well as in metaphase I, anaphase I, and telophase I stages. The clerks wrote the thoughts of the students, which were later discussed, on the board. Meantime, no information about the subject was revealed and no comments and directions were given. In this phase, in which the teacher pretends to be the moderator, the activities had the intention to promote students to develop a different perspective and more deeply think about the experience, which was supposed to be acquired by the students in the previous phase called concrete experience.

3. Phase (Abstract Conceptualization-AC): The leptotene, zygotene, pachytene, diplotema, and diakinesis occurring in the prophase I of meiosis I stage; and metaphase I, anaphase I, and telophase I stages were demonstrated to the students via computer. Afterwards, animations about the subject were displayed out loud. The concepts, mentioned while explaining all stages of Meiosis I, were explained; and later the slides of the phases of meiosis I, which were distributed to the students, were individually examined by the students on the microscope. During their examinations, the students were asked to answer the previously determined questions; and they were individually talked to while they were in front of the microscope. Thereby, in this phase, theoretical information regarding the subject was transformed to the students in a specific order.

4. Phase (Active Experience-AE): The students were asked to draw what they saw in the microscope. Later, those drawings were investigated and existing errors were corrected and students were made to collect those drawings. The pre-prepared study papers were distributed and completed, examined and given back to the students after correcting the errors; furthermore, the students were asked to put them in their folders. The groups, which were constituted according to the learning styles in the class, were asked to study in groups; prepare models or posters irrelevant to the lesson based on their own preferences; and bring them to the next lesson. By doing so, it was intended to enable students to apply the information, they acquired in the previous phases, on other situations.

3rd lesson: 45+45=90 minutes

Subject: Prophase II, metaphase II, anaphase II, and telophase II occurring the meiosis II stage of meiosis division; and the comparison of meiosis division; and cell cycle.

1. Phase (Concrete Experience-CE): The posters and models, which were brought to the class and conducted on prophase I, metaphase I, anaphase I and telophase I of the meiosis I phase of meiosis division mentioned in the previous lesson, were examined, discussed; and existing errors were corrected. Afterwards, they switched to the subject of the day. Firstly; original photographs and drawings about prophase II, metaphase II, anaphase II, and telophase II occurring in the meiosis II stage of meiosis division, were demonstrated and a silent animation was displayed. In the meantime, all of the concepts, that were to be mentioned in the lesson, were written on the board. By drawing students' attention to the subject, it was aimed to enable them to think, feel the situation, and see the phases taking place in the event; so that they would have an experience, equal to concrete experience.









2. Phase (Reflective Observation-RO): By paying regard to the concepts written on the board, the photographs and figures they viewed, the animations they watched; the student were promoted to brainstorm in order to make them find and understand the concepts about the subject and prophase II, metaphase II, anaphase II, and telophase TI stages of meiosis II stage of meiosis division; as well as the events occurring in the comparison of mitosis and meiosis division; and cell cycle. The clerks wrote the thoughts of the students, which were later discussed, on the board. Meanwhile, no information about the subject was revealed and no comments and directions were given. In this phase, in which the teacher pretends to be the moderator, the activities had the intention to promote students to develop a different perspective and more deeply think about the experience, which was supposed to be acquired by the students in the previous phase called concrete experience.

3. Phase (Abstract Conceptualization-AC): The subjects including prophase II, metaphase II, anaphase II, and telophase II occurring in the meiosis II stage of meiosis division; and the comparison of meiosis division to mitosis division; and cell cycle were explained by the teacher via computer. Afterwards, animations about the subject were displayed out loud. The concepts, mentioned while explaining the subjects, and afterwards; the slides of the phases of meiosis II, which were distributed to the students, were individually examined by the students on the microscope. During their examinations, the students were asked to answer the previously determined questions; and they were individually talked to while they were in front of the microscope. Thereby, in this phase, theoretical information regarding the subject was transformed to the students in a specific order.

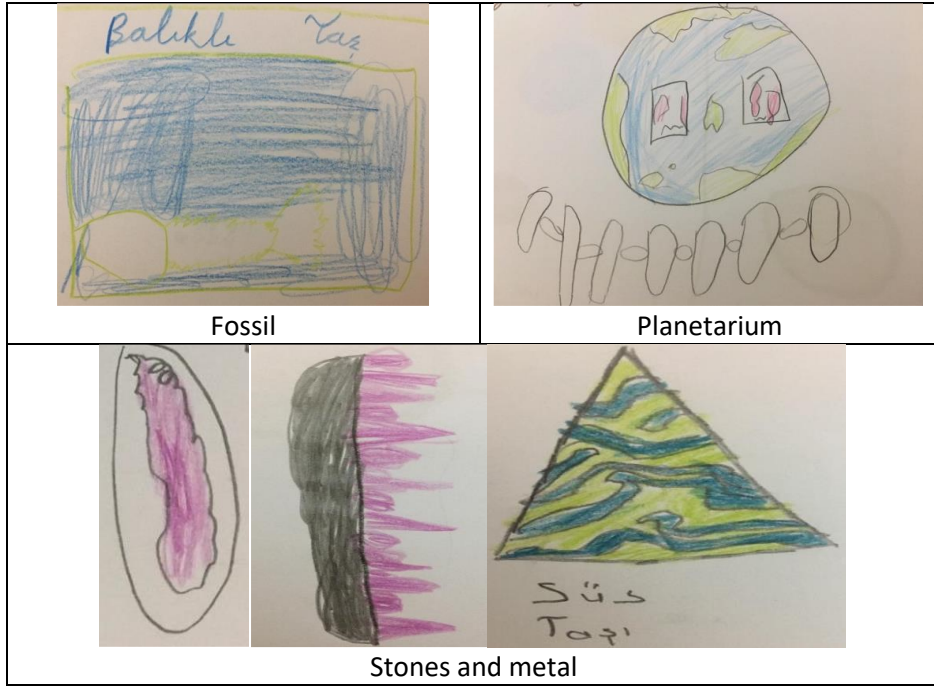
4. Phase (Active Experience-AE): The students were asked to draw what they saw in the microscope. Later, those drawings were investigated and existing errors were corrected and students were made to collect those drawings. The pre-prepared study papers, which were about the stages of meiosis II, cell cycle, and the comparison of mitosis division to meiosis division; were distributed and completed, then examined to be given back to the students after correcting the errors; furthermore, the students were asked to put them in their folders. The groups, which were constituted according to the learning styles in the class, were asked to study in groups; prepare models or posters irrelevant to the lesson based on their own preferences; and bring them to the next lesson. By doing so, it was intended to enable students to apply the information, they acquired in the previous phases, on other situations."

Experiential learning activities in SS&H and Arts

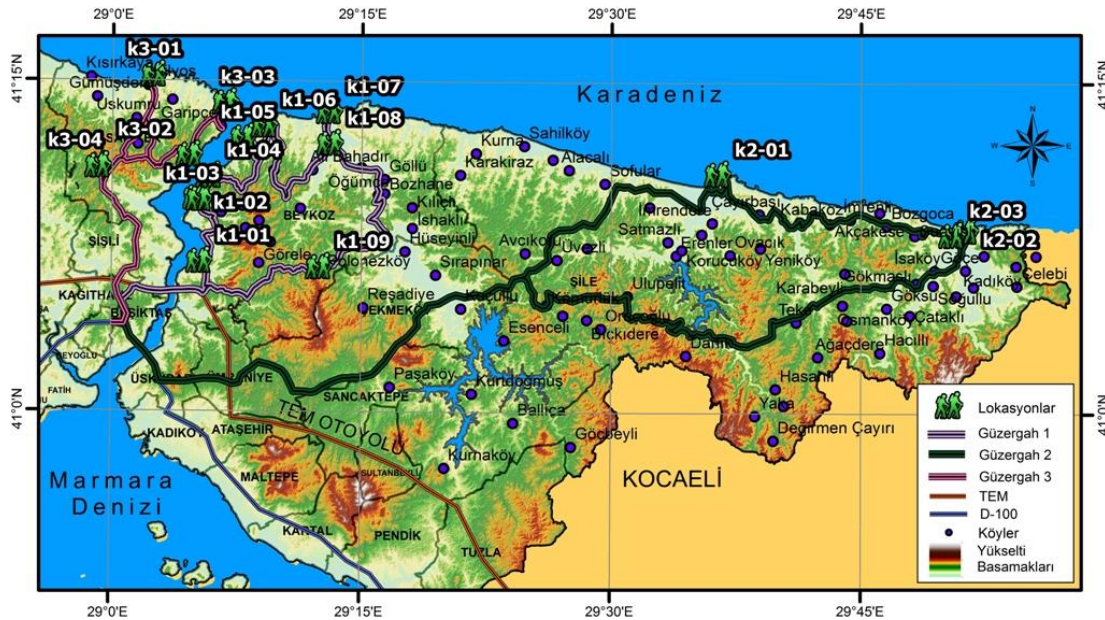
Bülbül (2016) aimed to increase students' awareness of cultural heritage with a museum tour plan. This plan included three stages as pre-tour preparations, activities in the museum setting and post-tour artistic production. While activities in the museum setting included an analysis of an artefact they choose and drawing that artefact, students in the post-tour artistic production produced the artefacts they have chosen in three-dimensional form.

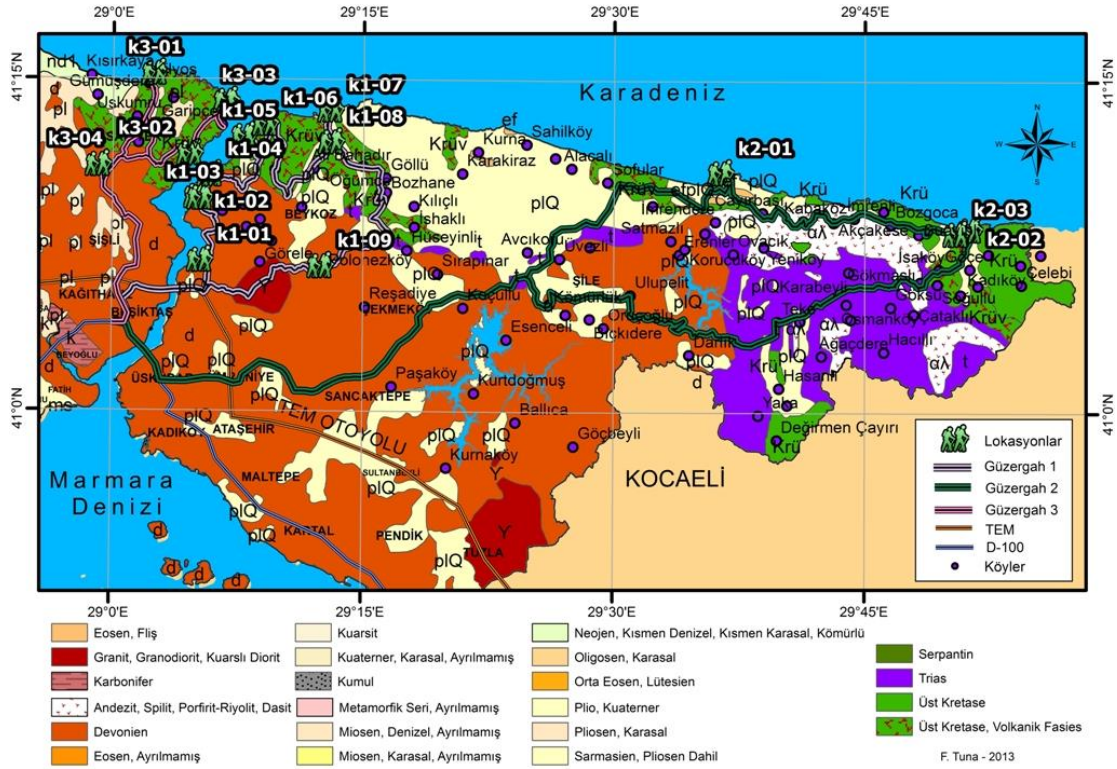
| Original | Students' production |
|---|--|
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Bapoğlu-Dümenci and Bıçakçı (2019) took 30 gifted elementary school students to Şehit Cuma Dağ Natural History Museum in Ankara, Turkey. After the museum tour, students were interviewed, and they were asked draw whatever they can remember. They concluded that gifted and talented children had the opportunity to participate in the activities presented in the museum and to receive education in line with their abilities, interests and speed.



Tuna and Sarikaya (2014) suggested routes for geography educators to use in their classrooms in Sarıyer, Beykoz and Şile. Three routes and sixteen locations were marked on two maps. Though these map, students may have opportunities to explore various landforms.





United Kingdom

Active experiential learning activities (in STEM, Health, SS&H and Arts)

Activities

- Longer term engagement where student ambassadors work in school classrooms supporting the learning of younger students has been found to contribute to engagement as well as improvements in subject knowledge (e.g. Student ambassadors supporting speaking and listening activities during language lessons)
- Interactive pedagogies, particularly in STEM outreach activity, have been found to support close working relationships between younger students and promote knowledge, engagement and interest. The need for ambassador training to enable ambassadors to effectively question younger students in hands on activity to promote deeper understanding has been noted in research.
- Embedding careers information in hands on and interactive outreach activity has been found to be effective in STEM subjects
- Targeted and timely information, Advice and Guidance activities are also valuable (particularly at transition points)

Ambassador roles

- When ambassadors work collaboratively with younger students on practical activities, for example during lessons in schools, during summer schools, and in practical workshops, ambassadors are able to quickly build close relationships. In these contexts, ambassadors are able to discuss career plans, progression routes, HE and subject areas and effectively support younger students' developing interests, knowledge/skills and encourage positive orientations to subject areas (examples include student ambassadors supporting speaking and listening during language lessons and in STEM outreach activities)
- Hands on and interactive pedagogies in outreach activity were widely identified as valuable in studies. E.g. Halim et al. (2020) explored an integrated STEM camp programme with student ambassadors helping younger students to acquire knowledge and skills in STEM. Ambassadors worked collaboratively with younger students facilitating their learning in scientific inquiry. The authors noted that, in these informal contexts, the gap between younger students and ambassadors disappeared. Ambassadors helped younger students solve problems, scaffolded their learning by giving them information, ideas and tips to complete the project. These interactions resulted in an increase in younger students' interest in science as ambassadors were able to make scientific information more accessible and understandable.
- Research also points to the value of ambassador facilitated hands on outreach activity in providing opportunities to explore real world problems and to embed career information advice and guidance



CONCLUSION

Content and curricula for activities within this DIPLOMA curriculum focus on developing young people's understanding of real-world applications of subject knowledge, future career possibilities, as well as revisiting school curriculum learning.

Ambassadors from relevant subject disciplines will work with academic staff to develop activities and will be positioned as subject experts in these learning contexts. Ambassadors have to work collaboratively to research and develop locally relevant content and curricula for school student learning activities in STEM, Health, Humanities and Social Sciences, Arts.

Training activities will be seen as opportunities for ambassadors to reflect on practice; reflection a vital part of developing effective approaches to supporting learning and to developing PCK (Schechter & Michalsky, 2014). Opportunities for reflection on practice and for collaborative planning of learning activities will form an integral part of training activity.

REFERENCES

Accardo, A. L., Kuder, S. J., & Woodruff, J. (2019). 'Accommodations and Support Services Preferred by College Students with Autism Spectrum Disorder', *Autism: The International Journal of Research and Practice*, 23(3), pp. 574–583. doi: 10.1177/1362361318760490.

Advancee HE. (2022). Supporting the success of Access and Participation Plans (APPs) <https://www.advance-he.ac.uk/consultancy-and-enhancement/equality-diversity-inclusion/APP-support>.

Anagnos, T., Lyman-Holt, A., Marin, C., & Momsen, E. (2014). Impact of Engineering Ambassador, Programs on Student Development. *Journal of STEM Education: Innovations and Research*. 15.

Annot E. (2012). Les politiques. Dix ans de politique de lutte contre l'échec à l'Université en France. In *La réussite à l'Université. Du tutorat au plan licence*. Bruxelles : De Boeck supérieur, pp. 29-59.

ANOSR (2022). The National Report on compliance with the provisions of the Students' Rights and Obligations Charter for the academic year 2021-2022. Available at: <https://anosr.ro/wp-content/uploads/2022/12/ANOSR-Raport-CDOS-2022.pdf>.

ANOSR (2022), Students with disabilities in Romania - time to say stop to ignorance. Available at: https://anosr.ro/wp-content/uploads/2022/02/Propuneri_ANOSR_Studenti_cu_dizabilitati.pdf?fbclid=IwAR3_Ovjv402eFtj2jYEEwUsZ6gCY4uKHbrnVW0ZhU83JXCZCP3t6IQkk6ug.

ANOSR (2022), Equity in Education - The situation student dormitories in Romania. Available at: [echitatea in educatie.pdf \(anosr.ro\)](#).

Archer, L., DeWitt, J., & Willis, B. (2014). Adolescent boys' science aspirations: Masculinity, capital, and power. *J Res Sci Teach*, 51: 1-30. <https://doi.org/10.1002/tea.21122>.

Arik Akyuz, B. M., Aksoy, D., Madra, A., & Polat, E. (2018). *Evolution of national policy in Turkey on the integration of Syrian children into the national education system. (Background paper for Global Education Monitoring Report 2019)*. Retrieved from <http://unesdoc.unesco.org/images/0026/002660/266069e.pdf>

ASPIRES Report: *Young people's science and career aspirations, age 10 –14*. King's College London.

Atherton G., & Mazhari, T. (2018). Understanding access to higher education for white students from lower socio-economic backgrounds, A National Education Opportunities Network (NEON) report.

Ayling, P., & Gartland, C. (2022). *Policy and Practice in National Context*(Unpublished manuscript). School of Social Sciences and Humanities, University of Suffolk.

Bagheri, M., Ali, W. Z. W., Abdullah, M. C. B., & Daud, S. M. (2013). Effects of project-based learning strategy on self-directed learning skills of educational technology students. *Contemporary educational technology, 4*(1), 15-29.

Baker & Sela (2018). *The Role of the Student Ambassador and Its Contribution to Developing Employability Skills: A Creation of Outward Facing Work Roles*. DOI: 10.1007/978-3-319-75166-5_11.

Bapoğlu-Dümenci. S. S. & Yıldız-Bıçakçı, M. (2019). Activities in the museum through the eyes of gifted and talented children: Şehit Cuma Dağ Natural History Museum. *Journal of International Museum Education, 1*(1), 18-31.

Beals, R., Zimny, S., Lyons, F., & Bobbitt, O. (2021). 'Activating Social Capital: How Peer and Socio-Emotional Mentoring Facilitate Resilience and Success for Community College Students', *Frontiers in Education, 6*. doi: 10.3389/educ.2021.667869.

Bilkent. (2022). *Career fair: Start your career journey before graduation*. <http://thm.bilkent.edu.tr/news-events/career-fair/>

Bissoonauth-Bedford, A., & Stace, R. (2017). University Student Ambassadors Bring Languages Back to Their High School Peers, *Journal of Peer Learning, 10*, 18-40.

Bülbul, H. (2016). Müze ile eğitim yoluyla ortaokul öğrencilerinde kültürel miras bilinci oluşturma. *Ordu Üniversitesi Sosyal Bilimler Enstitüsü Sosyal Bilimler Araştırmaları Dergisi, 6*(3), 681-694.

Casswell, S. (2000). A decade of community action research. *Substance Use & Misuse, 35*(1-2), 55-74.

Causse, G. (2021). La formation en alternance : au-delà du savoir. In *L'enseignement de la gestion en France, 232-237*.

Collings, R., Swanson, V., & Watkins, R. (2014). 'The impact of peer mentoring on levels of student wellbeing, integration, and retention: a controlled comparative evaluation of residential students in UK higher education', *Higher Education, 68*(6), pp. 927–942.

Corradini, E. (2012). Routes into Languages Student Ambassadors Case Studies: England.

Coteş, D.A., Păunescu, M., Hâj, M. (2022). *Dropout in Romanian higher education – Definition, measurement, interpretation*. Bucharest, UEFISCDI Publishing House. <https://uefiscdi.gov.ro/publicatii-1>, p. 59.

Cotton, Kneale & Nash (2013). Horizon-Scanning Report: Widening Participation, Retention and Success.

Council of Higher Education. (2009, October). *Course exemption for students with disabilities*. https://engelsiz.yok.gov.tr/Documents/Kararlar/engelli_ogrenci_ders_muafiyeti.pdf

Council of Higher Education. (2018, February). *Good News of Quota for Disabled Students from Council of Higher Education*. <https://engelsiz.yok.gov.tr/Sayfalar/Haberler/kontenjan-mujdesi.aspx>

Council of Higher Education. (2020, July). *Higher Education Private Housing Services Regulations*. <https://gsb.gov.tr/dosyalar/Yuksekogrenim%20Ozel%20Bar%C4%B1nma%20Hizmetleri%20Yonergesi.pdf>

Council of Higher Education. (2021, May). *Winners of 2021 Barrier-free University Awards Announced*. <https://www.yok.gov.tr/en/Sayfalar/news/2021/barrier-free-university-awards-ceremony.aspx>

Cramer, L. (2021) Equity, Diversity and Inclusion: Alternative strategies for closing the award gap between white and minority ethnic students, *ELife*. DOI: <https://doi.org/10.7554/eLife.58971>

Crawford, C.E. (2019) The one-in-ten: quantitative Critical Race Theory and the education of the 'new (white) oppressed'. *Journal of Education Policy*, 34:3, 423-444, DOI: 10.1080/02680939.2018.1531314

Croll, P. (2008). Occupational choice, socio-economic status and educational attainment: a study of the occupational choices and destinations of young people in the British Household Panel Survey. *Research Papers in Education*, 23:3, 243-268, DOI: [10.1080/02671520701755424](https://doi.org/10.1080/02671520701755424)

Derouet, J-L. (2005). Repenser la justice en éducation. In *La sociologie de l'éducation à l'épreuve des changements sociaux*. *Education et sociétés*. Bruxelles : De Boeck Supérieur, n°16/2, pp.29-40.

Dwyer, P. (2004). Making bodies talk in Forum Theatre, *Research in Drama Education*. *The Journal of Applied Theatre and Performance*, 9:2, 199-210, DOI: 10.1080/1356978042000255076.

EUROSTUDENT VI 2016-2018, [Social and Economic Conditions of Student Life in Europe](https://www.eurostudent.eu/Social-and-Economic-Conditions-of-Student-Life-in-Europe). [Eurostudent VI 2016-2018 | Synopsis of Indicators](https://www.eurostudent.eu/Eurostudent-VI-2016-2018-Synopsis-of-Indicators).

Engineering ambassador network: Establishment of successful engineering ambassador programs at four UTC partner schools, Paper presented at 120th ASEE Annual Conference and Exposition, Atlanta, GA, United States, 6/23/13 - 6/26/13.

Engineering Ambassador, Programs on Student Development. *Journal of STEM Education: Innovations and Research*. 15.

Experiential Training Center (2023, March). *Explore – experiential learning*. <https://www.deneyimselogrenme.com/explore/?type=tools&tab=search-form&tags=egitim-tasarimi-deneyimsel-ogrenme&sort=latest>

Eventbrite. (2023). *Career fair*. <https://www.eventbrite.com/d/turkey--caglayan/career-fair/?page=1>

Fenet, A. (2016). *Union européenne et droits des minorités : la permanence d'une ambiguïté*, in M. Catala S. Jeannesson, A.-S. Lamblin-Gourdin (dir.), Bern, Peter Lang, pp. 107-130.

Fourdrignier, M. (2007). Alternance et professionnalisation : Le cas des métiers du social. In *Marché et organisation*, Paris : L'Harmattan, pp. 79-100.

Fredy-Planchot, A. (2007). Reconnaître le tutorat en entreprise. *Revue française de gestion*, 175, 23-32.

Gannon, S., Tracey, D., & Ullman, J. (2018). Bolstering graduates' success through working as student ambassadors in university widening participation programs. *Higher Education Research & Development*, 37:4, 715-729, DOI: [10.1080/07294360.2018.1455643](https://doi.org/10.1080/07294360.2018.1455643)

Garner, J.K., Haas, C., Alley, M., & Kaplan, A. (2018). The Emergence of Outreach Ambassador Role Identities in Undergraduate Engineering Students. *The Journal of STEM Outreach*.

Gartland, C. (2015). Student ambassadors: 'role-models', learning practices and identities, *British Journal of Sociology of Education*, 36:8, 1192-1211, DOI: [10.1080/01425692.2014.886940](https://doi.org/10.1080/01425692.2014.886940)

Gartland, C. (2014). *STEM strategies*. London: Institute of Education Press

Gartland, C. (2016). *Student Ambassadors and STEM Outreach: A study of practices in the USA*. Winston Churchill Memorial Trust Travelling Fellowship Report documents

Gartland, C. (2020). Chapter 11 UK and USA University Outreach Practices. In *STEM in Science Education and S in STEM*. Leiden, The Netherlands: Brill.

Gartland, C., & Negrea, V. (2022). *Student Ambassadors' Role in Outreach Programmes. A State-of-the-Art Review* (Unpublished manuscript). School of Social Sciences and Humanities, University of Suffolk.

General Directorate of Loans and Dorms. (2017). *The regulation of higher education credit and dormitories institution study loan*:

<https://www.mevzuat.gov.tr/File/GeneratePdf?mevzuatNo=5095&mevzuatTur=KurumVeKurulusYonetmeligi&mevzuatTertip=5>

Goudeau, S. (2020). *Comment l'école reproduit-elle les inégalités ? Égalité des chances, réussite, psychologie sociale*. Grenoble, Presses universitaires de Grenoble.

Gov.UK. (2022) <https://explore-education-statistics.service.gov.uk/find-statistics/participation-measures-in-higher-education>

Green, A. (2018). The influence of involvement in a widening participation outreach program on student ambassadors' retention and success. *Student Success*, 9(3). 25-36.

Güneş, M. H. (2017). An experimental study about the application of Kolb's learning cycle on biology lesson. *Kastamonu Education Journal*, 25(5), 1835-1850.

Halim, L., Iksan, Z. H., Rasul, M. S., & Soh, T. M. T. (2020). Chapter 6 Pedagogical Content Knowledge of Young Scientists in Promoting STEM Learning in an Informal Context. In *STEM in Science Education and S in STEM*, Leiden, The Netherlands: Brill. Available From: Brill.

Harrison, N. (2018). Using the lens of 'possible selves' to explore access to higher education: A new conceptual model for practice, policy, and research. *Social Sciences*, 7(10), p.209.

Hayton, A and Bengry-Howell, A. (2016). 'Theory, evaluation, and practice in widening participation: a framework approach to assessing impact.' *London Review of Education*, 14 (3). pp. 41-53. ISSN 1474-8460

Higher Education and Research Act (2017). (c.29). [Online]. London: The Stationery Office. [Accessed 14 May 2018]. Available from: <http://www.legislation.gov.uk/>

Hillier, A., Goldstein, J., Tornatore, L., Byrne, E., & Johnson, H.M. (2019). 'Outcomes of a Peer Mentoring Program for University Students with Disabilities', *Mentoring & Tutoring: Partnership in Learning*, 27(5), pp. 487–508. doi: 10.1080/13611267.2019.1675850.

Hmelo-Silver, C. E. (2004). Problem-based learning: What and how do students learn?. *Educational Psychology Review*, 16(3), 235-266.

House of Commons Education Committee (2013). *Careers guidance for young people: The impact of the new duty on schools*. Seventh Report of Session 2012-13 vol. 1
<https://www.advance-he.ac.uk/consultancy-and-enhancement/equality-diversity-inclusion/APP-support>

Hubble, S. and Bolton, P., (2018). Higher education tuition fees in England, House of Commons Library Briefing Paper 8151, 19 February 2018.
<http://researchbriefings.parliament.uk/ResearchBriefing/Summary/CBP-8151>

Jankowski, N. (2022). Reframing Assessment to Center Equity: A Resource to Inform Practice. *Assessment Update*, 34: 6-7. <https://doi.org/10.1002/au.30294>.

Legislation.gov.uk. (2016). Equality Act, 2010. [online] Available at: <<http://www.legislation.gov.uk/ukpga/2010/15/contents>> [Accessed 14 April 2016].

Lenoir, C. Xypas, C. Jamet (dir.), *École et citoyenneté : un défi multiculturel*, Paris, Armand Colin, 2016b, pp. 42-60.

McKenzie, D., & Littenberg, T. B. (2014). The Space Public Outreach Team (SPOT): Adapting a successful outreach programme to a new region. *Communicating Astronomy with the Public Journal*, 16, 8.

Miel, K., Portsmouth, M., Maltese, A., & Paul, K. (2018). Board 126: *Examining the Interactions Related to Role Modelling in an Elementary Outreach Program* (Work in Progress). 10.18260/1-2--29910.

Moison, E., Miel, K., Portsmouth, M., Paul, K., Maltese, A., & Kim, J. (2020). Characterizing Engineering Outreach Ambassadors' Teaching Moves during Engineering Design Activities (Fundamental). DOI: 10.18260/1-2--34275

Moote, J., & Archer, L. (2018). Failing to deliver? Exploring the status of career education provision in England. *Research Papers in Education*, 33(2), 187-215.

Moschetti, R. V., Plunkett, S.W., Efrat, R., & Yomtov, D. (2018). Peer mentoring as social capital for Latina/o college students at a Hispanic-serving institution. *Journal of Hispanic Higher Education*, 17(4), pp. 375–392.

Mugla Guidance and Research Center. (2018, July). *Rights for disabled people*. https://muglaram.meb.k12.tr/icerikler/engeliler-icin-saglanan-haklar_12774466.html

Mutabazi, E. et Wallenhorst, N. (2021). *Citoyennetés de seconde classe*, Lormont, Le Bord de l'eau, *Collection Critiques éducatives*.

NCOP (2019). The National Collaborative Outreach Programme End of Phase 1 report for the national formative and impact evaluations. - [ncop-end-of-phase-one-evaluation-report.pdf \(officeforstudents.org.uk\)](https://www.officeforstudents.org.uk/ncop-end-of-phase-one-evaluation-report.pdf).

Office for Students (2022d). Uni Connect. <https://www.officeforstudents.org.uk/advice-and-guidance/promoting-equal-opportunities/uni-connect/>.

OfS. (2018). Equality impact assessment Regulatory framework for higher education (09) (officeforstudents.org.uk).

OfS. (2020a). Coronavirus (Briefing Note 7 18 June 2020). <https://www.officeforstudents.org.uk/media/817e098e-b5e5-48eb-9108-97e1a1c4fdaa/coronavirus-briefing-note-graduate-employment.pdf>.

OfS. (2020b). Transforming opportunity in higher education. <https://www.officeforstudents.org.uk/publications/transforming-opportunity-in-higher-education/>

OfS. (2021a). Access and participation plan. <https://www.officeforstudents.org.uk/advice-and-guidance/promoting-equal-opportunities/access-and-participation-plans/>.

OfS. (2021b). English higher education 2021: The Office for Students annual review. <https://www.officeforstudents.org.uk/annual-review-2021/#:~:text=The%202021%20annual%20review%20reflects,out%20our%20priorities%20for%202022>.

OfS. (2022a). Guidance to the Office for Students on strategic priorities for FY22-23. (Insight brief, March 2022).

OfS. (2022b). Our approach to access and participation new priorities <https://www.officeforstudents.org.uk/advice-and-guidance/promoting-equal-opportunities/our-approach-to-access-and-participation/>.

OfS. (2022c). 'Schools, attainment and the role of higher education. (Insight brief, April, 2022). (Available at www.officeforstudents.org.uk/data-and-analysis/insight-briefs).

Order of the Romanian Minister of Education, Research, Youth and Sport no. 3666/30, March 2012. Available at: https://www.edu.ro/sites/default/files/fi%C8%99iere/Invatamant-Superior/2016/studenti/OM_3666_2012_CODUL_DREPTURILOR_OBLIGATIILOR_STUDENTILOR%20.pdf.

Papaïoannou, I-V, Tsioli, S. et Vihou, M. (2015). Le tutorat par les pairs en contexte universitaire. Une étude de cas. In *Phronesis*, (4), 46-55.

Phillip B. Zarrilli (2002). *Acting (Re)Considered*. Routledge, 2nd Edition.

Pinto, V. (2014). L'éternisation. Un présent sans avenir. In *A l'école du salariat*. Les étudiants et leurs petits boulots. Paris, PUF, pp. 253-294.

Presidency of the Republic of Turkey Human Resources Office. (2023, March). Career gate <https://www.cbiko.gov.tr/en/projects/career-gate>.

RayHaber. (2023, January). *Turkey to Host Three International Career Fairs in 2023*. <https://railynews.com/2023/01/turkiye-2023te-uc-uluslararası-kariyer-fuarına-ev-sahipligi-yapacak/>.

Reiss, M.J., & Mujtaba, T. (2017). Should we embed careers education in STEM lessons? *The Curriculum Journal*, 28:1, 137-150, DOI: 10.1080/09585176.2016.1261718

Rillotta, F., Hutchinson, C., Arthur, J., & Raghavendra, P. (2020). 'Inclusive university experience in Australia: perspectives of students with intellectual disability and their mentors', *Journal of Intellectual Disabilities: JOID*, 24(1), pp. 102–117. doi: 10.1177/1744629518769421.

Rose, A., & Mallinson, L. (2020). Raising aspirations for non-traditional students through Higher Education outreach activities: A review of literature relevant to the Uni Connect programme. *IMPact*, 3 (1). pp. 1-22. ISSN 2516-7561

Sanders, G., Brett, C., Paul, N., & Scott J. (2021). Creating Diversity in Tomorrow's Doctors: A Student Led, Widening Participation Outreach Programme. *Adv Med Educ Pract*. Jun 24; 12:705-712.

Sanders, M., Burgess, S., Chande, R., Dilnot, C., Kozman, E., & Macmillan, LA. (2018). Role models, mentoring and university applications - evidence from a crossover randomised controlled trial in the United Kingdom. *Widening Participation and Lifelong Learning*, 20 (4) pp. 57-80. [10.5456/WPLL.20.4.57](https://doi.org/10.5456/WPLL.20.4.57).

Sanderson, R., & Spacey, R. (2020). Widening access to higher education for BAME students and students from lower socio-economic groups: A review of literature. *IMPact*, 4 (1). ISSN 2516-7561

Schnapper, D. (2000). *Qu'est-ce que la Citoyenneté*. Paris, Gallimard.

Schnapper, D., *La communauté des citoyens – Sur l'idée moderne de la nation*, Paris, Gallimard, 1994.

Smell, A., & Newman, H. (2020). Multi-Tiered Mentorship Models: Increasing Learning Outcomes of Underserved Populations. *Journal of Applied Social Science*, 14(1), pp. 23–39. doi: 10.1177/1936724419898869

SSPC. (2008). *Exam Applications for Candidates with Disability/Health Problems or Special Conditions*. <http://dokuman.osym.gov.tr/pdfdokuman/2018/GENEL/Engelliadayraporu09042018.pdf>

STEM women (2022). Women in STEM Statistics. <https://www.stemwomen.com/women-in-stem-percentages-of-women-in-stem-statistics>.

Study in Turkey. (2019). *Work Opportunities*. <https://www.studyinturkiye.gov.tr/StudyinTurkey/ShowDetail?rID=rIsyTUzKZzY=&&cId=PE4NrOmMoY4=> .

Talbot, C.S., Alley, M., Marshall, M., Haas, C., Zappe, S.E., & Garner, J.K. (2013). Engineering Ambassador Network: Professional Development of the Engineering Ambassadors.

TEKNOFEST. (2023, March). *Frequently Asked Questions*. <https://www.teknofest.org/en/corporate/faq/>

Thole, K., Zappe, S., Marshall, M., Alley, M., & Engel, R. (2013). Engineering Ambassador Network: Dissemination through an Inaugural National Workshop. 23.495.1-23.495.10. 10.18260/1-2—19509

Tuna, F., & Sarikaya, M. A. (2014). Sariyer, Beykoz Ve Şile'de (Istanbul) Coğrafya Eğitimi İçin Rota Önerileri. *Doğu Coğrafya Dergisi*, 19(31), 189-206.

Turkish Ministry of Justice. (2007). *The Legislation of Young and Adult Convicts and Detainees in Penitentiary Institutions on Training and Improvement Activities*. https://cte.adalet.gov.tr/Resimler/Dokuman/198201911532446_1.pdf

TÜSiAD and PwC (2017, June). *The STEM Need in Turkey for 2023*. https://tusiad.org/en/reports/item/download/8692_e15cd299c5a484f9fe67afd111f7df1d

UEFISCDI. (2015). Equity in the Romanian Higher Education System. Available at <https://uefiscdi.gov.ro/resource-824566-6-equity-in-the-romanian-higher-education-system-en.pdf>

U.K. Gov. (2022a). Widening participation in higher education, Academic Year 2020/21 Explore education statistics – GOV.UK (explore-education-statistics.service.gov.uk).

U.K. Gov. (2022c). Help if you're a student with a learning difficulty, health problem or disability: Disabled Students' Allowance. <https://www.gov.uk/disabled-students-allowance-dsa/eligibility>.

University of Suffolk, Access and Participation Plan (Variations July/ November 2022) https://www.uos.ac.uk/sites/www.uos.ac.uk/files/UniversityofSuffolk_APP_2020-21_V1_10014001.pdf.

Uygur (2019, February). *Teacher training about STEM education in Turkey*. <https://blog.scientix.eu/2016/02/the-teacher-training-about-stem-fetemm-education-in-turkey/>

Venegas-Muggli, J.I., Barrientos, C., & Álvarez F. (2021). The Impact of Peer- Mentoring on the Academic Success of Underrepresented College Students. *Journal of College Student Retention: Research, Theory & Practice*, (20210304). doi: 10.1177/1521025121995988.

Wallenhorst, N. et Mutabazi, E. (2021). D'une citoyenneté empêchée à une éducation citoyenne, Lormont, Le Bord de l'eau, *Collection Critiques éducatives* .

Williams, DR., Lawrence, J.A., Davis, B.A., & Vu, C. (2019). Understanding how discrimination can affect health. *Health Ser Res.*; 54: 1374 1388. <https://doi.org/10.1111/1475-6773.13222>

Xypas, C. (2006). La fonction politique de l'École au défi des jeunes issus de l'immigration, in Y., Lenoir, C. Xypas, C. Jamet (dir.), *École et citoyenneté : un défi multiculturel*, Paris, Armand Colin, pp. 223-235.

Yazan B. (2014). Come on girls, let's go to school: an effort towards gender educational equity in Turkey, *International Journal of Inclusive Education*, 18(8), 836-856, DOI: [10.1080/13603116.2013.841774](https://doi.org/10.1080/13603116.2013.841774)

YEGİTEK. (2016, August). *STEM Education Report*. https://yegitek.meb.gov.tr/STEM_Education_Report.pdf

YEGİTEK. (2019, January). *Kazanım Merkezli STEM Uygulamaları [Standards-Based Stem Applications]*. https://ookgm.meb.gov.tr/meb_iys_dosyalar/2019_01/29164143_STEM_KitapYk.pdf

Ylonen, A. (2012). Student ambassador experiences in higher education: Skills and competencies for the future? *British Educational Research Journal*, 38(5), 801–811. doi:10.1080/01411926.2011.583636

Younger, K., Gascoine, L., Menzies, V., & Torgerson, C. (2019). A systematic review of evidence on the effectiveness of interventions and strategies for widening participation in higher education. *Journal of Further and Higher education.*, 43 (6). pp. 742-773.

Web references

<https://www.onisep.fr/Choisir-mes-etudes/apres-le-bac/Conseils-et-strategies-d-etudes/savoir-rebondir-se-reorienter>

<https://www.education.gouv.fr/reussir-au-lycee/que-faire-apres-le-baccalaureat-10685>

<https://www.education.gouv.fr/les-acteurs-de-l-orientation-2690>

<https://eduscol.education.fr/2565/les-filles-faites-des-sciences>

<https://www.education.gouv.fr/bo/2011/10/mene1105413c.htm>

<https://www.universite-paris-saclay.fr/etre-un-etudiant-ambassadeur>

<https://www-actus.univ-ubs.fr/fr/index/articles-chroniques/scvc/recrutement-de-19-etudiants-ambassadeurs-lien-social.html>

<https://rallynews.com/2023/01/turkiye-2023te-uc-uluslararası-kariyer-fuarına-ev-sahipliği-yapacak/>

<https://www.advance-he.ac.uk/consultancy-and-enhancement/equality-diversity-inclusion/APP-support>

<https://www.deneyimselogrenme.com/explore/?type=tools&tab=search-form&tags=egitim-tasarimi-deneyimsel-ogrenme&sort=latest>

<https://www.mevzuat.gov.tr/File/GeneratePdf?mevzuatNo=5095&mevzuatTur=KurumVeKurulusYonetmeliği&mevzuatTertip=5>

<https://www.officeforstudents.org.uk/advice-and-guidance/promoting-equal-opportunities/our-approach-to-access-and-participation/>

https://www.officeforstudents.org.uk/media/be054f0b-696a-41fc-8f50-218eb0e3dcab/ofs-strategic-guidance-20220331_amend.pdf

<https://www.studyinturkiye.gov.tr/StudyinTurkey/ShowDetail?rID=rIsyTUzKZzY=&&cId=PE4Nr0mMoY4=>



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**Co-funded by
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Funded by the European Union. Views and opinions expressed are however those of the author(s) only and do not necessarily reflect those of the European Union or the ANPCDEFP. Neither the European Union nor the ANPCDEFP can be held responsible for them

