

LEARNING & TEACHING PAPER #14

Environmental
sustainability of learning
and teaching

Thematic Peer Group Report

Chair: Julie Gwilliam,
Cardiff University, United Kingdom

EUA coordinator: Helene Peterbauer

March 2021



This publication is licensed under the Creative Commons [Attribution-NonCommercial](https://creativecommons.org/licenses/by-nc/4.0/) CC BY-NC

This information may be freely used, copied and adapted for non-commercial purposes, provided that the source is acknowledged (European University Association).

European University Association asbl

Avenue de l'Yser 24

Rue du Rhône 114

1040 Brussels

Case postale 3174

Belgium

1211 Geneva 3, Switzerland

+32 (0) 2 230 55 44

+41 22 552 02 96

www.eua.eu · info@eua.eu

Embedding the Sustainable Development Goals: good practice, innovation and Integrated Impact

This report provides an overview of the findings of the EUA Thematic Peer Group “Environmental sustainability of learning and teaching” (hereinafter referred to as “the group”; for details see Annex 2).¹ The group was tasked with discussing how learning and teaching can embrace and promote sustainability, and whether existing approaches to learning and teaching are sustainable.

The report seeks to promote and guide action to enable the embedding of a holistic approach to sustainability in education and learning across higher education institutions. As the UN Sustainable Development Goals (SDGs)² frame much of the existing activity and national and international debate in this area, the group chose them as the basis for its discussions.

In addition, Education for Sustainable Development, a concept developed by UNESCO that acknowledges the central role of education in supporting sustainable development, guided the group’s work.³ In higher education, Education for Sustainable Development is not just an objective in itself, but also responds to many other objectives influencing the sector. Examples of such objectives include graduates developing creative approaches to address complex problems,⁴ institutions supporting social and economic development within their communities, and institutions instigating an adequate response to the global climate emergency.⁵ Sustainability agendas are reflected in multiple frameworks covering the higher education sector, such as the SDG Accord,⁶ the UN Academic Impact Initiative,⁷ and the Higher Education Sustainability Initiative⁸ and incorporation of sustainability issues into the activities of universities is sought by students (e.g. see National Union of Students Skills Survey⁹) Further, the topic is also gaining traction at the European policy level, as evidenced by the European Commission’s work on a Council Recommendation on Education for Environmental Sustainability.¹⁰

Because of the scope of action necessary to effectively incorporate the sustainability agenda into education and learning, the group argues that this cannot be confined solely to the “sustainability” remit of an institution. Rather, in order to achieve an effective and authentic delivery of sustainability in higher education, institutions need to engage their staff, students and partners in all areas of activity. This requires a transdisciplinary and cross-departmental approach, that aligns and embeds sustainability within all institutional strategic priorities, safeguarding against waning commitment, as for example has been witnessed in the context of the COVID-19 pandemic. The following realms in any institution must be strategically and practically engaged.

- Sustainability as a value must be at the heart of all strategic activities and governance.
- Sustainability must be acknowledged and effective as a framework for all educational activity, including all programmes, modules and extra-curricular activities.
- Both the scope and delivery of research should be infused with the values of sustainability.
- The management of the university and its facilities should reflect sustainability principles, such as the reduction of waste and efficient energy use. By doing so, the estate can serve as a “living lab”, enabling students and staff to experience and practically learn about sustainable lifestyles outside of the formal curriculum.

- Institutional procurement strategies should incorporate a commitment to fair trade and to locally and environmentally sustainable principles.
- Sustainability principles need to be embedded within civic engagement activities locally, nationally and globally.

In order to achieve this ambition, the group argues that an institution must commit adequate resources, establish a common cause throughout its activities, develop the knowledge and skills of its staff, and be authentic in all its activities. Such a combination of high commitment and high capacity in implementing Education for Sustainable Development will lead to what the group terms “Integrated Impact”. This formula can be summarised as shown in Figure 1.

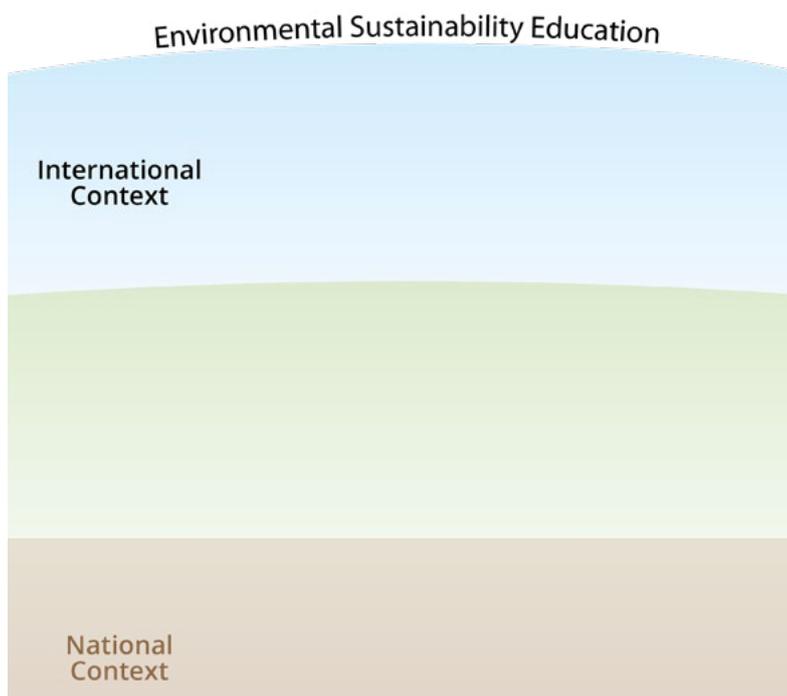
$$\begin{aligned} &\text{Commitment + Time + Resources + Common cause + Knowledge and skills} \\ &\quad + \text{Authenticity} \\ &= \\ &\text{Sustainability education with Integrated Impact} \end{aligned}$$

Figure 1: Formula for achieving Integrated Impact in implementing Education for Sustainable Development

The following sections illustrate the complexity and benefits of sustainability education, present a conceptual framework of four scenarios within which higher education institutions may operate, and propose actions for institutions to work towards achieving comprehensive and lasting engagement in implementing Education for Sustainable Development.

Growing the institutional ecosystem

As the group continued its discussions, it became apparent that an institutional strategy to implement Education for Sustainable Development cannot be restricted to any particular area of an institution's activities. Instead, actions to implement Education for Sustainable Development need to be integrated across the whole institution and its ecosystem. To illustrate the proposed comprehensive action plan that the group considers necessary to deliver systemic change, it developed an ecosystem metaphor.¹¹ This metaphor has enabled the group – and might also help other institutions – to explore and establish the most effective interventions to deliver embedded sustainability, all while acknowledging that no one size fits all.



Action does not happen in isolation. Indeed, across the globe it is currently being driven by a wide range of agendas. Thus, the context in which higher education institutions currently find themselves globally and nationally significantly influences the speed and depth of progress in achieving the SDGs via Education for Sustainable Development. In Figure 2 the soil represents both national drivers and, where applicable, barriers, whereas the air and sky (or climate) represent the international context.

Figure 2: Illustration of the environmental sustainability education metaphor, with the soil representing national drivers and barriers, and the air and sky (or climate) representing the international context.

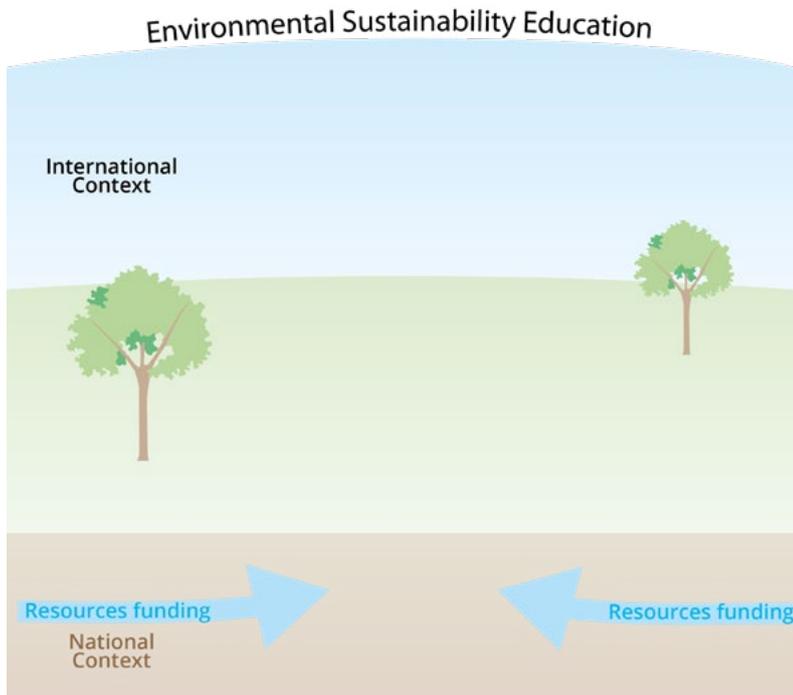


Figure 3: The nutrients and water representing the resources, the trees and forest representing institutions and their wider networks.

The resources of an institution are likely to affect its strategic and operational actions. Resources include its people, its funding, its physical infrastructure, and the knowledge and skills present in the institution through its staff and students. Resources can also be derived from the wider network of institutions by learning from each other's actions and activities, including case studies of success (and failure).

The resources (Figure 3) are represented by the nutrients and water that feed the trees and forest, which represent institutions and their wider networks. These come from both the soil and the sky, as well as the surrounding ecosystem.

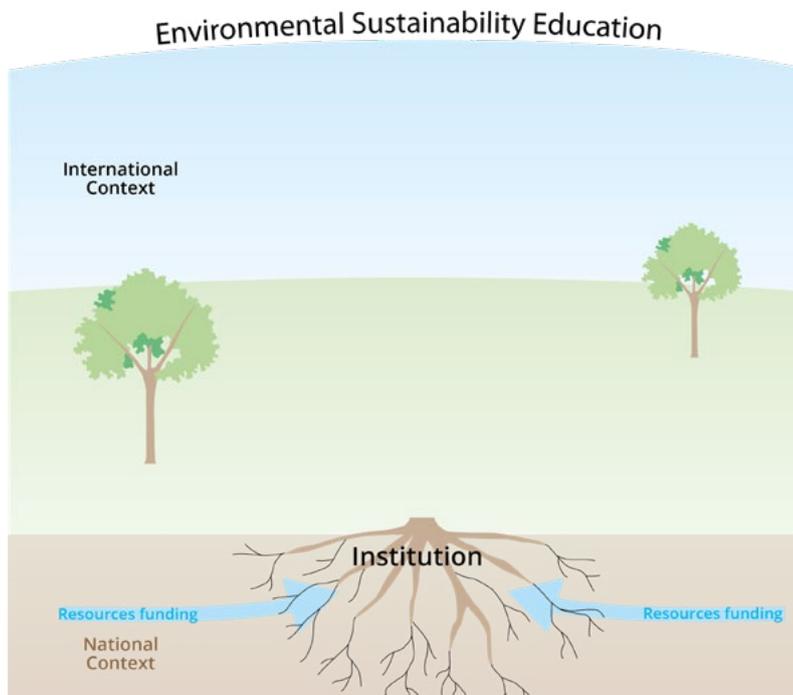


Figure 4: The root system of each tree of the (global) forest representing institutions' strategic decision-making powers.

An institution's strategic decision-making is influenced by the context in which it exists, as well as the resources at its disposal. The root system of each tree of the (global) forest (Figure 4) thus represents their strategic decision-making powers. By integrating and aligning these with the day-to-day activities of the institution and its surrounding ecosystem, strategies can deliver change.

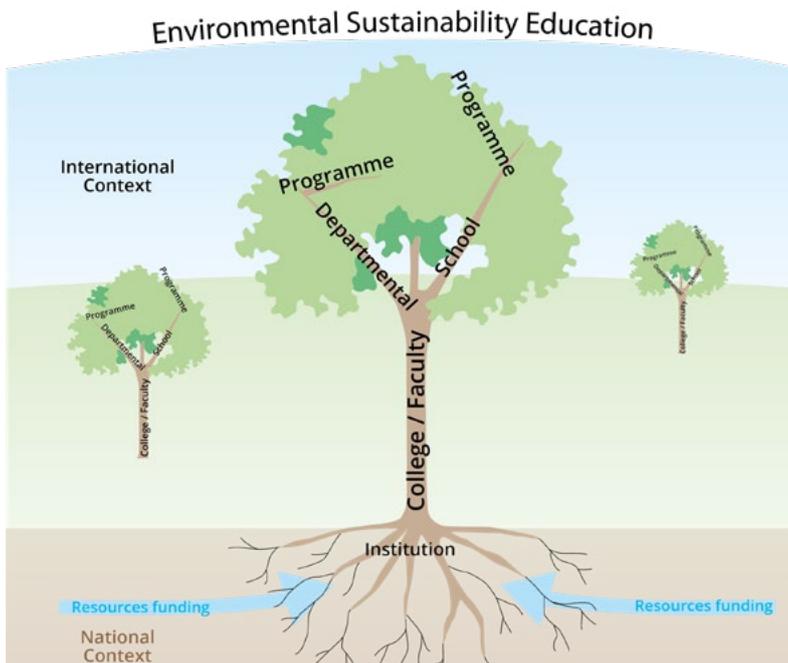


Figure 5: The trunk(s) and branches of the trees representing the institutions' constituent units.

Higher education institutions are made up of constituent units such as colleges, faculties, departments and schools. This network supports, and ideally implements, the strategy driven by the strategic roots of the organisation. However, different biomes and ecosystems may thrive on distinct parts of a diverse tree. The constituent units (Figure 5) are represented by the trunk(s) and branches of the trees. Some institutions may be multi-stemmed trees with many branches, while others have more simple

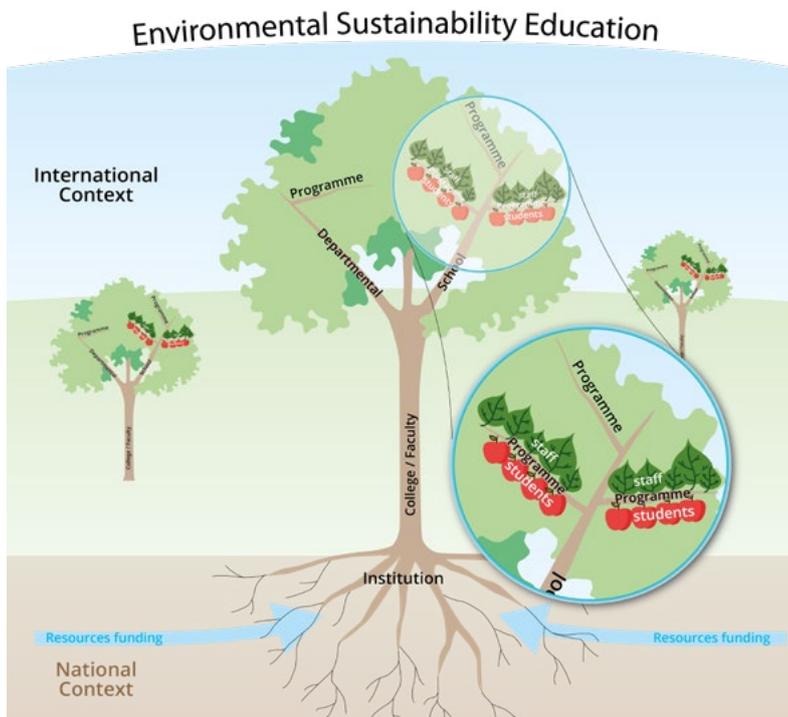


Figure 6: The twigs of the tree representing the institution's programmes, modules and extra-curricular activities, the leaves and flowers representing the staff delivering change in partnership, and the fruit representing the students.

Finally, the interaction between staff and students via learning and teaching lies within programmes, modules and extra-curricular activities. The programmes, modules and extra-curricular activities are represented by the twigs of the tree (Figure 6), while the people delivering change in partnership are represented by the leaves (the staff) and flowers, leading to fruit (the students).

Within this framework, the purpose of this report is to present how sustainability can be embedded in an authentic manner and lead to Integrated Impact within a higher education institution, from root to branch.

Ecosystem scenarios: commitment and capacity

The group found that the uptake of Education for Sustainable Development is highly context-dependent. What the most appropriate and effective practices are for each institution depends on its current and evolving circumstances, as well as on external drivers and barriers.

Thus, rather than advocating a one-size-fits-all set of recommendations, the group identified two main factors – commitment and capacity – that will affect an institution’s approach to Education for Sustainable Development. These two key influences are defined as follows.

- Commitment is defined as an institution’s high-level strategic support for the sustainability agenda, as embodied in, for instance, strategy documents and governance procedures. This is predominantly a top-down influence and is often closely related to wider national and international policy drivers for the sector (the “root system” and “climate” in the group’s ecosystem metaphor).
- Capacity refers to the knowledge, skills, motivation, staff and financial resources required to pursue Education for Sustainable Development. This is predominantly a bottom-up influence, reflecting the existing engagement and activities of staff and students (the “nutrients”).

These influences are derived from the formula (Figure 1) introduced in the first section.

The group characterised commitment and capacity levels as high or low within four scenarios (Figure 7), which represent common stages in the evolution of institutional adoption of Education for Sustainable Development. These scenarios enable a more nuanced view of how and when a practice is likely to have a meaningful impact on an institution and its actors. Although they may not fully capture the circumstances of every institution, country or situation, the scenarios aim to characterise the evolution of institutional commitment to Education for Sustainable Development and the need to continually respond to an evolving context.

INCREASING COMMITMENT



INCREASING CAPACITY



Figure 7: Four scenarios representing common stages in the evolution of institutional adoption of Education for Sustainable Development

The next section lays out key actions that have the potential to enable institutions to transition between each of these scenarios towards Integrated Impact. The actions are categorised as relating to strategy and governance; staff development; formal education opportunities (i.e. programmes and modules); and extra-curricular opportunities.

Practices: moving towards and sustaining Integrated Impact

FROM POCKETS OF PRACTICE TO EMERGING AGENDA

Most institutions are likely to find themselves in the “Pockets of Practice” scenario, with good practice distributed unevenly across their organisation. The internal drivers for the development of Education for Sustainable Development in this context are typically individual staff with a personal, research and/or education-based commitment and/or students, through campaigns or self-organised/collaborative activities. It is also possible that this activity may be motivated by external drivers such as professional, statutory or regulatory bodies for professional education requirements. However, with Pockets of Practice, opportunities for students to engage in Education for Sustainable Development are likely to be uncoordinated and have little central support. This lack of support might result in staff members who do offer formal sustainability-informed courses and/or extra-curricular activities feeling isolated. In order to enable development towards an “Emerging Agenda” scenario, a coordinated series of actions is proposed, spanning the following:

- Strategy and governance: develop strategic commitments and leadership for this agenda.
- Staff development: promote communities of practice and introductory training.
- Formal education and extra-curricular opportunities: establish a baseline for sustainability engagement across an institution.

The group found that both internal and external drivers were a crucial basis for embedding sustainability across learning and teaching. On the basis that strategy informs policy and activity, for full effect there needs to be an incentive that galvanises strategic direction.

This first phase of action to embed sustainability can be categorised as one of understanding the contextual and internal performance of one’s own institution. Drawing on the ecosystem metaphor presented in section 2, this means undertaking the following actions.

- Mapping the environment: the external influence of the sky and earth on the growth of the “tree” (institution) should be part of one’s vision of the tree’s future.
- Mapping where internal growth is aligned to these external environmental drivers: this includes evaluating and understanding these drivers, supporting them, and learning from them so that all parts of the individual ecosystem can be nurtured, be aligned, and thrive. Where drivers in an internal ecosystem are found, the founding “root system” (systems and strategies) must be reinforced so they can continue to provide nutrients that support this system.

Achieving an optimal level of impact, meaning that the institution is both committed to and increasingly capable of integrating sustainability, requires drawing on ways of maintaining commitment and capacity, as well as promoting a positive idea of sustainability across activities. Once strategic commitment is in place, it is necessary for an institution to incorporate this commitment into procedures and processes related to academic courses and extra-curricular activities. There should be links to senior decision-makers and across reporting processes.

FROM EMERGING AGENDA TO INTEGRATED IMPACT

Further development towards the “Integrated Impact” scenario can be achieved through the following coordinated series of proposed actions, which span four key areas of change:

- Strategy and governance: monitor and report regularly on progress made both internally and externally.
- Staff development: develop a training strategy on Education for Sustainable Development and pursue widespread engagement across staff groups.
- Formal education opportunities: pursue more comprehensive and greater depth of engagement with Education for Sustainable Development in programmes, modules and activities.
- Extra-curricular opportunities: seek opportunities for students to engage in real-world problems beyond their taught courses.

This second phase of action to embed sustainability can be categorised as a shift towards maximum productivity (health) for the ecosystem by continuing to respond positively to the nutrients provided by the context, good practice and external policies, as well as nurturing the root system to enable uptake throughout. This will enable all programmes, modules, staff and students (the branches, twigs and fruit) to be affected by, and effect themselves, positive sustainability-related changes to the ecosystem. This is in direct contrast to the “silo” approach where sustainability might be contained in a single “branch” of the institution and not systemically distributed. Continuously building upon the strong root system enables the flow and uptake of nutrients throughout the tree.

Institutions that reach Integrated Impact status, with high commitment and high capacity in implementing Education for Sustainable Development, can play an important and inspiring role for other institutions and key actors, as well as for the wider community. They represent ecosystems that have incorporated sustainability in an authentic manner from root to branch, through leaves and fruit, benefiting the other trees in the forest.

MAINTAINING INTEGRATED IMPACT

However, how can this status be maintained over the long term in a way that is resilient to changes in the internal and external environment? Maintaining Integrated Impact means avoiding “Declining Support”, which can set in despite high levels of capacity whenever there are changes in internal and external drivers, especially if other issues have to be prioritised. Declining Support can be avoided by continuing to engage with new and emerging sustainability agendas, including those in updated university strategies and future commitments.

Thus, regular nurturance is needed to increase an institution’s capacities to maintain Integrated Impact, which can be achieved by the following actions:

- Strategy and governance: maintain a holistic commitment to sustainability by ensuring that institutional stakeholders are engaged in processes of reviewing/refreshing strategies.
- Staff development: provide further development opportunities, extending depth and breadth and stretching SDG-relevant targets including embedding sustainability within rewards, recognition and appraisal processes.
- Formal education opportunities: celebrate excellence while continuously reviewing and reflecting on embedded structures where student engagement and partnership are key.
- Extra-curricular opportunities: celebrate achievements and renew external engagement and partnerships.

Drawing on the tree metaphor, this final phase of activity is about maintaining optimum productivity (healthy fruit) year on year, and being an example for others looking to do the same by sharing experience and good practice (grafts). The main risk faced by a thriving ecosystem is that a changing environment (e.g. external policy or resource pressures) may lead to declining health. Hence, keeping the agenda fresh (e.g. through changes in policies or leadership) ensures its continued relevance.

Table 1 summarises the key actions suggested in this section to achieve and maintain Integrated Impact.

LEARNING & TEACHING PAPER #14

Environmental sustainability of learning and teaching

Actions required for progress	Strategy and governance	Staff development	Formal education opportunities	Extra-curricular opportunities
<i>From Pockets of Practice to Emerging Agenda</i>	<ul style="list-style-type: none"> • Making public strategic commitments driven by both internal and external drivers. • Identifying champions for sustainability. • Providing resourcing for initial action. 	<ul style="list-style-type: none"> • Developing a community of practice of engaged staff. • Enhancing academic staff's continuous professional development. • Activating existing channels for educational debate. 	<ul style="list-style-type: none"> • Enhancing and promoting good practice. • Establishing a baseline audit of Education for Sustainable Development. 	<ul style="list-style-type: none"> • Establishing a baseline audit of opportunities for students to engage in extra-curricular activities. • Small grant schemes to enable students to step up to organise activities.
<i>From Emerging Agenda to Integrated Impact</i>	<ul style="list-style-type: none"> • Monitoring progress and reporting regularly on sustainability performance. • Embedding sustainability in quality assurance processes. • Ensuring continuous commitment. 	<ul style="list-style-type: none"> • Developing a comprehensive strategy for strengthening delivery and uptake of sustainability training. • Widespread staff engagement and adoption of Education for Sustainable Development. 	<ul style="list-style-type: none"> • Incorporating Education for Sustainable Development into all curricular activities. • Enhancing depth of engagement with SDGs. 	<ul style="list-style-type: none"> • Engaging partners and the broader public in research and innovation projects through civic mission and living labs. • Engaging external staff, e.g. those involved with student placements or co-curricular courses, in the sustainability agenda.
<i>Maintaining Integrated Impact and reversing Declining Support</i>	<ul style="list-style-type: none"> • Monitoring progress and reporting regularly on sustainability performance. • Aligning sustainability with the institution's identity and purpose. • Creating permanent structures enabling Education for Sustainable Development. 	<ul style="list-style-type: none"> • Regularly reviewing relevant staff development opportunities. • Considering Education for Sustainable Development in academic career progression. 	<ul style="list-style-type: none"> • Incorporating Education for Sustainable Development into the curriculum. • Developing resources. 	<ul style="list-style-type: none"> • Renewing external engagements and partnerships. • Enhancing engagement and the institution's civic mission. • Identifying and using living labs.

Table 1: Key actions to progress across the four scenarios

In addition, Annex 1 provides a list of case examples of institutions that have reached a high level of commitment and capacity. Many of the examples provided draw on the institutional experience of the members of the group.

Conclusions

With this report, the group hopes to provide food for thought and sustenance for growth to any institution aiming to follow its own path in keeping sustainability issues at the core of innovation, practices and reforms. The group acknowledges that this path might be a long and arduous one, especially if the institution's environment (national, regional or other) does not provide favourable conditions.

However, the Pockets of Practice in Education for Sustainable Development that are likely to already exist at almost any higher education institution in Europe and beyond provide a basis for a more thorough and lasting embedding of Education for Sustainable Development in institutional culture.

Integrated Impact can only be achieved and maintained through an ecosystemic approach: involving students and staff (of all categories), governance and stakeholders. It is thus important for institutions aiming to reach this level of impact to continuously provide opportunities for all institutional actors and stakeholders to contribute to the institution's development towards Integrated Impact, such as through consultation, professional development and, perhaps most importantly, tangible acknowledgement of individuals' efforts.

Annexes

ANNEX 1: ACHIEVING AND MAINTAINING INTEGRATED IMPACT – CASE EXAMPLES

Action: developing beyond Pockets of Practice

Strategy and governance

Strategic commitment: Making a visible change, including a public institutional commitment, commitment in university strategy documents and clear strategies for implementation. It is likely that the push for this will come from both internal and external drivers:

- Internal drivers are likely to comprise already engaged staff, professional services teams and/or student bodies.
- External drivers may include a combination of moral, financial, reputational and environmental factors. For some, they may come from government and/or funding bodies.

Champion(s): It is vital that at least one member of, and ideally all of, the executive board acts as a champion for sustainability as a main central driver for all of the activities of the institution.

Resourcing: This is necessary to engage the wider university community, and could include the creation of a dedicated, strategic leadership role, such as a Dean for Sustainability, with the remit for effective change.

Case examples

The Graz University of Technology has a Sustainability Advisory Board¹² to advise university management, develop sustainability strategy, bundle activities, and initiate new proposals and projects.

Cardiff University's executive board declared a Climate Emergency in 2019 and signed the SDG Accord, thus committing to an alignment of the university's activities with the SDGs.

In 2019, Cardiff University recruited a Dean for Environmental Sustainability with a remit for effective change.

Staff development

Community of practice: This community can be created through meetings, email lists and events, bringing together pockets of committed staff or teams who strongly relate to this matter.

Case examples

De Montfort University established an Education for Sustainable Development Forum in 2017, comprising an informal community of enthusiasts drawn from academic staff, the sustainability team and members of the students' union. Since then, using a number of pilot projects, the forum has worked towards developing Education for Sustainable Development as a formal strategic project at the university.

Action: developing beyond Pockets of Practice

Continuous professional development for academic staff: Staff development training should seek to embed sustainability as a value, thus enhancing staff knowledge and engagement, as well as staff's understanding of the relevance of the sustainability topic to their roles. Note, however, that in institutions or countries where academic freedom is highly valued, resistance to top-down agendas should not be underestimated.

At De Montfort University, a member of the Academic Development department undertook a one-year training course in Education for Sustainable Development and then took on the remit of embedding it in staff development. This led to new formal offerings (e.g. Introduction to Education for Sustainable Development training), informal meetings (monthly discussion sessions) and the integration of Education for Sustainable Development into existing staff development sessions (e.g. introductory teacher training delivered to new staff).

Use existing channels: Ways to enhance practice through teaching committees and co-curricular team meetings should be identified.

At De Montfort University, the creation of an Education for Sustainable Development Academic Lead role and strategic commitment to the SDGs enabled meetings/training to take place across all faculties/schools and in key directorate teams (e.g. public engagement, careers, marketing and communications).

Formal education opportunities

Case examples

Enhance and promote best practice: Pilot projects can be developed within small sets of courses.

The Science, Technology and Society Unit of Graz University of Technology¹³ offers a set of recommended master's level elective courses related to sustainability to curricula development committees (e.g. Technology-Ethics-Politics, Futurology, Sustainability Innovation, and Gender and Technology).

Baseline for sustainability education: Mapping institutional actors and activities to identify and recognise current practices in Education for Sustainable Development can help to establish such a baseline.

Since 2016, the University of Bologna has been using a reporting tool based on the SDGs. The report¹⁴ on the use of this tool, by the University Technical Scientific Committee for Social Reporting in collaboration with the university's academic and administration community, describes the impact produced by its core activities in contributing to the achievement of the SDGs.

Monitor progress and report regularly on sustainability performance, including external reviews and audits: Reporting on the SDGs can be profitably applied as indicators or criteria for the assessment of several activities related to research, learning and teaching, and the third mission. This is not intended to be a measuring approach, but rather a way of helping an institution to achieve its own SDGs. Moreover, this allows for the introduction of a culture related to sustainability in all areas of academia.

Action: achieving Integrated Impact

Strategy and governance

Case examples

Embed sustainability in quality assurance processes: Enhance programme development and review processes to ensure that sustainability is core to their outcomes. Ensure comprehensive reporting against key indicators by all faculties and services, overseen by relevant committees. Additional internal actions may include literally placing sustainability on the agenda of all meetings and establishing cross-departmental and interdisciplinary working groups.

National University of Ireland (NUI) Galway uses a four-step approach (awareness, engagement, demonstrator projects and leadership opportunities) to centrally involve students in the policy development process.

Ensure continuous commitment: Internal audits need to be complemented by external ones. Alongside comprehensive dissemination beyond the institutional level, the university begins to play an active role in sharing knowledge on Education for Sustainable Development with the wider higher education sector.

The University of Bologna took part in the Times Higher Education (THE) Impact Rankings. It achieved rank 9 in the 2019 edition, and has promoted its commitment both internally towards staff and students and externally towards partners and other universities and has found this kind of external schemes to support its work

Staff development

Case examples

Aim for widespread staff engagement and adoption of Education for Sustainable Development: In this practice, institutional action relies on the systemic inclusion of sustainability in staff development programmes to provide ongoing support and engagement. In order to overcome potential resistance to such a top-down initiative, adequate institutional incentives need to be provided as well.

University Côte d’Azur (France) offers a 20% reduction in yearly teaching load for new academic staff to compensate for their compulsory teacher training. Similar schemes may be offered to existing or senior staff engaging in continuous professional development.

For those already active in the field, less incentive might be needed, but they will need recognition and reward, such as a certification and career advancement.

Formal education opportunities

Case examples

Embed Education for Sustainable Development across curricular and teaching activities: Beyond programme-focused action, it is also necessary to incorporate appropriate Education for Sustainable Development into modules and disciplines. This must be supported by both bottom-up actions and top-down mapping against SDGs.

The University of Bologna offers cross-curricular modules or programmes dedicated to transversal sustainability skills that students can add to their curricular activities.

Enhance the depth of engagement with the SDGs: After the embedding of sustainability across institutional agendas, the depth of engagement across the field of teaching and learning should be explored. Curricular change should continue through a concerted effort across academic departments and professional services, with resources being freed up or created and time allowed to pursue change through the systems. Universities should identify various mechanisms for ensuring effective communication at different levels and coherence across their curricula.

NUI Galway involves students in reviewing existing courses and modules dealing with sustainability to generate awareness of sustainability-related teaching.

Action: achieving Integrated Impact

Extra-curricular opportunities

Engagement, civic mission and living labs: A low level of community receptivity to engagement (e.g. civil society, organisations to host placements) may be a barrier to embedding sustainability at a systemic level. Action is needed, therefore, to create permanent venues, processes and roles for engaging with sustainability through extra-curricular opportunities, such as service learning and internships, community actions and awards. Connecting students with engaged staff through extra-curricular activities is key, as well as including students in systemic review and progress reports.

Engage co-curricular staff in the sustainability agenda:

This could be achieved through a community-of-practice membership or by inviting dedicated sustainability staff to join relevant team meetings (including promoting careers, community engagement, estates, facilities, civic mission and entrepreneurial activities).

Case examples

An example is the Green Campus Programme. This is an international environmental education and award scheme that promotes long-term institution-wide action for the environment that empowers both students and staff to create a more balanced community and to reduce environmental impact and associated costs.

Action: sustaining Integrated Impact

Strategy and governance

Case examples

Align sustainability with the institution’s identity and purpose and embed it in strategies: Integrated Impact relies on building sustainability into the institution’s strategic framework through a commitment to sustainability and the SDGs. Top-level commitment should then be transposed into corresponding strategies for faculties, directorates and other areas that encompass all aspects of business and operations, and incorporate sustainability into every part of an institution’s activities.

De Montfort University has embedded sustainability in its five-year strategic plan¹⁵ and university-wide strategies, as has NUI Galway, which is a signatory to the SDG Accord and has included sustainability as one of the four key values in its Strategic Plan.¹⁶

Permanent structures (e.g. staff roles, venues) to embed sustainability: Continued action is needed to create permanent venues, strategies and processes for engaging with sustainability. This can be delivered through the creation of new roles that can make a significant contribution to the engagement of staff, students and the wider community, and help support the sustainability agenda across all areas of activity at a university.

At NUI Galway the post of sustainability officer was created as a lead role to educate and engage students on sustainability and to help embed sustainability across all areas of activity.

Staff development

Case examples

Ensure that sustainability remains integrated within various staff training programmes, in alignment with the SDGs: Regular reviews of relevant staff development opportunities can achieve this.

The recent European University Initiative¹⁷ may offer a venue and capacity for staff development and engagement with sustainability. Inter-university staff mobility and certification schemes, such as an open badge scheme, are valuable mechanisms for increasing staff expertise and certification in the field of sustainability.

Universities are also expected to build Education for Sustainable Development excellence into the training and integration phases for newly recruited staff, as well as within academic career progression.

Maintaining commitment to this may be achieved through a broader institutional culture and staff development programmes that combine institution-level strategies with external actions that encourage inter-university staff cooperation and the exchange of sustainability practices.

Formal education opportunities

Case examples

Embed sustainability in the curriculum: Beyond programme-focused action, it is necessary to build Education for Sustainable Development into programmes across all disciplines to enhance exposure to and engagement with sustainability.

Through revision of the learning outcomes of existing programmes and integration of sustainability into the programme approval process across the institution, sustainability can be included in programmes across all disciplines. De Montfort University’s school of Fashion and Textiles, for example, has identified sustainability as a defining concern for teaching, learning and research, and has developed a range of integrated approaches to embed this in the curriculum.

NUI Galway is in the process of developing a university-wide sustainability module that will be available for inclusion in all programmes.

Action: sustaining Integrated Impact

Develop resources: Universities could develop their own resources to promote sustainability practices.

De Montfort University's English Language Learning programme for non-native-English-speaking students has developed its own textbook for learners with associated written/audio/video learning materials using sustainability and the SDGs as the focal topic.

Extra-curricular opportunities

Case examples

Renew external engagement and partnerships: This includes, for example, participating in externally funded programmes such as the Erasmus+ programme, which is aligned to the SDGs and provides grants for a wide range of highly relevant actions related to mobility, exchange and innovation.

Similarly, degree programmes or partnerships with other higher education institutions, research institutes, national regulatory bodies and schools could be set up.

The University of Bologna is significantly involved in European education and training projects, mainly supported by the Erasmus+ programme. In particular, projects focused on environmental sustainability are funded under the Erasmus+ KA1 Erasmus Mundus Joint Master Degrees, the Erasmus+ KA2 Strategic Partnerships and Erasmus+ KA2 Capacity Building.

Enhanced engagement and civic mission: Aligning sustainability policy to the needs and priorities of the local area and communities, and working with local communities to support the development of sustainable communities beyond campus. Working in partnership will strengthen relationships with relevant stakeholders and communities.

At NUI Galway, students are supported in volunteering with relevant local non-profit organisations and awarded volunteering certificates, and alignment of voluntary efforts with the SDGs is recorded.

Living labs: Using the campus buildings and estate as a living lab is an effective way to engage students and encourage them to apply sustainability practices they have learned in the classroom to real-life experience. By using a living labs approach, students can develop problem-solving, critical-thinking and systems-thinking skills and learn to collaborate, build partnerships and work with a team.

Living lab projects at NUI Galway have included engineering students investigating resource use in buildings; business students working with catering contractors to reduce food waste; and marketing students developing sustainability awareness campaigns.

Table 2: Achieving and maintaining Integrated Impact – case examples

ANNEX 2: EUA LEARNING & TEACHING THEMATIC PEER GROUPS

As part of its work on learning and teaching, EUA carries out activities with the aim of engaging with university communities in charge of learning and teaching. One of these activities is coordinating the work of a set of Thematic Peer Groups. The groups consist of universities selected through a call for participation to:

- discuss and explore practices and lessons learnt in organising and implementing learning and teaching in European universities, and to
- contribute to the enhancement of learning and teaching by identifying key recommendations on the selected theme.

The 2020 Thematic Peer Groups, active from March 2020 to February 2021, invited universities to participate in peer learning and exchange of experience, while at the same time contributing to EUA's policy work as the voice of European universities in policy debates, such as the Bologna Process.

Each group was chaired by one university and supported by a coordinator from the EUA secretariat. Due to the Covid-19 pandemic, the groups met in multiple online meetings organised throughout 2020 instead of gathering in person at group members' institutions, as was common practice in previous years. This setting entailed many challenges, but it also provided an occasion to address the respective group themes in the context of the pandemic, which threw a spotlight on issues related to all three themes – environmental sustainability, employability and the skills challenge, and equity and inclusion.

During their online meetings, the group members discussed key challenges related to the theme, how to address the challenges through innovative practices and approaches, and what institutional policies and processes support the enhancement in learning and teaching. In addition, the groups were welcome to discuss any other issue that was relevant to the theme. Members of the groups also contributed to the 2021 European Learning & Teaching Forum from 18 to 19 February, where focus groups based on the work of the Thematic Peer Groups were organised to obtain feedback on their results.

Composition of the Thematic Peer Group “Environmental sustainability of learning and teaching”

(starting with the group chair and by alphabetical order of the country name)

- Cardiff University, United Kingdom: Julie Gwilliam (chair)
- Graz University of Technology, Austria: Andrea Bernhard
- University of Côte d'Azur, France: Natalia Timus
- National University of Ireland Galway, Ireland: Pól Ó Dochartaigh, Michelle O'Dowd, Gesche Kindermann
- University of Bologna, Italy: Elena Luppi
- Utrecht University, Netherlands: Margien Bootsma, Karin Rebel
- De Montfort University, United Kingdom: Jackie Labbe, Andrew Reeves, Ross Kelly (student)
- Group coordinator: Helene Peterbauer, Policy & Project Officer, EUA

Endnotes

1 _____ The contents of this report were first presented during a focus group that took place as part of the 2021 European Learning & Teaching Forum. The group would like to thank the participants of the focus group for their feedback and further input.

2 _____ See <http://bit.ly/3cKKWSa> (accessed 05/01/2021).

3 _____ UNESCO, 2020, *Education for Sustainable Development: A Roadmap*. <https://bit.ly/38PFGMG> (accessed 05/01/2021).

4 _____ For example, see World Economic Forum, 2020, *The Future of Jobs Report 2020*. <http://bit.ly/3cBVSSa> (accessed 05/01/2021).

5 _____ See, for example, <http://bit.ly/38PbnoV> (accessed 04/01/2021).

6 _____ See <http://bit.ly/300uTgR> (accessed 04/01/2021).

7 _____ See <http://bit.ly/38LqIvW> (accessed 04/01/2021).

8 _____ See <http://bit.ly/3rZI6PJ> (accessed 04/01/2021).

9 _____ See <http://bit.ly/3rWsD2W> (accessed 22.02.21).

10 _____ See also the European Commission's *Communication to the European Parliament, the Council, the European Economic and Social Committee and the Committee of the Regions: EU Biodiversity Strategy for 2030*, published in May 2020: <http://bit.ly/3rRSJEa> (accessed 04/03/2021).

11 _____ The image was created by group members Karin Rebel and Margien Bootsma, with the support of Ton Markus from Utrecht University.

12 _____ See <https://bit.ly/2P2OEP6> (accessed 05/01/2021).

13 _____ See <http://bit.ly/3eL1T1H> (accessed 05/01/2021).

14 _____ See <https://bit.ly/3bT4CUM> (accessed 05/01/2021).

15 _____ See <http://bit.ly/3lpS8qL> (accessed 05/01/2021).

16 _____ See <http://bit.ly/300NucD> (accessed 05/01/2021).

17 _____ See <http://bit.ly/3rXCx4b> (accessed 05/01/2021).

The European University Association (EUA) is the representative organisation of universities and national rectors' conferences in 48 European countries. EUA plays a crucial role in the Bologna Process and in influencing EU policies on higher education, research and innovation. Thanks to its interaction with a range of other European and international organisations, EUA ensures that the voice of European universities is heard wherever decisions are being taken that will impact their activities.

The Association provides unique expertise in higher education and research as well as a forum for exchange of ideas and good practice among universities. The results of EUA's work are made available to members and stakeholders through conferences, seminars, websites and publications.

This paper is one of a series of reports specifically focused on learning and teaching. It is designed to gather the knowledge and experiences of experts on the topic from across Europe. EUA's activities in learning and teaching aim at enhancing the quality and relevance of higher education provision, underline the importance of learning and teaching as a core mission and advocate for learning and teaching activities to be geared towards student learning and success.