



Editorial

Sustainability Assessment in Higher Education Institutions

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Abstract: This Special Issue "Sustainability Assessment in Higher Education Institutions" provides peer-reviewed research from several geographies and institutions and covering various topics with the broad objective of achieving an assessment of the effectiveness and impact of different implementation dimensions measuring and evaluating how sustainability is being applied in practice. A set of nine papers, covering sustainability education, interdisciplinary teaching, sustainable assessment, governance strategies, commitments and practices, and social responsibility at Higher Education Institutions, contribute significantly to this area of knowledge.

Keywords: education for sustainable development; higher education institutions; commitments; practices

Higher Education Institutions (HEIs), within their mission and activities, have an important responsibility in the transformation of societies and, in particular, in contributing to the development of a more sustainable society. These institutions can implement sustainable development in different dimensions, according or not to a holistic approach, from education and curricula, campus operation, organizational management, external community and research, to assessment and communication. Ideally, these implementations should be based on a holistic/integrated approach that the United Nations Educational, Scientific and Cultural Organization (UNESCO, Paris, France) calls the "Whole-School Approach". Assessment of the effectiveness and impact of these different implementation dimensions allows measuring and evaluating how sustainability is being applied in practice, and highlighting weakness, strengths, and improvements needed.

This Special Issue aims to share knowledge and stimulate innovation within the larger theme of Sustainability Assessment in Higher Education Institutions. It gathers nine articles from the USA, China, Taiwan, and Europe (Portugal, Spain, Germany, and Slovakia). Readers can find research outputs and theoretical discussions about knowledge, perceptions, and motivation toward sustainability education, interdisciplinary teaching for sustainability, performance indicators and sustainable assessment, governance sustainability strategies, commitments and practices, and social responsibility at Higher Education Institutions.

Please find below a brief summary of each article, organized by chronological order of acceptance. Pompeii et al. (2019) [1] analyzed student and faculty knowledge and perceptions toward sustainability education at undergraduate level in a USA University. Findings identified diverse levels of sustainability knowledge within the student body and among faculty and revealed barriers

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in pursuing interdisciplinary sustainability curricula across disciplines. A common pattern showed a denial of personal responsibility when addressing sustainability challenges.

Liu, Z. et al. (2019) [2] analyzed three global ranking indices, the Academic Ranking of World Universities, the Quacquarelli Symonds World University Ranking, and the Times Higher Education World University Rankings in newly formed world-class universities. The analysis aimed to discuss, based on the sustainability indicators of the ranked indices, what the common shared sustainability indicators, their variations, and contributions in the future and the research productivity and government initiatives of the universities are. The authors concluded that for the sustainability of universities, it is necessary to have an increasing emphasis on the effectiveness and efficiency of government-supported research, stability of investments, and more approaches to employ international initiatives, allowing outstanding educational programs and comprehensive internationalization. Nevertheless, the authors highlighted the criticism and cautions with regard to the used indicators, the institutions being measured, and the diversity of features to make comparisons using this type of ranking indices.

Farinha et al. (2019) [3] aimed to identify to what extent the integration of sustainability in universities in Portugal has been achieved through an analysis of their strategic and activity plans and sustainability reports. This paper highlighted the importance of analyzing the content of plans and reports from higher education institutions when intending to assess and define a country profile for the implementation of sustainability in the educational sector. According to the authors, this research may also be helpful in sharing and encouraging best practices of sustainability implementation in these types of institutions and ways of improvement.

Weng et al. (2019) [4] developed and tested an integrated model for the evaluation and improvement of university teachers based on the official teacher evaluation criteria of China's International Scholarly Exchange Curriculum program. A multiple-criteria decision-making methodology was used. Authors concluded that the developed model can be a support tool for decision makers to improve their current evaluations of teachers and to provide a cause–effect improvement strategy for education reform committees and higher education institutions, namely within sustainable development.

Filippo et al. (2019) [5] aimed to evaluate Spanish universities performance and sustainability research, development and innovation, based on indicators of scientific activity. Scientometric techniques to analyze the journal (Web of Science) and European project databases, along with reports issued by Spanish institutions, were used. The authors concluded that Spanish universities' research sustainability projects within sustainability are still insufficient, with a gap between policies and results. Nevertheless, the use of this type of analysis can be important in terms of transparency and accountability to help to promote measures that encourage information on the impact of university sustainability actions on society.

Kucharcikova et al. (2019) [6] aimed to identify factors affecting the motivation of students in a university at the Slovak Republic so they can actively engage in the education process. It also aimed to define recommendations for the increase of this motivation and contribution to the sustainability of education at the universities. Through a questionnaire survey, authors found that motivation factors are mainly related with future job expectations (friendly working team, working conditions, meaningful work, and the opportunity for self-fulfillment). Motivation is also related with the quality of education with new, progressive, and participative education methods and updated content of the study programs connected with the actual requirements of the labor market.

Marqués-Sánchez et al. (2019) [7] aimed to analyze university students' behavior in their networks following a cooperative interdisciplinary educational intervention (with the participation of students from different undergraduate programs) and the association with academic performance, resilience, and engagement. According to the authors, this way of understanding, through collaborative work between different faculties and how the university context approaches social reality, is a useful way to propose innovative and sustainable solutions in teaching–learning.

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Roos (2019) [8] conducted a systematic review on how Higher Education Institutions (HEI) assume their responsibilities as social institutions, analyzing their social performance. According to the authors, social matters, namely, responsible management, strategy implementation, and leadership, as well as the measurement of outcomes at HEIs, are a recent interest of HEIs. Also according to the authors, ecological sustainability prevails within the scientific discourse and reporting, whereas social performance plays a minor role. Furthermore, the existing assessment tools for sustainability at HEIs are not measuring this performance well. HEIs are strongly determined by their mission on research and teaching and so far have not focused on other external demands from outside the organization, so future work is needed in this field.

Caeiro et al. (2020) [9] aimed to critically reflect the existing tools to assess and benchmark education for sustainable development implementation at Higher Education Institutions and to discuss their applicability in two case studies in Portugal and Spain. The authors concluded that there is a need to define a common objective of the assessment tools and continuous improvements on their development, namely, the need to integrate the external impact of HEI on sustainability, to integrate participatory processes, and to assess nontraditional aspects of sustainability.

In conclusion this Special Issue on "Sustainability Assessment in Higher Education Institutions" presents an overview of ongoing research on updated and holistic strategies and initiatives, integrated and collaborative learning, engagement of personal and institutional responsibility, and long-term performance assessment for sustainability implementation at Higher Education Institutions (inside and outside impact) that is essential for the achievement of Sustainable Development Goals and quality education. A long pathway is still needed, but HEIs are on their way.

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