

Editorial

Clean Energy and Sustainability: A New Open-Access Journal to Share Your Research Results on Renewable/Clean Energies and Sustainability

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1. Origin of Clean Energy and Sustainability?

Clean energy is green energy that comes from zero emission sources and can be used for production and life immediately. In May 2021, the International Energy Agency (IEA) published a milestone report – Net Zero by 2050: A Roadmap for the Global Energy System, which charts a narrow but achievable roadmap to a 1.5 °C stabilization in rising global temperatures and the achievement of other energy-related sustainable development goals [1]. How to meet the target? Much depends on the pace of innovation in new and emerging technologies, the extent to which citizens are able or willing to change behavior, the availability of sustainable bioenergy and the extent and effectiveness of international collaboration [2]. Therefore, achieving net zero emissions requires an unparalleled increase in clean energy investment and size the market opportunity for clean energy [3].

Carbon neutrality, as a state of net-zero CO₂ emissions, which can be achieved by counterbalanced all worldwide greenhouse gas emissions by carbon sequestration. Another way to reduce emissions and to pursue carbon neutrality is to offset emissions made in transportation, energy production, agriculture, and industry by reducing them through science-based measures such afforestation and energy saving and reduction emission. This can be done through development of renewable energy, energy efficiency or other clean, low-carbon technologies [4]. In the 75th session of the UN General Assembly President Xi Jinping proposed that China will increase its National Determined Contribution and adopt more powerful policies and measures. We strive to peak CO₂ emissions before 2030 and achieve carbon neutrality before 2060 [5,6]. Till the end of December 2021, net zero targets has been set by 136 countries, 115 regions, 235 cities, and 682 companies, which have covered 88% of global greenhouse get emissions, 90% of global GDP and 85% of the world's population [7].

In August 2021, East China University of Science and Technology (ECUST) opened the School of Carbon Neutrality Future Technology, a new hub for nurturing talent. ECUST aims to integrate environmental science, synthetic biology and RcM into its curriculum and ride on a collaborative learning environment towards China's carbon neutrality targets [8].

Within this context, the new open access journal, hosted by the School of Resource and Environmental Engineering (SREE) at ECUST and undertaken by the SCIEpublish platform, is launched. We aim to create a high-level and international journal to become the flagship in this field, as well as to increase the international impact of Chinese scientific research institutions.

2. Introduction of School of Resource and Environmental Engineering (SREE) at East China University of Science and Technology (ECUST)

Clean Energy and Sustainability is hosted by SREE at ECUST. The university was officially founded in 1952 after the mergence of chemical or chemistry departments from Jiaotong University, Université d'Aurora, Utopia University, Soochow University and Jiangnan University, and became the first chemical industry oriented university in China named as East China Institute of Chemical Technology. Today, a wide range of programs in ECUST, covering 8 disciplines, namely Chemistry, Materials Science, Engineering, Biochemistry and Biology, Pharmacology and Toxicology, Agricultural Science, Computer Science, Environment/Ecology have walked into Top 1% of World ESI Ranking, and Chemistry is among Top 1‰ group. SREE was founded in 1997 with distinctive characteristics and advantages of multidisciplinery capabilities including Environmental Engineering, Thermal Energy & Power Engineering, and Chemical Engineering. The school has made substantial contribution to the national environment and economy with its numerous important R&D accomplishments and many highly capable graduates. SREE of ECUST has become an important base for high-level scientific research, high-tech achievement and high-level training in the fields of resources, energy, environment in China. The vision for the college is to become a first-class college that integrates resources, energy, environment and safety with multi-disciplinary characteristics, have extensive international influence and competitiveness, and be able to lead the sustainable development of society.

In fact, the genesis of *Clean Energy and Sustainability* was stimulated by the collaboration between ECUST and SCIEPublish that strongly hopes to promote academic exchanges and discussion on global energy issues in the community of researchers from all over the world.

3. Why Would You Submit Your Work to Clean Energy and Sustainability?

3.1. Comprehensive Scope

Clean Energy and Sustainability is open to publish papers from all aspects of sources, materials, systems, technologies and applications of clean energies. The journal has a strong focus on integration of disciplines for renewable/clean energies and applications that have potential to address problems covering:

- Carbon neutrality
- Sustainable energy systems
- Renewable energies
- Energy environment
- Energy economics and policy

3.2. Professional Team

Clean Energy and Sustainability has a strong Editorial Board team, which contains 38 experts from 13 countries with the combination between very established and senior researchers, as well as more junior representatives covering very different aspects in the field of clean energy. The Editor-in-Chief Prof. Chengcheng Tian, with rich experiences of her team from ECUST, is responsible for the academic quality of the publication process and the strategy of the journal development. The co-Editor-in-Chief Prof. Andrea G. Capodaglio, a senior researcher from University of Pavia, is responsible for professional and strategical suggestions of journal development and promotion in the European Market.

3.3. Reliable Support

With the value of "Diligence, Factuality, Aspiration and Virtue", ECUST has always been making every endeavor to develop its united and pioneering spirit since its establishment, and is dedicated to providing its students and researchers with advanced knowledge and skills in an academic environment full of intellectual stimulation and scientific innovation. As an official journal of ECUST, the authority and professionalism of *Clean Energy and Sustainability* is guaranteed. In order to reduce the publication barriers, SCIEPublish will cover the publication charge for first two years.

4. Perspectives

We hope you will find that *Clean Energy and Sustainability* is a rigorous and reliable publication platform to develop into an advanced forum for scientific exchange and communications. We believe that we could make *Clean Energy and Sustainability* a high-quality and continuous open-access journal on clean energy with the greatest reach and research impact through our joint effort in the near future.

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