



AT-SGIRES IMPACT

Target groups will be reached through the following means:

- 1) Direct engagement with students on university levels which covers all applicants involved.
- 2) Direct engagement with the workforce from the industries (stockholders) which work in the field of smart grid field (through fellowship programs).
- 3) Seminars and conferences held by the consortium will open up the channels required to communicate the outputs of the project to target groups 3 and 4.
- 4) The dedicated website and online data provided by the consortium will further reach out to all parties who find the project's work of relevance to their domain of work/research.
- 5) Printed material including newsletters, brochures and training booklets will enable the consortium to reach out to institutes and centres directly or indirectly involved in smart grid applications

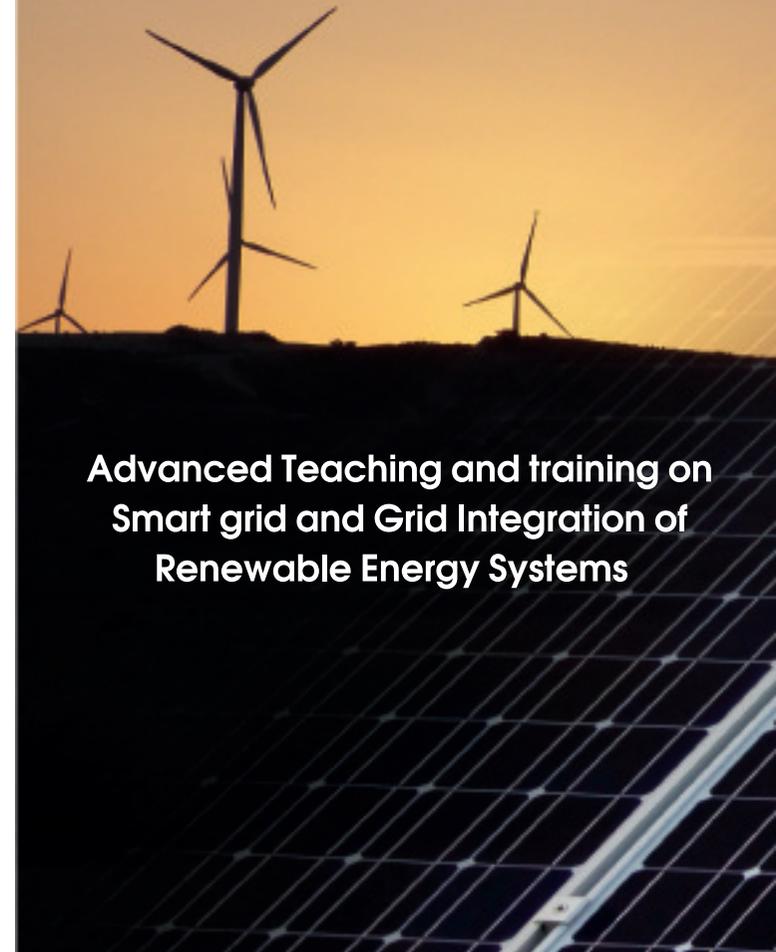


DISCLAIMER

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AT-SGIRES



Advanced Teaching and training on
Smart grid and Grid Integration of
Renewable Energy Systems

Website: meu.edu.jo/sites/atsgires/





AT-SGIRES PROJECT

Renewable Energy (RE) is expected to be one of the main solutions for clean power supply and covering the shortage in the electrical power as the case of many countries in MENA like Syria, Jordan, Morocco, Lebanon, Iraq and Egypt.

Smart Grids (SG) are expected to be a key enabler in the integration of Renewable Energy Sources (RES) in the electrical networks. Better understanding of the SG concept enables faster and more sustainable development of the RE and SG market. However, this knowledge field is underrepresented in the existing technically overwhelmed teaching curricula at universities and hence, is considered a deficit that should be reduced.

The importance of this project comes from tackling this problem by integrating the SG and the methods of integrating RES to electrical grid in RE teaching programmes offered at HEIs in beneficiary countries.

In this context, this project aims at developing and implementing interdisciplinary teaching modules and training courses on SG and integration of RES to electrical networks on university teaching level. While the teaching materials target graduate and postgraduate students, the training courses are designed to train the teachers involved in the process. The teaching modules will be prepared by the project partners in close cooperation with industrial stockholders. A training center will also be established in beneficiary universities to facilitate the development of the workforce currently working in the field of RE. One of this project outputs will be the curricula of this center. In the implementation phase, the modules will be incorporated in existing curricula at partner universities and some special modules will be also offered in the training center for the industrial stockholders. In a following step, these modules will be disseminated through targeted e-learning.

The expected impact of this project is mainly making the teaching of SG and RES at participating universities more comprehensive and to enhance the workforces' knowledge level currently involved in RE market about the application of SG.



AT-SGIRES OBJECTIVES

-The main objective of the Project is:

The main objective of the project is to provide a high quality education for MENA students in the key aspects of Smart grid concept with the emphasis on its application and technology, therefore enabling them to take responsible, creative, challenging and stimulating posts in policymaking, industry or research in this targeted field

-The project specific objectives are as follow:

1. To introduce the topic of Smart grid and grid integrated systems to the curricula of undergraduate and Postgraduates programmes in different MENA and EU universities
2. To deepen the understanding of the smart grid projects and grid connected system among Communities, working force and university renewable energy faculty members and graduates in the MENA region.
3. To improve the quality of renewable energy integration and smart grid courses offered in the partner Universities.
4. To develop and implement online teaching modules in the field of smart grid and integration of Renewable energy sources for a wider dissemination.
5. To enhance cooperation amongst Jordanian, Moroccan and Syrian Universities on one hand and these with EU Universities on the other hand in the field of smart grid technology and grid connected systems.
6. To build the capacities of the university teaching staff in partner universities through training Workshops and exchange activities.
7. To establish a teaching and training centre to offer short-courses for workforces in energy industry and tailored education programs



The project outputs will be greatly beneficial to five main groups:

- 1) Higher education students particularly in the fields of Electrical Engineering and Renewable Energy Engineering.
- 2) The workforce in the field of renewable energy and smart grid application and technology.
- 3) Higher Education staff members particularly those engaged in the pedagogic work relating to the field of Smart Grid and grid integrated systems in all multitudes of its technical aspects.
- 4) Institutions throughout the regions which the applicants belong to that are directly involved in the design, development, realization and maintenance of the electrical grid system.
- 5) Engineering and scientific industries and training centres in the regions which the applicants belong to that are actively engaged in fields relating to renewable energy, intelligent meters, power system design etc.

