Master of Philosophy Program in Energy Technology (International Program)

M.Phil (Energy Technology)

Philosophy:

The Joint Graduate School of Energy and Environment, King Mongkut's University of Technology Thonburi has the founding philosophy to be a national center of excellence for education and training in energy technology. It aims to produce high caliber human resources for science and technology related to energy and environment as a result of the impact of the production and utilization of energy.

The Master of Philosophy Program in Energy Technology intends to produce high quality graduates in energy technology. It focuses on research so research studies will be analyzed and synthesized with the utmost aim of creating or developing a new body of knowledge to solve the problems of energy crisis and the release of greenhouse gases locally and internationally. It also aims at producing high quality research studies with international standard. This philosophy can properly suit its determination to produce high quality personnel with professional ethics who are responsible for society. The graduates can analyze and create a new body of knowledge for solving problems related to energy and its impact from the production and the utilization of energy locally and internationally to fulfill the demand for human resources. It is expected that the graduates can be the think tank of government and the private sector to drive Thailand towards a knowledge-based society in the near future.

Objectives:

1. To produce professional researchers who can analyze problems and synthesize a new body of knowledge and/or have sufficient knowledge for developing into high level researchers in the doctoral program who have background education that integrates new technology and understanding the impact of the production and utilization of energy.

   The graduates are expected to be equipped with English communication skills to be able to work professionally. It also focuses on instilling a conscious mind of new researchers who understand the impact of energy production and utilization to the environment.

2. To produce high quality research studies internationally and create a new body of knowledge for solving energy-based problems which are related to environmental problems in energy production and services.

Qualifications of a prospective candidate:

1. Has a bachelor's degree with honors in science/engineering or technology from tertiary institutes approved by the Office of Civil Service Commission or the University Council with a GPA not less than 2.75 or the institutes' program faculties have considered appropriate for studying in the program, or

2. Has a graduate diploma with a GPA not less than 3.5 from tertiary institutes approved by the Office of Civil Service Commission or the University Council or has other qualifications as stipulated by JGSEE.
3. Has English proficiency according to the level required by JGSEE.
4. Has other qualifications as stipulated by JGSEE for JGSEE application.

Professions after graduation:

1. Scientists or researchers or engineers in energy
2. Academics in energy
3. Analysts and planners in energy policy
4. Lecturers
5. Consultants in energy
6. Database administrators in energy
7. Project coordinators in energy
8. Specialists in energy in government and private sectors

Curriculum

Total Program Credits	40 Credits

Curriculum Components

Plan 1.2 Dissertation

Major Course	7 Credits
Elective Course	6 Credits
Dissertation	27 Credits

COURSE STRUCTURE

First Year/ First Semester		**Credits**
JEE 601	Seminar for M.Phil (Energy Technology)	1
JEE 606*	Mathematical Techniques	3
JEE 607*	Optimization Techniques	3
JEE 613	Research Methodology (Energy Technology)	3
XXX	Elective	3
XXX	Elective	3
	Total	**13**

		Credits
First Year/ Second Semester		
JEE 602	Dissertation for M.Phil (Energy Technology)	9
	Total	**9**

Second Year/ First Semester		**Credits**
JEE 602	Dissertation for M.Phil (Energy Technology)	9
	Total	**9**

Second Year/ Second Semester		**Credits**
JEE 602	Dissertation for M.Phil (Energy Technology)	9
	Total	**9**