## **ETM 504 – ENERGY MARKETS**

## **Catalog Description:**

Energy market relations and models. Power markets: participants, operation, load management. Bilateral contracts, day-ahead market, balancing market, ancillary services market. Regional markets, export and import. Financial markets and products. Natural gas market operations, supply markets. Introduction to price forecasting models.

## Weekly Syllabus:

SPRING-First Half	ETM 504 Energy Markets		
	(Sat 13:00-15:45, Tue 19:00-21:45)		
Date	Lecture #	Instructor	
Sat, Jan 22, 2022	Restructuring, liberalization and competition in Energy Markets	Burak Yitgin	
Tue, Jan 25, 2022	20 years of Turkish electricity market liberalization	Burak Yitgin	
Sat, Jan 29, 2022	Investments in Energy Markets	Burak Yitgin	
Tue, Feb 1, 2022	Support Schemas in Electricity Markets	Burak Yitgin	
Sat, Feb 5, 2022	Bilateral contracts - OTC in Electricity Markets	Burak Yitgin	
Tue, Feb 8, 2022	Spot Electricity Markets	Burak Yitgin	
Sat, Feb 12, 2022	Power Futures - Balancing Power Market & Ancillary Services	Burak Yitgin	
Tue, Feb 15, 2022	Electricity Distributions Operation, Load Curves, End-User Tariffs, Profiling, Customers and Dynamics of Retailing	Burak Yitgin	
Sat, Feb 19, 2022	Cross Border Trading - Demand Response	Burak Yitgin	
Tue, Feb 22, 2022	Crude Oil Markets	Burak Yitgin, Serkan Şahin	
Sat, Feb 26, 2022	Petroleum Products Markets	Burak Yitgin, Serkan Şahin	
Tue, March 1, 2022	Natural Gas Markets	Burak Yitgin, Serkan Şahin	
Sat, March 5, 2022	LNG Markets	Burak Yitgin, Serkan Şahin	
Tue, March 8, 2022	Environmental markets: Green Certificates, Emission Trading	Burak Yitgin	

**Classroom Methodology:** Activities

Description of the course contents and open discussion of concepts. The students have also to try to respond to the numerous questions posed by the instructors throughout the lecture.

**Term paper discussion:** The papers will be discussed with the instructors of the course in closed sessions with about 3 students each and between half and an hour duration per group, on the basis of a brief slide presentation to support the main points of the discussion raised by the student.

Non-Classroom Methodology: Activities

Teaching resources require the active participation of the student. In addition, the classroom activity should be complemented by the individual student work performed out of class. Both aspects are taken into account in the evaluation method.

Evaluation activities	Grading criteria	Weight
Participation in the class	Contribution to the class discussions and exercises	15%
Term paper	- The quality of the analysis itself, the clarity and comprehensiveness of the discussion developed. The soundness of the references used are also pondered.	50%
<u>Presentation</u>	- The oral presentation of the work, the way the students build up their discussions, and their ability to back their proposals and to respond to the questions received.	35%