

Energy Science and Technologies Department Program Outcomes -Courses Matrix						Program Outcomes							
Code	Course Name	T	P	K	ECTS	1	2	3	4	5	6	7	8
1.Year - 1. Semester													
FBE8001	Scientific Research Techniques and Publication Ethics	3	0	3	3	3	3	2	4	4	4	5	3
EBT8001	Energy Efficiency and Management	3	0	3	8	4	3	4	4	2	3	3	5
EBT8003	Renewable Energy Technologies	3	0	3	8	3	3	3	4	2	2	4	5
EBT7001	Seminar	0	2	0	8	2	2	2	2	5	4	1	2
EBT7003	Doctoral Qualification	0	0	0	30	5	5	4	4	4	3	3	5
EBT7005	Specialized Field Course	5	0	0	2	5	5	4	4	4	3	3	5
EBT7007	Thesis Proposal	0	0	0	30	5	5	4	4	4	3	3	5
EBT7009	Thesis Research	0	1	0	30	5	5	4	4	4	3	3	5
EBT7101	Solar Cell Technologies	3	0	3	8	2	4	5	4	3	2	3	2
EBT7103	Light-Matter Interaction	3	0	3	8	2	4	5	4	3	2	3	2
EBT7105	Thermal Analyses Applications	3	0	3	8	2	4	5	4	3	2	3	2
EBT7107	Energy Quality	3	0	3	8	2	4	5	4	3	2	3	2
EBT7109	Multi Phase Flows	3	0	3	8	2	4	5	4	3	2	3	2
EBT7111	Quality Management for Power Plants	3	0	3	8	2	4	5	4	3	2	3	2
EBT7113	Energy Storage Technologies	3	0	3	8	2	4	5	4	3	2	3	2
EBT7115	Energy Biotechnologies	3	0	3	8	2	4	4	3	2	2	3	2
EBT7117	Radiation Safety and Protection in Nuclear Energy Generation	3	0	3	8	3	3	5	2	3	2	3	3
EBT7119	Trend Topics in Energy Science and Technology	3	0	3	8	3	5	4	3	4	2	3	3
1.Year - 2. Semester													
EBT8002	Material Science in Energy Applications	3	0	3	8	3	4	4	4	2	3	3	5
EBT8004	Advanced Thermodynamics	3	0	3	8	3	4	4	4	2	2	4	5
EBT7002	Seminar	0	2	0	8	2	2	2	2	5	4	1	2

EBT7004	Doctoral Qualification	0	0	0	30	5	5	4	4	4	3	3	5
EBT7006	Specialized Field Course	5	0	0	2	5	5	4	4	4	3	3	5
EBT7008	Thesis Proposal	0	0	0	30	5	5	4	4	4	3	3	5
EBT7010	Thesis Research	0	1	0	30	5	5	4	4	4	3	3	5
EBT7102	Nanosensors	3	0	3	8	2	4	4	3	4	2	3	2
EBT7104	Thin film Deposition Techniques for Solar Cells	3	0	3	8	2	4	5	3	3	2	3	3
EBT7106	Polymer Technology in Energy Storage	3	0	3	8	2	4	4	3	3	2	3	2
EBT7108	Fuel Cells Principles and Applications	3	0	3	8	3	4	4	4	4	2	3	2
EBT7110	Radiation Detection Techniques in Nuclear Energy Production	3	0	3	8	3	3	5	2	3	2	3	3
EBT7112	Nuclear Reactor Safety	3	0	3	8	2	4	4	3	3	2	3	3
EBT7114	Thermoelectric Energy Conversion	3	0	3	8	3	5	4	3	4	2	3	3
EBT7116	Nuclear Reactor Dynamics and Control	3	0	3	8	3	3	4	3	3	2	3	3
EBT7118	Life Cycle Analysis of Renewable Energy Systems	3	0	3	8	5	5	5	3	4	3	3	4
EBT7120	Sustainable Energy and Climate Change	3	0	3	8	2	4	5	4	3	2	3	2