



北京理工大学
BEIJING INSTITUTE OF TECHNOLOGY

(Updated on 2019.12.27)

English Taught Programs for Graduates

- ★ **Mechanical Engineering**
- ★ **Electronics Science and Technology**
- ★ **Information and Communication**
- ★ **Control Science and Engineering**
- ★ **Computer Science and Technology**
- ★ **Chemistry**
- ★ **Chemical Engineering and Technology**
- ★ **Law**
- ★ **MBA**

English-taught Program in Mechanical Engineering (master)

No.	Course Code	Course Title (Chinese)	Course Title (English)	Credits	Semester	SemesterTime	Master/Ph.D
1	0301003	高等机械振动	Advanced Mechanical Vibration	3	1	September	Master
2	0301008	弹性力学	Elasticity	2	1	September	Master
3	0301009	结构优化方法	Structural Optimization Method	2	1	September	Master
4	0301012	CAD/CAM/CAE原理及工程应用	Principle and Application of CAD/CAM/CAE	2	1	September	Master
5	0301001	高等工程数学导论	Introduction to Advanced Engineering Mathematics	3	2	March	Master/Ph.D
6	0301002	现代控制理论基础	Fundamentals of Modern Control Theory	3	2	March	Master
7	0301004	高等工程热力学和传热学	Advanced Engineering Thermodynamics and Heat Transfer	3	2	March	Master
8	0301010	现代测试技术	Modern Measurement Technology	2	2	March	Master
9	0301011	有限元原理	Principle of Finite Element Method	2	2	March	Master
10	0301016	节能和新能源汽车技术	Energy-saving and new energy vehicle technology	2	2	March	Master/Ph.D
11	0301017	智能车辆机器学习技术	Learning-based Intelligent Vehicle technology	3	2	March	Master/Ph.D
12	0301006	先进控制工程	Advanced Control Engineering	2	1	September	Ph.D
13	0301007	机械结构疲劳与寿命设计	Fatigue Life Design of Mechanical Structure	2	1	September	Ph.D
14	0301014	切削理论与先进制造基础	Cutting Theory and Advanced Machining Processes	2	1	September	Ph.D
15	1701003	科学与工程计算	Science and Engineering Calculation	2	1/2	September / March	Ph.D
16	0301005	计算流体力学	Computational Fluid Dynamics	2	2	March	Ph.D
17	0301013	工程管理	Engineering Management	2	2	March	Ph.D
18	0301015	现代车辆先进技术	Advanced Technology of Modern Vehicle	2	2	March	Ph.D

English-taught Program in Electronic Science and Technology

No.	Course Code	Course Title	Course Title	Credits	Semester	SemesterTime
1	0501001	统计信号处理基础	Fundamentals of Statistical Signal Processing	2	1	September
2	0501002	信息论	Information Theory	2	1	September
3	0501003	雷达系统导论	Introduction to Radar Systems	2	1	September
4	0501006	CMOS 模拟集成电路设计	Design Of Analog CMOS Integrated Circuits	2	1	September
5	0501012	语音信号数字处理	Digital Speech Signal Processing	2	1	September
6	0501014	高等数字通信	Advanced Digital Communications	2	1	September
7	0501016	量子雷达原理	Quantum Radar Principle	2	1	September
8	0501019	电磁场与电磁波	Electromagnetic Field and Waves	2	1	September
9	0501004	现代天线理论与技术	Modern Antenna Theory and Technology	2	2	March
10	0501005	射频电路设计理论与应用	RF Circuit Design Theory and Application	2	2	March
11	0501009	FPGA与SOPC设计基础	Foundations of FPGA and SOPC Design	2	2	March
12	0501011	多源数据融合理论与应用	Multi-source Data Fusion Theory and Application	2	2	March
13	0501013	通信网络基础	Fundamental Communication Networks	2	2	March
14	0501017	高分辨雷达	High Resolution Radar	2	1	September
15	0501018	通信前沿技术专题	Communication Frontier Technology topics	2	2	March
16	0501020	移动通信	Mobile Communication	2	2	March
17	0501022	医学图像处理与人工智能	Medical Image Processing and Artificial Intelligence	2	2	March

English-taught Program in Information and Communication Engineering

No.	Course Code	Course Title	Course Title	Credits	Semester	SemesterTime
1	0501001	统计信号处理基础	Fundamentals of Statistical Signal Processing	2	1	September
2	0501002	信息论	Information Theory	2	1	September
3	0501003	雷达系统导论	Introduction to Radar Systems	2	1	September
4	0501012	语音信号数字处理	Digital Speech Signal Processing	2	1	September
5	0501013	通信网络基础	Fundamentals of Communication Networks	2	2	March
6	0501014	高等数字通信	Advanced Digital Communications	2	1	September
7	0501016	量子雷达原理	Quantum Radar Principle	2	1	September
8	0501019	电磁场与电磁波	Electromagnetic Field and Waves	2	1	September
9	0501004	现代天线理论与技术	Modern Antenna Theory and Technology	2	2	March
10	0501005	射频电路设计理论与应用	RF Circuit Design Theory and Application	2	2	March
11	0501006	CMOS模拟集成电路设计	Design Of Analog CMOS Integrated Circuits	2	1	September
12	0501009	FPGA与SOPC设计基础	Foundations of FPGA and SOPC Design	2	2	March
13	0501011	多源数据融合理论与应用	Multi-source Data Fusion Theory and Application	2	2	March
14	0501017	高分辨雷达	High Resolution Radar	2	1	September
15	0501018	通信前沿技术专题	Communication Frontier Technology topics	2	2	March
16	0501020	移动通信	Mobile Communication	2	2	March
17	0501022	医学图像处理与人工智能	Medical Image Processing and Artificial Intelligence	2	2	March
18	0500167	概率、随机过程和随机几何及其应用	Probability, Random Process and Stochastic Geometry in Engineering	2	1	September

English-taught Program in Control Science and Engineering

No.	Course Code	Course Title	Course Title	Credits	Semester	SemesterTime
1	0601001	自动控制中的线性代数	Linear Algebra with Applications in Automatic Control	3	1	September
2	0601003	随机过程理论及应用	Stochastic Process and Its Applications	2	1	September
3	0601002	线性控制系统	Linear Systems Theory	3	1	September
4	0601007	系统工程原理及应用	Systems Engineering Principles and Application	2	1	September
5	0601004	最优与鲁棒控制	Optimal and Robust Control	2	2	March
6	0601005	计算机与分布式控制系统	Computer and Distributed Control Systems	2	2	March
7	0601006	多源信息滤波与融合	Kalman Filter and Multisensor Data Fusion	2	2	March
8	0601008	现代电力电子学	Modern Power Electronics	2	2	March

English-taught Program in Computer Science and Technology

No.	Course Code	Course Title	Course Title	Credits	Semester	SemesterTime
1	0701006	Web挖掘	Web Mining	2	1	September
2	0701003	高级操作系统	Advanced Operating Systems	2	1	September
3	0701001	计算机科学与技术前沿	Computer Science and Technology Frontier	2	1	September
4	0701013	网络与信息安全	Network and Information Security	2	1	September
5	0701014	高级计算机网络	Advanced Computer Networks	2	1	September
6	0701010	内容管理与数字图书馆技术	Content Management and Digital Library	2	1	September
7	0701002	计算理论	Theory of Computation	2	2	March
8	0701007	算法与算法复杂性理论	Theory of Algorithms and Algorithmic Complexity	2	2	March
9	0701008	社交网络分析	Social Network Analysis	2	2	March
10	0701011	无线网络与移动计算	Wireless Network and Mobile Computing	2	2	March
11	0701004	机器学习与知识发现	Machine Learning and Knowledge Discovery	2	2	March
12	0701005	计算机图形与图像处理	Computer Graphics and Image Processing	2	2	March

English-taguht Program in Chemistry

No.	Course Code	Course Title	Course Title	Credits	Semester	Semester Time
1	1001017	配位化学	Coordination Chemistry	2	1	September
2	1001002	高等有机化学专题	Advanced Topics in Organic Chemistry	2	1	September
3	1001003	新能源技术	New Energy Technology	2	1	September
4	1001018	X射线晶体学	X-Ray Crystallography	2	1	September
5	1001006	有机波谱分析	Spectrometric Identification of Organic Compounds	2	1	September
6	1001004	纳米科学与技术	Nano-science and technology	2	2	March
7	1001007	超分子化学	Supramolecular Chemistry	2	2	March
8	1001008	高等有机合成实验	Advanced Experiment of Organic Chemistry	3	2	March

English-taught Program in Chemical Engineering and Technology

No.	Course Code	Course Title	Course Title	Credits	Semester	Semester Time
1	1001012	药物制剂与工艺	Pharmaceutical Dosage Forms and Technology	2	1	September
2	1001014	药物分子设计	Drug Design	2	1	September
3	1001016	波谱分析	Spectroscopic Analysis	2	1	September
4	1001009	高等有机化学进展	Progress in Advanced Organic Chemistry	2	2	March
5	1001010	高等流体力学	Advanced Fluid Dynamics	2	2	March
6	1001011	化学生物学	Chemical Biology	2	2	March
7	1001013	合成生物技术	Synthetic Biotechnology	2	2	March
8	1001015	杂环化学及应用	Heterocyclic Chemistry and Application	2	2	March

English-taught Program in Law

No.	Course Code	Course Title	Course Title	Credits	Semester	Semester Time
1	2301001	国际法原论	Public International Law	2	1	September
2	2301003	国际空间法专题	International Space Law	2	1	September
3	2301002	法律文献与写作	Legal Research and Writing	1	1	September
4	2301006	国际移民法	International Immigration Law	2	1	September
5	2301008	比较诉讼制度	Comparative Procedure Law	2	1	September
6	2301011	侵权责任法前沿问题	Frontier Issues of Tort Liability Law	2	1	September
7	2301004	国际经济法研究	International Economical Law	2	2	March
8	2301005	工业产权法前沿问题研究	Industrial Property Rights Frontier Issues	2	2	March
9	2301007	比较合同法	Comparative Contract Law	2	2	March
10	2301009	国际人权法专题	International Human Rights Law	2	2	March
11	2301010	国际组织法专题	Law of International Organizations	2	2	March

English-taguht Program in MBA

No.	Course Code	Course Title	Course Title	Credits	Semester	Semester Time
1	2100003	商务英语	Business English	3	1	September
2	2101019	管理经济学	Managerial Economics	2	1	September
3	3701007	商业伦理与企业社会责任	Business Ethics and Corporate Social Responsibility	2	1	September
4	2101029	跨文化管理	Intercultural Management	2	1	September
5	2101021	会计学	Accounting	2	1	September
6	2101022	人力资源管理	Human Resource Management	2	1	September
7	2101023	战略管理（专硕）	Strategic Management(For Professional Degree)	2	1	September
8	2101025	财务管理	Financial Management	2	1	September
9	2101039	组织行为学	Organizational Behavior	2	1	September
10	2101020	运作管理	Operation Management	2	1	September
11	2101024	管理统计学	Managerial Statistics	2	2	March
12	2101028	国际商务管理	International Business Management	2	2	March
13	2101030	国际商法	International Business Law	2	2	March
14	2101036	创新与变革管理	Innovation & Revolution Management	2	2	March
15	2101033	能源与环境政策研究前沿	Energy and Environment Policy	2	2	March
16	2101026	市场营销管理	Marketing Management	2	2	March
17	2101037	品牌管理（专硕）	Brand Management(For Professional Degree)	2	2	March
18	2101027	管理信息系统	Management Information System	2	2	March
19	2101032	物流与供应链管理	Logistics and Supply Chain Management	2	2	March