# 华北电力大学(留学生)英语授课

# North China Electric Power University (International Student) Taught in English

动力工程及工程热物理学科博士研究生培养方案

# **Training Program for Doctoral Students in Power Engineering and Engineering Thermophysics**

(专业代码: 0807 授予工学博士学位)

(Major Code: 0807, Degree: Doctoral Degree of Engineering)

# 一、学科简介

#### I. Brief Introduction to the Discipline

动力工程及工程热物理学科依托于 1958 建校之初的动力系,为一级学科博士授权点, 设有博士后流动站,第四轮学科评估中"动力工程及工程热物理"学科排名位列 A-, 是学校"能源电力科学与工程""双一流"学科核心组成部分。60 年来,为我国发电行业 的发展培养了大批专业人才、产出了显著的标志性成果。

The discipline of Power Engineering and Engineering Thermophysics, relying on the Department of Power at the beginning of the establishment of the school in 1958, is the first-level discipline doctoral degree program, and has a postdoctoral program. In the fourth round of discipline evaluation, the discipline of "Power Engineering and Engineering Thermophysics" is ranked as A-, and is the core component of "Energy and Electric Power Science & Engineering", the "Double First-class" discipline. Over the past 60 years, it has trained a large number of professionals for the development of China's power generation industry and produced remarkable achievements.

# 二、培养目标

#### **II. Training Objectives**

在动力工程及工程热物理学科内掌握坚实宽广的基础理论和系统深入的专门知识,了

解本学科专业的前沿动态,具有独立从事科学研究工作的能力,并要初步具有主持较 大型科研、技术开发项目,或解决和探索经济、社会发展问题的能力,在科学或专 门技术上做出创造性的成果,能够胜任本学科或相近学科的科研、教学和管理工作。

Cultivate students to master solid and broad basic theories along with in-depth and systematic knowledge of Power Engineering and Engineering Thermophysics, to understand the professional and cutting-edge trends of this discipline; to equip students with the capacity of doing independent research and having a preliminary ability of conducting the relatively large-scale scientific research and technology development projects or the ability to solve and explore economics and social development issues, to make creative achievements in science or expertise, and to be qualified to undertake the scientific research, teaching and management of this discipline or related areas.

培养对中国有良好认知,理解中国社会主流价值观,具有相应的中文语言能力,具备 一定跨文化和全球胜任力,在所在学科具有相当专业知识和学术能力的国际化人才。

Cultivate international talents who have a good understanding of China, understand the mainstream values of Chinese society, have corresponding Chinese language skills, have certain cross-cultural and global competencies, and have considerable professional knowledge and academic abilities in their disciplines.

三、研究方向

# **III. Research Direction**

"动力工程及工程热物理学科"一级学科博士点包含工程热物理、热能工程、动力机械 及工程、流体机械及工程、制冷及低温工程、化工过程机械 6 个二级学科和能源环境 工程、能源材料与装备 2 个自设二级学科。主要研究方向:

The first-level discipline of Power Engineering and Engineering Thermophysics contains six second-level disciplines including Engineering Thermophysics, Thermal Energy Engineering, Power Machinery and Engineering, Fluid Machinery and Engineering, Refrigeration and Cryogenic Engineering, Chemical Process Machinery and two self-established second-level disciplines including Energy and Environmental Engineering, Energy Material and Equipment. Main research directions:

热力学及能源高效转换与安全利用

Thermodynamics and Efficient Conversion and Safe Utilization of Energy

传热传质与多相流

Heat and Mass Transfer and Multiphase Flow

流体力学与叶轮机械

Fluid Mechanics and Impeller Machinery

动力机械及工程

Power Machinery and Engineering

燃烧及污染物控制

Combustion and Pollutant Control

化石燃料清洁利用理论与技术

Theory and Technology for Clean Utilization of Fossil Fuel

电站设备状态监测、控制与运行

Condition Monitoring, Control and Operation of Power Station Equipment

清洁能源利用理论与技术

Theory and Technology of Clean Energy Utilization

制冷与空调技术

Refrigeration and Air Conditioning Technology

工程热物理及其它学科交叉

Engineering Thermophysics and other interdisciplinary researches

四、培养方式

# **IV. Training Method**

1. 全英文授课(汉语综合课除外)。

1. Taught in English (except for Chinese Comprehension course).

 2. 留学生博士生培养实行导师负责制,必要时可设副导师,或组成指导小组。跨学 科或交叉学科培养博士生时,应从相关学科中聘请副导师协助指导。

2. The training of international doctoral students implements supervisor responsibility

system, if necessary, a secondary-supervisor or a steering group may be introduced. When it comes to interdisciplinary training of doctoral students, a secondary-supervisor from relevant disciplines is required to assist in guiding the students.

3. 留学生博士生的培养以科学研究工作为主,重点是培养独立从事科学研究工作和 进行创造性研究工作的能力;并根据研究需要继续深入学习一些课程,在拓宽基础、 加深专业、掌握学科发展前沿的基础上学会进行创造性研究工作的方法和培养严谨的 科学作风。

3. The training of international doctoral students is mainly on scientific research work, with emphasis on cultivating the ability to independently engage in scientific research work and creative research work. International doctoral students should continue to study some courses in depth according to the needs of the research; moreover, they should learn the methods of creative research work and cultivate a rigorous scientific style on the basis of broadening the foundation, deepening the specialty and grasping the forefront of discipline development.

4. 留学生博士研究生培养采取全日制培养方式。

4. The international doctoral students shall conduct their training program in full-time manner.

5. 留学生博士生的培养可在校内进行,也可在国内、国际上进行校际间的联合培养。

5. The training of international doctoral students can be carried out in the campus of the university as well as in the joint academic institutes at home or abroad.

# 五、学制与学习年限

# V. Educational System and Duration of the Program

学制 4 年,学习年限 3-8 年,硕博连读至少满足 2+3 或 1+4 (硕士阶段+博士阶段)。 因特殊情况需要延长学习年限的,应提前半年由博士生提出申请,经导师同意、学院 领导审核、报国际教育学院批准、研究生院备案。中国政府奖学金学生如要继续享受 奖学金需提前向所属国家驻华大使馆和国家留学基金管理委员会申请,获得批准后, 才能继续享受奖学金待遇,否则需自费完成学业。

The educational system is 4 years, and the duration of the program is 3-8 years. The duration of the successive postgraduate and doctoral program is at least 2+3 or 1+4 years (the

postgraduate period+ the doctoral period). The doctoral students shall apply in half a year in advance if they require an extension for the study due to some special circumstances, and the application shall be approved by their supervisors, reviewed by the leaders of the school, submitted to the International Education Institution for approval and the Graduate School for the record. The students who are supported by the Chinese government scholarship need to apply for continuing scholarship from both their home country embassy in China and China Scholarship Council. Otherwise, they will have to complete their studies at their own expense.

#### 六、课程设置与学分

#### VI. Curriculum and Credit Requirements

留学生博士生的课程设置分学位课、必修环节和任选课三大类。学位课分公共课、基础理论课、专业核心课。博士研究生在校期间,应修最低学分为 20 学分,其中学位课 14 学分,必修环节 6 学分。课程学习实行学分制,博士研究生应根据科学研究和学位论文的需要,在导师指导下选择适合的课程学习时间,在申请博士论文答辩前完成课程学分。具体要求如下:

The curriculum for international doctoral students consists of three categories: degree courses, required links and optional courses. Degree courses are divided into public courses, basic theoretical courses and specialized core courses. During the period of doctoral students in school, the minimum credit requirement is 20 credits, including 14 credits for degree courses and 6 credits for required links. The courses are implemented with credit system. Under the guidance of the supervisor, doctoral students should select the appropriate time for course study based on the needs of scientific research and degree thesis and complete the course credits before applying for a doctoral thesis defense. The specific requirements are as follows:

1. 学位课(14学分),其中:

Degree courses (14 credits), of which:

公共课: 汉语综合(1): 4 学分(64 学时)

Public courses: Chinese Comprehension (1): 4 credits (64 class hours);

汉语综合(2): 4 学分(64 学时)

Chinese Comprehension (2): 4 credits (64 class hours);

中国概况(英文): 2 学分(32 学时)

Introduction to China (English): 2 credits (32 class hours);

基础理论课: 2 学分;

Basic theoretical courses: 2 credits;

专业核心课:2学分。

Specialized core courses: 2 credits.

要求博士生在基础理论方面,应进一步掌握现代数学等高层次的宽厚的基础理论,为 研究方法的创新提供坚实的理论基础;在专业核心课程的设置中以研究型的专业基础 课程为基础,以加强博士研究生的学术理论训练为主,使学生把握本学科发展的前沿 动态,培养学生发现问题、提出问题、分析问题的批判性思维能力和创新思维能力以 及解决实际问题的能力。

Doctoral students are required to further master the high-level and broad basic theories such as Modern Mathematics, so as to provide a solid theoretical basis for the innovation of research methods. The setting of the specialized core courses is based on the researchoriented specialized basic courses, focusing on strengthening the academic theory training of doctoral students, so as to enable students to grasp the frontier trends of the development of this discipline, cultivate students' critical thinking ability and innovative thinking ability of discovering, raising and analyzing problems as well as the ability to solve practical questions.

2. 必修环节(6学分),包括:

Required links (6 credits), including:

研究生科学道德与学术规范1学分;

Scientific Ethics and Academic Norms for Postgraduates: 1 credit;

研读专业经典名著 1 学分:博士生在学习期间,须在导师的要求与指导下,研读本学 科至少1本经典名著,完成后记1学分;

Professional Classics Studying (1 credit): During the study of doctoral students, they must, under the requirements and guidance of their supervisors, study at least one classic masterpiece of this discipline, and they shall get 1 credit upon completion;

#### 文献综述与选题报告2学分;

Literature Review and Thesis Proposal: 2 credits;

前沿讲座与专题研讨 1 学分:参加前沿讲座与专题研讨是培养博士生综合能力和进入 学科前沿的重要环节。博士生在学习期间,应在导师确定的专题领域,至少参加 8 次 前沿讲座与专题研讨,完成后记 1 学分;

Cutting-edge Lectures and Seminars (1 credit): Participating in cutting-edge lectures and seminars is an important link to cultivate the comprehensive ability of doctoral students and help them to enter the forefront of the discipline. During the period of study, doctoral students should participate in at least 8 cutting-edge lectures and seminars in the special areas determined by their supervisors. They shall get 1 credit upon completion;

博士论坛1学分:要求博士生至少做学术报告2次及以上,记1学分。

Doctoral Forum (1 credit): Doctoral students are required to make at least 2 academic reports, and shall be given 1 credit;

3. 任选课与补修课程

Optional courses and supplementary courses

硕士阶段非本学科博士生应补修若干本学科硕士阶段主干课程。补修课程不计入总学分。

Doctoral student who are not in their own disciplines at the postgraduate stage should take several major courses of postgraduate stage of this discipline. Supplementary courses are not included in the total credit.

具体课程设置见附表1。

See Schedule 1 for the specific curriculum setting.

# 七、科学研究及学位论文要求

#### VII. Requirements for Scientific Research and Degree Thesis

进行科学研究与撰写学位论文,是对博士研究生进行科学研究训练、培养创新能力的 主要途径,也是衡量研究生能否获得博士学位的重要依据之一。博士生在学期间一般 要用2年的时间完成学位论文。博士学位论文是综合衡量博士生培养质量和学术水平 的重要标志,学位论文开选、论文中期检查、学位论文预答辩、论文答辩资格审查等,

#### 是博士生培养工作的重要环节,本学科的相关具体安排与要求如下:

Conducting scientific research and writing degree thesis is the main way to train doctoral students in scientific research and innovative ability, and it is also one of the important bases to measure whether a student can obtain a doctoral degree or not. Doctoral students usually take 2 years to complete their dissertations during the period of study. Doctoral dissertation is an important symbol to comprehensively measure the training quality and academic level of doctoral students. The thesis proposal, the mid-term review of dissertation, the predefense of dissertation, and the examination of qualification for defense are important links in the training of doctoral students. The specific arrangements and requirements of this discipline are as follows:

#### 1. 文献综述与开题报告

#### 1. Literature review and thesis proposal

博士生应在了解本研究领域国内外的现状、发展动态的基础上确定博士学位论文题目, 选题要体现学科领域的前沿性和先进性,撰写选题报告并由导师组织开题答辩,开题 时间一般最迟不超过博士入学后第 3 学期,开题时间距离申请答辩日期不少于 18 个 月。

Doctoral students should determine the title of doctoral dissertation on the basis of understanding the current situation and development trends in this research field at home and abroad, and the topic selection should reflect the frontier and advanced nature of the discipline field. The thesis proposal should be written by doctoral students, and the defense shall be organized by supervisors. Generally speaking, the time for thesis proposal shall not exceed the third semester after the enrollment, and the time for thesis proposal shall be no less than 18 months before the date of application for defense.

博士论文开题报告内容应包含文献综述、论文选题及其意义、主要研究内容、技术路 线、预期成果及可能的创新点等。博士生在论文开题时须针对论文选题单独提交一份 全面详细的文献综述报告(不少于1万字)。选题报告在二级学科范围内相对集中、 公开地进行,并由以博士生导师为主体 3~5 名专家组成的考核小组进行开题答辩。开 题报告会应吸收有关导师和研究生参加,跨学科的论文选题应聘请相关学科的导师参 加。若学位论文课题有重大变动,应重开题,以保证课题的前沿性和创新性。

The thesis proposal of doctoral dissertation should include literature review, topic selection

and its significance, main research content, technical route, expected results and possible innovation points, etc. At the beginning of the thesis proposal, doctoral students are required to submit a comprehensive and detailed literature review report (no less than 10,000 words) for the selected topic of the dissertation. The thesis proposal is carried out in a relatively intensive and open manner within the scope of the second-level discipline, and the defense for thesis proposal is organized by the assessment team composed of 3-5 experts and with doctoral supervisors as the main body. The thesis proposal meeting should be attended by relevant supervisors and postgraduates, and supervisors of relevant disciplines should be invited to participate in the meeting for topic selection of interdisciplinary theses. If there is a major change in the topic of the degree thesis, the thesis proposal should be carried out once again to ensure the frontier and innovation of the topic.

博士生进行论文开题报告之前,应在指导教师的指导下,在教育部认定的科技查新工作站进行论文开题查新工作,以保证博士学位论文选题的创新性。

Before carrying out the thesis proposal, doctoral students should, under the guidance of their supervisors, conduct the thesis novelty search work at the scientific and technological novelty search station recognized by the Ministry of Education, so as to ensure the innovation of doctoral dissertation topic.

# 2. 论文中期检查

#### 2. Mid-term review of the thesis

学位论文实行中期检查制度。中期考核是检查研究生学位论文进展状况、帮助学生把 握学位论文方向、提高学位论文质量的必要环节。各学科应根据学院制定的考核办法 和中期检查时间组织论文中期考核,中期检查最迟不超过博士入学后第6学期,距离 申请答辩日期不少于6个月。

A mid-term review system is adopted for degree thesis. The mid-term review is a necessary process to check the progress of master dissertation, keep students in the right direction and improve the quality of their dissertation. Each discipline shall organize the mid-term review of theses in accordance with the assessment methods formulated by the college and the time of the mid-term review, which shall not exceed the 6th semester after the enrollment of doctoral students at the latest, and shall be no less than 6 months before the date of application for defense.

# 3. 科研成果要求

#### 3. Requirements for scientific research achievements

博士生应参与省部级及以上科技项目或企业委托重大项目的研究,在申请学位论文答 辩前完成发表高水平学术论文、科研获奖、专利转化或成果鉴定等科研成果。科研获 奖、专利转化或成果鉴定可以等同于高水平学术论文,但要求科研成果中至少有一篇 本学科权威期刊论文(学术期刊目录见附表二)。科研成果的具体要求如下:

A doctoral student shall participate in the research of technological projects at provincial and ministerial level or above or of major projects entrusted by enterprises, and obtain scientific research achievements such as publishing high-level academic papers, winning awards for scientific research, completing patent conversion or achievement identification before applying for thesis defense. Scientific research award, patent transformation or achievement appraisal can be equated with high-level academic theses, but at least one thesis of authoritative journal of the discipline is required in the scientific research achievements (refer to Schedule 2 for the catalogue of academic journals). Specific requirements for scientific research achievements are as follows:

(1)博士生在申请学位论文答辩前必须以第一作者身份(其导师必须是作者之一)或 第二作者身份(其导师必须是第一作者),并以华北电力大学为第一发表单位,公开 发表反映学位论文工作成果的学术论文。要求满足以下任意一条:

(1) Before applying for degree thesis defense, the doctoral student should, as the first author (the supervisor must be one of the authors) or the second author (the supervisor must be the first author), publish the academic thesis reflecting the achievements of the degree thesis work, with North China Electric Power University as the first publishing unit. At least one of the followings is required:

①在本学科中文核心期刊(以北京大学出版的《中文核心期刊要目总览》最新版为依据)、国际期刊或国际重要会议(被 SCI 或 EI 收录,会议转期刊的除外)上发表 3 篇及以上学术论文;

(1) Publish 3 or more academic theses in Chinese core journals of the discipline (refer to the latest edition of the *Overview of Chinese Core Journals* published by Peking University), international journals or important international conferences (included by SCI or EI, except for the conferences transferred to periodicals);

②在本学科权威期刊上发表学术论文2篇及以上(开源期刊除外);

(2) Publish 2 or more academic theses in the authoritative journals of this discipline (except for open access journals);

(2) 博士生作为主要完成人之一,其学位论文工作成果获得省部级科研奖励 1 项(以 科研院认证目录为准,署名单位为华北电力大学),相当于权威期刊论文1篇。

(2) The doctoral student's achievements of the degree thesis work, for which the doctoral student is one of the main contributors, have won one scientific research award at the provincial and ministerial level (subject to the catalogue certified by the Scientific Research Institute and with North China Electric Power University as the author affiliation), which is equivalent to one authoritative journal thesis.

(3)获得与博士论文代表性成果相关的国内外发明专利授权 1 项,发明专利要求第一署名单位为华北电力大学,学生排名第一或者学生排名第二(其导师排名第一),相当于权威期刊论文1篇。

(3) Obtain a patent for invention at home and abroad related to the representative achievements of the doctoral dissertation. It required that the first author affiliation is North China Electric Power University, and the student is the first author or the second author (the supervisor is the first author) for the patent for invention. The patent for invention is equivalent to one authoritative journal thesis.

凡不符合上述要求的成果,在学位申请时一律不予考虑。硕博连读学生在硕士期间取得的科研成果,按以上规定同等对待。英文期刊有 Doi 号 Online,中文核心期刊及以上中文刊物有录用证明视同正式发表。

Any other achievements that do not meet the above requirements will not be considered in degree applications. The scientific research achievements obtained by the MD-PhD students of continuous academic program during the master stage shall be treated equally in accordance with the above provisions. If there is a proof of inclusion for English journals with Doi number Online, Chinese core journals or the above Chinese journals, the student is deemed to have officially published its thesis in these journals.

# 4. 学位论文预答辩

#### 4. Pre-defense of dissertation

博士生完成博士学位论文后,在论文送审之前,要完成学位论文的预答辩,以便对学 位论文进行进一步修改和完善。预答辩的目的在于进一步修改、完善博士学位论文。 博士生在完成博士学位论文初稿,经导师审核认为符合要求的,要进行博士学位论文 的预答辩。学位论文预答辩通过者,方可申请正式答辩。

After completing the doctoral dissertation, doctoral students should complete the predefense of the degree thesis before the thesis is submitted for review, so as to further revise and improve the thesis. The purpose of pre-defense is to further revise and improve the doctoral dissertation. If the doctoral student completes the first draft of the doctoral dissertation and the first draft is deemed to meet the requirements after review of the supervisor, the doctoral student will make a pre-defense for its doctoral dissertation. Only the students who pass the pre-defense can apply for the formal defense of thesis.

#### 5. 博士研究生申请论文送审的资格审查

#### 5. Qualification review of the submitted dissertation applied by doctoral students

博士论文资格审查由指导教师或博士生指导小组负责进行。博士研究生申请论文送审 的基本条件:

The doctoral dissertation qualification review is carried out by the supervisor or the steering group. Basic application conditions of doctoral students' dissertation submission are as below:

- (1) 修完所规定的学分要求;
- (1) To meet the credit requirements;
- (2) 完成论文开题查新报告与论文开题;
- (2) To complete the thesis novelty search report and the thesis proposal;
- (3) 完成论文中期检查;
- (3) To complete the mid-term review of the dissertation;
- (4) 满足学术论文发表与科研成果要求;

(4) To meet the requirements of academic thesis publication and scientific research achievements;

- (5) 通过学位论文的预答辩;
- (5) To pass the pre-defense of the dissertation;
- (6) 完成毕业论文的撰写并通过学位论文撰写规范审查。

(6) To complete the writing of graduation thesis and pass the standard examination of degree thesis writing.

# 6. 博士学位论文的评审与答辩

# 6. Review and defense of doctoral dissertation

博士生在通过论文送审的资格审查后即可进行学位论文的送审与答辩,具体要求按照 《华北电力大学研究生学位论文评审和答辩的有关规定》、《华北电力大学学位授予 工作实施细则》等相关规定执行。毕业生的答辩时间一般安排在 6 月,延期毕业的研 究生答辩时间可安排在 6 月或 12 月。

Doctoral students can submit their degree theses for examination and make the theses defense after passing the qualification examination for their degree theses, which are required to be specifically carried out in accordance with the relevant provisions of the *Relevant Provisions on the Review and Defense of Master Dissertation of North China Electric Power University* and the *Detailed Rules for Degree Awarding of North China Electric Power University*. The defense time for graduates is generally arranged in June, and the defense time for graduate for postponed graduation can be arranged in June or December.

# 八、提前毕业条件

# **VIII.** Conditions for Early Graduation

特别优秀并提前完成本培养方案规定内容的博士生最多可提前1年毕业。

Doctoral students who are particularly excellent and complete the contents specified in the training program ahead of time can graduate at most one year in advance.

课程性质 Category	课程属性 Attribute	课程名称 Course name	学时 Class hour	学分 Credit	考核万式	开课学期 Semester of the course	<b>4</b> • • • •
学位课 Degree courses (≥14 学 分) (≥14 credits)	公共课 Public courses 10 学分 10 credits	汉语综合(1) Chinese Comprehension (1)	64	4.0	考试 Exam	1	
		中国概况(英文) Introduction to China (English)	32	2.0	考试 Exam	1	
		汉语综合(2) Chinese Comprehension (2)	64	4.0	考试 Exam	2	
	基础理论课 Basic theoretical courses ≥2 学分	现代数学基础与方法 Fundamentals and Methods of Modern Mathematics	32	2.0	考试 Exam	1	

# 附表一:课程设置表(英语授课)

# Schedule 1: Curriculum (Taught in English)

	$\geq$ 2 credits						
	专业核心课 Specialized core courses ≥2 学分 ≥ 2 credits	热科学专题 Special Subject on Thermal Science	32	2.0	考试 Exam	2	
		粘性流体动力学 Viscous Fluid Dynamics	32	2.0	考试 Exam	2	
		机械工程前沿技术 Mechanical Engineering Cutting-edge Technology	32	2.0	考试 Exam	2	
		可选中文专业核心课 Specialized Core Courses in Chinese Can Be Chosen	32	2.0	考试 Exam	2	
	无	研读专业经典名著 Professional Classics Studying		1.0	考査 Review of performance		
必修环节 Required		研究生科学道德与学术规范 Scientific Ethics and Academic Norms for Postgraduates		1.0	考查 Review of performance		
links (≥6学 分) (≥6 credits)		文献综述与选题报告 Literature Review and Thesis Proposal		2.0	考查 Review of performance		
		前沿讲座与专题研讨 Cutting-edge Lectures and Seminars	8次 8 times	1.0	考査 Review of performance		
		博士论坛 Doctoral Forum	2次 2 times	1.0	考査 Review of performance		
任选课 Optional courses	无 None	补修课程 Supplementary courses					附注一 Note 1

附注一: 对非本学科入学的博士生, 应补学由导师指定的本学科主干硕士课程

Note 1: For the doctoral student who was not in this discipline when enrolled, he/she should make up for the main courses of this discipline in master stage designated by the supervisor.

# 附表二:动力工程及工程热物理一级学科学术期刊目录

序号 S/N	刊物名称 Journal Name	期刊主管/主办单位 Departments in charge of journals/organizers
1	被 SCI 检索的期刊 Journals indexed by SCI	
2	中国科学 Science China	中国科学院 Chinese Academy of Sciences
3	科学通报 Chinese Science Bulletin	中国科学院 Chinese Academy of Sciences
4	数学学报 Acta Mathematica Sinica	中国数学学会 Chinese Mathematical Society
5	物理学报 Acta Physica Sinica	中国物理学会 China Physical Society
6	光学学报 Acta Optica Sinica	中国光学学会 Chinese Optical Society
7	声学学报 Acta Acustica	中国声学学会 Acoustical Society of China
8	化学学报 Acta Chimica Sinica	中国化学会 Chinese Chemical Society
9	化工学报 CIESC Journal	中国化工学会 Chemical Industry and Engineering Society of China
10	工程热物理学报 Journal of Engineering Thermophysics	中国工程热物理学会 Chinese Society of Engineering Thermophysics
11	动力工程学报 Chinese Journal of Power Engineering	中国动力工程学会 China Society of Power Engineering
12	中国电机工程学报 Proceedings of the Chinese Society for Electrical Engineering	中国电机工程学会 Chinese Society for Electrical Engineering
13	制冷学报 Journal of Refrigeration	中国制冷学会 Chinese Association of Refrigeration
14	空气动力学报 Acta Aerodynamica Sinica	中国空气动力学会 Chinese Areodynamics Research Society
15	太阳能学报 Acta Energiae Solaris Sinica	中国太阳能学会 China Solar Energy Society
16	机械工程学报 Journal of Mechanical Engineering	中国机械工程学会 Chinese Mechanical Engineering Society
17	振动工程学报 Journal of Vibration Engineering	中国振动工程学会 Chinese Society for Vibration Engineering
18	力学学报 Chinese Journal of Theoretical and Applied Mechanics	中国力学学会 Chinese Society of Theoretical and Applied Mechanics

# Schedule 2: Catalogue of Academic Journals of First-level Discipline of Power Engineering and Engineering Thermophysics

19	内燃机学报 Transactions of Csice	中国内燃机学会 Chinese Society for Internal Combustion Engines
20	土木工程学报 China Civil Engineering Journal	中国土木工程学会 China Civil Engineering Society
21	金属学报 Acta Metallurgica Sinica	中国金属学会 Chinese Society for Metals
22	电子学报 Acta Electronica Sinica	中国电子学会 Chinese Institute of Electronics
23	自动化学报 Acta Automatica Sinica	中国自动化学会 Chinese Association of Automation
24	计算机学报 Chinese Journal of Computers	中国计算机学会 China Computer Federation
25	仪器仪表学报 Chinese Journal of Scientific Instrument	中国仪器仪表学会 China Instrument and Control Society
26	水利学报 Journal of Hydraulic Engineering	中国水利学会 Chinese Hydraulic Engineering Society
27	水力发电学报 Journal of Hydroelectric Engineering	中国水力发电工程学会 China Society for Hydropower Engineering
28	核科学与工程 Chinese Journal of Nuclear Science and Engineering	中国核学会 Chinese Nuclear Society
29	环境科学学报 Acta Scientiae Circumstantiae	中国环境科学学会 Chinese Society for Environmental Sciences
30	煤炭学报 Journal of China Coal Society	中国煤炭学会 China Coal Society
31	中国工程机械学报 Chinese Journal of Construction Machinery	中国工程机械学会 China Construction Machinery Society
32	图学学报 Journal of Graphics	中国图学学会 China Graphics Society
33	人工晶体学报 Journal of Synthetic Crystals	中国晶体学会 Chinese Crystallographic Society
34	Corrosion and Protection	中国腐蚀与防护学会 Chinese Society for Corrosion and Protection
35	硅酸盐学报 Journal of the Chinese Ceramic Society	中国硅酸盐学会 Chinese Ceramic Society
36	中国有色金属学报 Chinese Journal of Nonferrous Metals	中国有色金属学会 Nonferrous Metals Society of China
37	系统仿真学报 Journal of System Simulation	中国系统仿真学会 Chinese Association for System Simulation