

## 课程详述

### COURSE SPECIFICATION

以下课程信息可能根据实际授课需要或在课程检讨之后产生变动。如对课程有任何疑问，请联系授课教师。

The course information as follows may be subject to change, either during the session because of unforeseen circumstances, or following review of the course at the end of the session. Queries about the course should be directed to the course instructor.

1.	<b>课程名称 Course Title</b>	创新设计实践 II / Innovation Design Practice II
2.	<b>授课院系 Originating Department</b>	系统设计与智能制造学院
3.	<b>课程编号 Course Code</b>	SDM404
4.	<b>课程学分 Credit Value</b>	2
5.	<b>课程类别 Course Type</b>	专业必修课 Major Required Courses
6.	<b>授课学期 Semester</b>	夏季学期 Summer Semester
7.	<b>授课语言 Teaching Language</b>	中英双语 English & Chinese
8.	<b>授课教师、所属学系、联系方式 (如属团队授课, 请列明其他授课教师) Instructor(s), Affiliation &amp; Contact (For team teaching, please list all instructors)</b>	周利民, 讲席教授 zhoulm@sustech.edu.cn 洪小平, 助理教授 hongxp@sustech.edu.cn 系统设计与智能制造学院 教授团队(SDIM)  Limin Zhou, Chair Professor Email: zhoulm@sustech.edu.cn Xiaoping Hong, Assistant Professor Email: hongxp@sustech.edu.cn School of System Design and Intelligent Manufacturing (SDIM)
9.	<b>实验员/助教、所属学系、联系方式 Tutor/TA(s), Contact</b>	待公布 To be announced
10.	<b>选课人数限额(可不填) Maximum Enrolment (Optional)</b>	

11. 授课方式 Delivery Method	讲授 Lectures	习题/辅导/讨论 Tutorials	实验/实习 Lab/Practical	其它(请具体注明) Other (Please specify)	总学时 Total
学时数 Credit Hours	0	0	64	0	64
12. 先修课程、其它学习要求 Pre-requisites or Other Academic Requirements	无 NIL				
13. 后续课程、其它学习规划 Courses for which this course is a pre-requisite	无 NIL				
14. 其它要求修读本课程的学系 Cross-listing Dept.	无 NIL				

### 教学大纲及教学日历 SYLLABUS

#### 15. 教学目标 Course Objectives

本课程的目的目的是培养学生独立地运用所学的基础理论、专业知识、设计思维和基本技能，分析与解决工程实际问题的能力；学生将通过熟悉工业界实践需求和解决流程而为毕业设计做好准备；通过实习，学生将会锻炼对所学专业知识的运用能力，加强对专业知识的进一步理解，使学生进一步了解专业发展的现状和发展方向，为今后的工作打下坚实的基础。

The purpose of this course is to cultivate students' ability to apply the basic theory, professional knowledge, design thinking, and basic skills to analyze and solve practical engineering problems independently. Students will be better prepared for the capstone project by learning the industry's actual needs and problem-solving process. Through this internship, students will practice their ability to apply theories and principles for solving problems, further understand the current situation and development direction of the major, and lay a solid foundation for their future careers.

#### 16. 预达学习成果 Learning Outcomes

通过本课程后，学生将能够

- 通过明晰相关的工程理论和原理，并将其应用于相关实践练习，通过设计以解决现实世界的挑战；
- 在熟知各种工程标准、法规和实践的基础上，承担设计方案的设计、测试和调试工作；
- 运用知识和技能的高效解决问题，并测试和实践各种设计方案。

After passing this course, students will be able to

- identify relevant engineering theories and principles and to apply them in hands-on training exercises to solve real-world challenges through design;
- undertake the design, testing and commissioning of design solutions on the basis of recognize the engineering standards, regulations and practices;
- apply the knowledge and skills for effective trouble shooting, able to test and implement design solutions.

#### 17. 课程内容及教学日历（如授课语言以英文为主，则课程内容介绍可以用英文；如团队教学或模块教学，教学日历须注明主讲人）

**Course Contents (in Parts/Chapters/Sections/Weeks. Please notify name of instructor for course section(s), if this is a team teaching or module course.)**

此课程学生在工业界或科研实验室等实践环境中学习。学习过程中，根据课程目标和实习需要，个性化定制学习计划，承担与专业相关的实践任务。实际在公司的时间或与公司交流合作的实践时间不少于 3 周，合计不少于 64 学时。

Students will complete this course within practical settings such as industry or research laboratories. During the learning process, according to the course objectives and internship needs, students will personalize their study plan and undertake a practical task related to the major. The actual time with the company is not less than 2 weeks, and course hours are not less than 64 hours.

18. 教材及其它参考资料 Textbook and Supplementary Readings

无。  
None.

课程评估 ASSESSMENT

19. 评估形式 Type of Assessment	评估时间 Time	占考试总成绩百分比 % of final score	违纪处罚 Penalty	备注 Notes
出勤 Attendance		20	NIL	
课堂表现 Class Performance		10	NIL	
小测验 Quiz				
课程项目 Projects		30	NIL	项目期中审核: 10% 考核监督人期末考核成绩: 20% Mid-term project evaluation: 10% Project evaluation by project modulator at final-term: 20%
平时作业 Assignments				
期中考试 Mid-Term Test				
期末考试 Final Exam				
期末报告 Final Presentation		40	NIL	口头和纸质报告 Project oral presentation and written report
其它(可根据需要 改写以上评估方式) Others (The above may be modified as necessary)				

20. 记分方式 GRADING SYSTEM

- A. 十三级等级制 Letter Grading  
 B. 二级记分制 (通过/不通过) Pass/Fail Grading

课程审批 REVIEW AND APPROVAL

21. 本课程设置已经过以下责任人/委员会审议通过  
This Course has been approved by the following person or committee of authority



南方科技大学  
SOUTHERN UNIVERSITY OF SCIENCE AND TECHNOLOGY

