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SCUT Newsletter 华工新闻快讯

1. SCUT wins 3 first prizes in the 2nd Guangdong-Hong Kong-Macao Undergraduate Engineering Training Integration Ability Competition

第二届粤港澳大学生工程训练综合能力竞赛举行　华南理工获一等奖3项

On April 18 and 25, the 2nd Guangdong-Hong Kong-Macao Undergraduate Engineering Training Integration Ability Competition and the trails of the 7th National Undergraduate Engineering Training Integration Ability Competition were held at SCUT. This session of competition adopted an offline/online approach, attracting a total of 856 participants in 214 teams from 22 colleges and

universities in the Guangdong-Hong Kong-Macao Greater Bay Area. Students from SCUT won 3 first prizes, 2 second prizes, and 5 third prizes in the competition.

4月18日、25日，第二届粤港澳大学生工程训练综合能力竞赛暨第七届全国大学生工程训练综合能力竞赛选拔赛在华南理工大学举办。本届大赛采用线下＋线上的方式，共吸引了来自粤港澳大湾区的22所院校的214支参赛队伍、856名学生参加。华南理工大学学子在竞赛中获得一等奖3项，二等奖2项，三等奖5项。

The competition has 13 events in 4 tracks, namely the Engineering Basics Track, "Smart+" Track, Virtual Simulation Track, and Engineering Maker Track (this track will not be included in provincial-level competition). The Engineering Basics Track includes 3 events, i.e. potential-energy-driven vehicles, thermal-energy-driven vehicles and engineering culture; the "Smart+" Track has 4 events, i.e. smart logistics and handling (including 2 projects, smart robots and bridge structure design), smart inspection of underwater pipeline, smart classification of domestic wastes and smart delivery drones; the Virtual Simulation Track includes 4 events, i.e. aircraft design simulation, intelligent networking automobile design, and engineering scene digitalization and enterprise operation simulation; and the Engineering Maker Track includes 2 events, i.e. core technology challenges and exploration into future technologies.

本届大赛初步设置工程基础赛道、"智能+"赛道、虚拟仿真赛道、工程创客赛道（该赛道不举行省赛）共4个赛道13个赛项。其中工程基础赛道包括势能驱动车、热能驱动车和工程文化等3个赛项，"智能+"赛道包括智能物流搬运（含智能机器人及桥梁结构设计两个项目）、水下管道智能巡检、生活垃圾智能分类和智能配送无人机等4个赛项，虚拟仿真赛道包括飞行器设计仿真、智能网联汽车设计、工程场景数字化和企业运营仿真等4个赛项，工程创客赛道包括关键核心技术挑战和未来技术探索等2个赛项。

Engineering training forms an important practical aspect of teaching to achieve the goals of undergraduate education. Engineering training integration ability competitions are critical for strengthening practical teaching, enhancing the students' practical ability, improving their overall quality, raising their awareness and fostering their ability to innovate. The first session of competition was held at SCUT in October 2019.

工程训练是实现本科教育目标重要实践教学环节。工程训练综合能力竞赛是强化实践教学，增强实践能力，提高综合素质，培养创新精神和创新能力的重要方式。首届大赛于2019年10月在华南理工大学举行。

2. Guangdong-Hong Kong-Macao University Engineering Alliance established to better serve the GBA development

更好服务大湾区建设　粤港澳高校工科联盟成立

On May 10, the inauguration ceremony of the Guangdong-Hong Kong-Macao University Engineering Alliance and the New Engineering Disciplines (NEDs) Construction and Development Seminar were held in Shenzhen. Participants included more than 110 representatives from 27 universities in Guangdong, Hong Kong and Macao. SCUT Vice President Li Weiqing attended the ceremony and delivered a speech on behalf of the founding universities.

5月10日，粤港澳高校工科联盟成立仪式暨新工科建设与发展研讨会在深圳举行，来自粤港澳三地共计27所高校的110余名代表参加活动。华南理工大学副校长李卫青出席仪式并作为创盟高校代表致辞。

The establishment of the Alliance was jointly proposed by five universities including Harbin Institute of Technology (Shenzhen) , South China University of Technology, Sun Yat-sen University, Hong Kong University of science and technology and University of Macao. The Alliance aims to better serve the construction of the Greater Bay Area, promote the development of engineering education in the regions, and enhance the exchanges, cooperation and resource sharing in the engineering field among these three regions. It will also strive to jointly promote the diversified cooperation in higher education at multiple levels among universities in Guangdong, Hong Kong and Macao, and constantly explore new models and new paradigms for exchanges and cooperation, so as to build a community for universities in the three regions and make Greater Bay Area a world-leading higher education system and international education demonstration zone.

粤港澳高校工科联盟是由哈尔滨工业大学（深圳）、华南理工大学、中山大学、香港科技大学和澳门大学共同发起成立，旨在更好地服务粤港澳大湾区建设，推动区域工程教育发展，深化三地在工科领域的交流协作与资源共享。联盟将共同推进粤港澳高校开展多样化多层次的高等教育合作，不断探索实践三地交流合作的新模式、新范式，构建更为紧密的粤港澳高校共同体，共同致力于将大湾区建成世界领先水平的高等教育体系和国际教育示范区。

3. SCUT stands out again in China Patent Award selection with 1 Gold, 1 Silver and 4 Excellence Awards

1金1银4项优秀　华南理工大学中国专利奖评选再创佳绩

On May 14, six patents from SCUT were selected as candidates for the 22nd China Patent Award by China National Intellectual Property Administration. Among them, the project of "improved A^2/O device and process for the denitrification and dephosphorization treatment of urban sewage" was selected as a Gold Award candidate, and the "method for improving hemocompatibility of material surface by using controllable grafting technology" as a Silver Award candidate. In addition, there were also 4 projects selected as candidates of the Excellence Award. SCUT won 5 awards as the first patentee, ranking first together with Tsinghua University among other universities in China. Since 2009, SCUT has won 38 awards (including 2 Gold Awards and 3 Silver Awards) as the first patentee, ranking first among universities in the country in terms of the total number of awards.

5月14日，华南理工大学共6项专利入选国家知识产权局第二十二届中国专利奖预获奖项目，其中"一种城市污水改良A^2/O强化脱氮除磷处理装置及工艺"获中国专利预获奖金奖，"一种利用可控接枝技术提高材料表面血液相容性的方法"预获奖银奖，以及4项优秀奖预获奖；以第一专利权人预获奖总数5项，与清华大学并列全国高校首位。自2009年以来，华南理工大学以第一专利权人获奖总数达到38项（含2金3银），获奖总数排名全国高校首位。

Winning the China Patent Award, the highest award for intellectual property rights in China, demonstrates not only the capacity for innovation but also the strength of winner's intellectual property rights.

中国专利奖作为知识产权最高奖项，既是对科技创新能力的认可，也是对知识产权实力的肯定。

Appendix: 1. SCUT Projects Candidates of Award-winning Projects of SCUT in the 22nd China Patent Award

附：1.华南理工大学第二十二届中国专利奖预获奖项目清单

Category **预获奖类别**	**Patent Name** **专利名称**	**Patentee** **专利权人**
Gold Award 金奖	Improved A^2/O device and process for the denitrification and dephosphorization treatment of urban sewage 一种城市污水改良A2/O强化脱氮除磷处理装置及工艺	SCUT, Guizhou Academy of Sciences 华南理工大学，贵州科学院
Silver Award 银奖	Method for Improving Blood Compatibility of Material Surface by Using Controllable Grafting Technique 一种利用可控接枝技术提高材料表面血液相容性的方法	SCUT 华南理工大学
Excellence Award 优秀奖	Wet flue gas desulfurization device using tangential spiral jet 一种切圆式螺旋喷射烟气湿法脱硫装置	SCUT, Guangdong Essen Environmental Technology Co., Ltd. 华南理工大学,广东埃森环保科技有限公司
Excellence Award 优秀奖	An advanced PS oxidation reactor with two-way internal circulation for sewage treatment 一种双向流内循环式PS高级氧化反应器及污水处理方法	SCUT 华南理工大学
Excellence Award 优秀奖	Dual time reversal damage imaging method based on ultrasonic guided waves 基于超声导波的双向时间反演损伤成像方法	SCUT, Guangdong Shantou Ultrasonic Electronics Co., Ltd. 华南理工大学,广东汕头超声

		电子股份有限公司
Excellence Award 优秀奖	A low-density high-entropy alloy and its preparation method 一种低密度高熵合金材料及其制备方法	Guangdong Xingfa Aluminum Co., Ltd., SCUT 广东兴发铝业有限公司,华南理工大学

4. SCUT China stands out again with 28 achievements winning the 2020 Guangdong Science and Technology Award

再创佳绩！学校28项成果荣获2020年度广东省科学技术奖

On May 20, the Guangdong Science and Technology Innovation Conference was held in Guangzhou. At the conference, prizes of the 2020 Guangdong Science and Technology Award prizes were granted. SCUT won a total of 28 awards, including 9 first prizes and 19 second prizes. This ranked SCUT first in Guangdong Province in terms of both the total number of awards and first prizes.

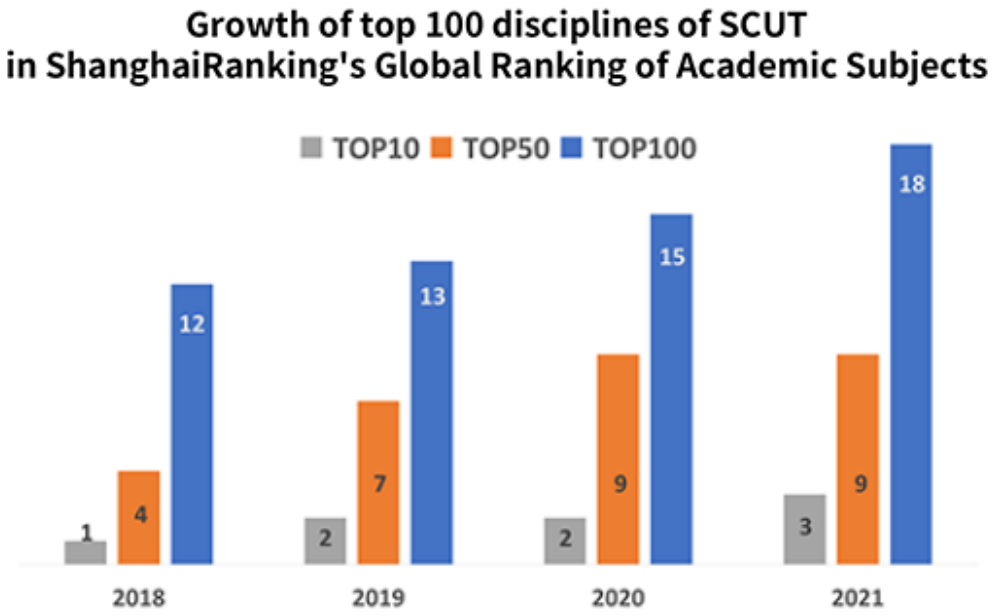
5月20日，广东省科技创新大会在广州召开。大会颁发了2020年度广东省科学技术奖，华南理工大学共有28项成果获奖，其中一等奖9项，二等奖19项，获奖总数及获一等奖数量均居广东省首位。

List of SCUT Projects Winning First Prize in the 2020 Guangdong Science and Technology Award

华南理工大学2020年广东省科学技术一等奖项目清单

No. 序号	Project Name 项目名称	Prize 奖种
1	Phase diagram of glass structure and high-gain glass fiber 玻璃相图结构模型及高增益玻璃光纤	Natural Science Award 1st Prize 自然科学奖一等
2	Advanced manufacture of high-strength mulch film for full-recycling and yield-increasing 高强度全回收增产地膜先进制造与循环利用	Technical Invention Award 1st Prize 技术发明奖一等
3	Regulation of lignin microstructure and its application in micro/nano field 木质素的微结构调控及在微/纳米领域的应用	Technical Invention Award 1st Prize 技术发明奖一等
4	Key technologies and applications of multi-system multi-band integrated antennas	Technical Invention Award 1st Prize 技术发明奖一等

	多系统多频段一体化天线关键技术及应用	
5	Strategy, key technology and application of treatment of industrial volatile organic compounds pollution with high air flow and low concentration 大风量低浓度工业挥发性有机物污染治理策略与关键技术及应用	Science and Technology Progress Award 1st Prize 科技进步奖一等
6	Key technology and integrated application of high-density and high-reliability LED display devices 高密度高可靠LED显示器件关键技术与集成应用	Science and Technology Progress Award 1st Prize 科技进步奖一等
7	The innovation and application of key technologies in tumor radiomics 肿瘤影像组学创新技术与应用	Science and Technology Progress Award 1st Prize 科技进步奖一等
8	R&D and industrialization of key technologies for large-size ceramic thin plates 大尺寸陶瓷薄板关键技术研发与产业化	Science and Technology Progress Award 1st Prize 科技进步奖一等
9	Development and application of new technologies and new products for prevention and control of important swine bacterial diseases 猪重要细菌病防控新产品创制与应用	Science and Technology Progress Award 1st Prize 科技进步奖一等



5. SCUT celebrates another milestone with 18 subjects ranking among the world's top 100

再攀新高　华南理工18个学科进入世界前100强

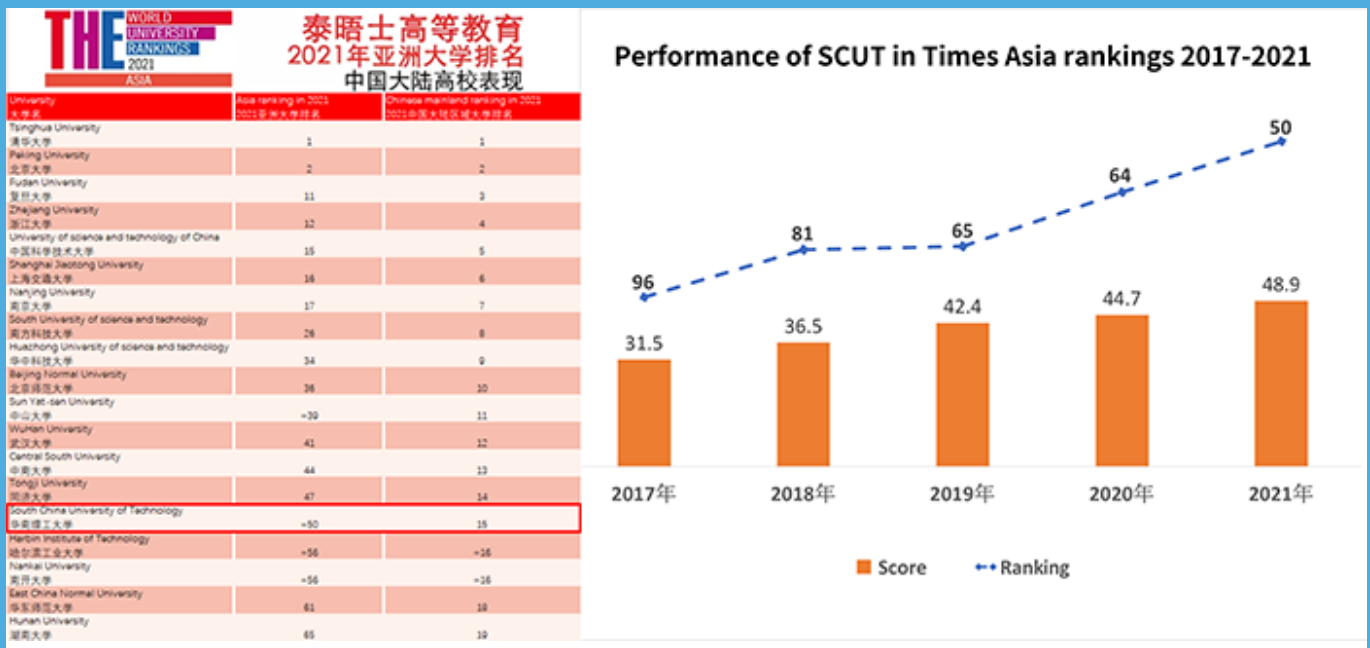
26 subjects of SCUT made the list of the 2021 Global Ranking of Academic Subjects released on May 26 by ShanghaiRanking. These included 3 subjects ranked among the top 10 in the Global Ranking, contributing SCUT 6th in the Best Chinese Universities Ranking; 9 subjects among the top 50 in Global Ranking, with SCUT 15th in the Best Chinese Universities Ranking; 18 subjects among the top 100 in Global Ranking, being SCUT 11th in the Best Chinese Universities Ranking.

5月26日，上海软科发布2021"软科世界一流学科排名"，华南理工大学26个学科上榜。其中，3个学科跻身全球前10，并列内地高校第6位；9个学科全球排名前50，并列内地高校第15位；18个学科进入全球前100，并列内地高校第11位。

SCUT has been making steady progress in ShanghaiRanking's Global Ranking of Academic Subjects.

Compared with 2020, SCUT has one more subject ranking among the top 10, namely chemical engineering (8th); three more among the top 100, namely biomedical engineering (51st-75th), civil engineering (76th-100th), environmental science and engineering (76th-100th); two more subjects made the list, namely pharmacy (401st-500th) and earth sciences (401st-500th). 17 subjects including mathematics, management, and biomedical engineering have made significant progress.

华南理工大学在"软科世界一流学科排名"中的表现稳步提升。与2020年相比，学校排名全球前10的学科增加1个，为化学工程（第8名）；排名前100的学科增加3个，分别为生物医学工程（51-75名）、土木工程（76-100名）、环境科学与工程（76-100名）；上榜学科总数增加2个，分别是药学（401-500名）、地球科学（401-500名）。数学、管理学、生物医学工程等17个学科进步明显。



6. SCUT ranks top 50 in the Times Higher Education Asia University Rankings 2021 for the first time

2021泰晤士亚洲大学排行榜发布　华南理工大学首入亚洲50强

On June 2, the Times Higher Education Asia University Rankings 2021 were released. A total of 551 Asian universities from 30 countries/regions were shortlisted. SCUT ranked among the top 50 Asian universities for the first time and 15th among universities in the Chinese mainland, up by 14 places from last year's ranking.

6月2日，泰晤士高等教育（Times Higher Education）亚洲大学排名发布，共有来自30个国家的551所亚洲高校入围，华南理工大学首次跻身亚洲高校50强，位列中国内地高校第15位，相较去年提升14位。

In recent years, as SCUT has been picking up the pace with the development of the "Double First-Class" university and the international campus in Guangzhou, it has also been gaining academic strength and international presence. With the comprehensive score increased from 31.5 in 2017 to 48.9 in 2021, its rank in the Times Higher Education Asia University Rankings rose from 96th to 50th. SCUT has been making progress in various performance indicators. In 2021, it scored 87.8 points and 69 points in the indicators of "industry income" and "citations", ranking 45th and 57th in Asia respectively.

近年来，华南理工大学随着“双一流”建设和广州国际校区建设加快推进，办学实力和国际影响力不断增强，在泰晤士高等教育亚洲大学排名上不断提升，综合得分由2017年31.5分提升至2021年48.9分、排名由96名提升至50名。各项指标表现不断攀升，2021年在“产业收入”、“引用”等单项指标获得87.8分和69分，分别位居亚洲第45位和第 57位。

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