【附件 5-2】與標竿學校 TAMU 合作情形

1. 選薦學生至標竿學校學習、進修

選薦學生實習進修：受疫情所限，選送 2 位優秀博士生赴 TAMU 短期研修。

No.	系所	選送人員	指導教授	期程	標竿學校對口單位
1.	微衛所/博一	陳〇嘉	趙黛瑜	6 個月	**TAMU** 獸醫與生物醫學院/獸醫整合生命科學系/ James Cai
2.	材料系/博七	王〇強	施漢章 薛富盛	6 個月	**TAMU** 工學院/電機系/ Pao-Tai Lin

2. Norman Borlaug 特別講座

首創 Norman Borlaug(諾貝爾和平獎得主)紀念講座，回應國際農生重要議題：邀請 TAMU 7 位學者以視訊方式分享國際間解決農業與糧食的實際行動。

No.	講者	職稱	科系/單位	講座名稱	講座日期
1.	Meng Meng Gu	Associate Professor,	Dept. Horticultural Sciences,	Texas A&M University System & Using biochar to replace peat moss in container substrate	110/10/19
				A holistic approach to manage crape myrtle bark scale	110/10/20
2.	Genhua Niu	Professor	Dept. Horticultural Sciences,	Role of Plant Factory for Producing High Value Crops	110/11/4
3.	Christine Tisone	Clinical Assistant Professor	Dept. Health & Kinesiology	COVID-19 and Global Hunger	110/11/9
4.	Larry Suva	Professor	Dept. Veterinary Physiology and Pharmacology	Disease Models and Bone Regeneration	110/11/9
5.	Jack Elliot	Professor	Dept. Agricultural Leadership, Education and Communications	Capacity Building and Agricultural Education Programs in Africa	110/11/11
6.	Nithya Rajan	Associate Professor	Dept. Soil and Crop Sciences	Below and Above-Ground Phenotyping of Crops Using MRI and UAV-Based Methods	110/11/26
7.	Keerti Rathore	Professor	Dept. Soil and Crop Sciences	RNA-Interference: Mechanism and its Application in Tissue-specific Elimination of a Toxin from the Cottonseed	110/12/3

2021 Norman Borlaug Lecture Series

TEXAS A&M UNIVERSITY

Professor
Dept. Horticultural Sciences

Dr. Meng Meng Gu

10/19, 10/20
16:00 - 17:00

Topic:
1. Texas A&M University System & Using Biochar to Replace Peat Moss in Container Substrate
2. A Holistic Approach to Manage Crape Myrtle Bark Scale

Professor
Dept. Horticultural Sciences

Dr. Genhua Niu

11/04
9:00 - 12:00

Topic:
Role of Plant Factory for Producing High Value Crops

Clinical Assistant Professor
Dept. Health and Kinesiology

Dr. Christine Tisone

11/09
9:00 - 11:00

Topic:
COVID-19 and Global Hunger

Professor
Dept. Veterinary Physiology and Pharmacology

Dr. Larry J. Suva

11/09
10:00 - 12:00

Topic:
Disease Models and Bone Regeneration

Professor
Dept. Agricultural Leadership, Education and Communications

Dr. Jack Elliot

11/11
8:30 - 10:30

Topic:
Capacity Building and Agricultural Education Programs in Africa

Associate Professor
Dept. Soil and Crop Sciences

Dr. Nithya Rajan

11/26
10:00 - 11:00

Topic:
Below and Above-Ground Phenotyping of Crops Using MRI and UAV-Based Methods

Professor
Dept. Soil and Crop Sciences

Dr. Keerti Rathore

12/03
10:00 - 12:00

Topic:
RNA-interference: Mechanism and its Application in Tissue-specific Elimination of a Toxin from the Cottonseed

You are welcome to join us!!!

For more information contact IAC
Email: iac@dragon.nchhu.edu.tw
Phone:
(04)2284-0848 #224 Ms. Lee
(04)2284-0333 #17 Ms. Chen

國立中興大學 國際農業中心 International Agriculture Center

農業暨自然資源學院 College of Agriculture and Natural Resources

DOIT Discover Opportunity Independence Training

本活動可認證 通識自主學習點數

3. 標竿學校傑出學者訪校與授課

本年度除 Norman Borlaug 特別講座邀請的 7 位講者外，另邀請 9 位標竿學校傑出學者開設視訊英語課程 3 門，線上演講座談 5 場，並就相關教師商談合作事宜，受邀學者及活動如下表所示：

No.	TAMU 學者/單位	績效指標		活動日期與主題(依時間先後排序)
		課程(門)	演講(場)	
1.	**Keerti Rathore** Institute for Plant Genomics Dept. of Soil and Crop Sciences		1	110/7/8 A University-created Example of Genetic Engineering of an Important Crop: from Conception to Deregulation
2.	**Courtney Daigle** Dept. of Animal Science		1	110/10/25 Personality, temperament and animal Welfare
3.	**Juan A. Landivar** Corpus Christi Research Center		1	110/10/26 AI in Agriculture: Opportunities and Challenges of Unmanned Aircraft Systems in Research and Precision Management
4.	**Jan Suchodolski** Gastrointestinal Laboratory		1	110/10/28 The importance of the intestinal microbiome in health and disease
5.	**Jack Elliot** Norman Borlaug Institute for International Agriculture Dept. of Agricultural Leadership, Education and Communications	1		110/11/4、11/6、11/.13、11/18 Leadership Development Panel: Post-Crisis Monitoring and Management
6.	**Jyhwen Wang** Dept. Engineering Technology & Industrial Distribution	1		110/11/16 ABET/IEET
				110/11/17 Energy Dissipation Mechanism of Lattice Bimaterial Structure under Low-Velocity Impact
				110/11/18 Springback measurement and prediction in tube bending towards industry 4.0

7.	**James Cai** Dept. Veterinary Medicine & Biomedical Sciences		1	110/11/10 Application of Modern Data Science Methods to Single-cell Data for Problem Solving in Genetics
8.	**Xiuren Zhang** Dept. of Biochemistry & Biophysics	1		MicroRNA Biogenesis and Function/ Future Directions of MicroRNA Study
9.	**Jun Wang** Dept. of Neuroscience & Experimental Therapeutics			The Center Nervous Systems (CNS): Neurotransmission, Neuroplasticity & Neural Circuitry/ CNS Neuropharmacology and Drug Actions
小計		3	5	

3. 與標竿學校共同開設英語授課課程 5 門

課程名稱	授課教師/開課時間/主題
1. Norman Borlaug 特別講座	農業科學 ● Meng Meng Gu (2hr) 1. Texas A&M University System & Using biochar to replace peat moss in container substrate 2. A holistic approach to manage crape myrtle bark scale ● Genhua Niu (3hr) Role of Plant Factory for Producing High Value Crops ● Christine Tisone (2hr) COVID-19 and Global Hunger ● Larry Suva (2hr) Disease Models and Bone Regeneration ● Jack Elliot (2hr) Capacity Building and Agricultural Education Programs in Africa ● Nithya Rajan (1hr) Below and Above-Ground Phenotyping of Crops Using MRI and UAV-Based Methods ● Keerti Rathore (2hr) RNA-Interference: Mechanism and its Application in Tissue-specific Elimination of a Toxin from the Cottonseed
2. 領導力發展：危機後監測和管理 Leadership Development Panel: Post-Crisis Monitoring and Management 1-4	國際農業 ● Jack Elliot (10 小時) 11/4、11/6、11/13、11/18
3. 前瞻製造議題 Advanced Topics in Manufacturing	● 11/16 Jyhwen Wang (2hr) ABET/IEET ● 11/17 Jyhwen Wang (2hr) Energy Dissipation Mechanism of Lattice Bimaterial Structure under Low-Velocity Impact ● 11/18 Jyhwen Wang (2hr) Springback measurement and prediction in tube bending towards industry 4.0
4. 生物醫學與生物資訊 Biomedicine and	生物資訊 ● 10/26、10/27、10/28 James Cai (3hr)

課程名稱	授課教師/開課時間/主題
Bioinformatics	Cell Type-Specific Gene Function Prediction Via Single-Cell Gene Regulatory Network Construction And Perturbation <u>生命科學</u> ● 12/3 Xiuren Zhang (3hr) MicroRNA Biogenesis and Function/Future Directions of MicroRNA Study ● 12/10 Jun Wang (3hr) The Center Nervous Systems (CNS): Neurotransmission, Neuroplasticity & Neural Circuitry/CNS Neuropharmacology and Drug Actions
5. TAMU 農生系列講座	● 7/8 Keerti Rathore (2hr) A University-created Example of Genetic Engineering of an Important Crop: from Conception to Deregulation ● 10/25 Courtney Daigle (3hr) Personality, temperament and animal Welfare ● 10/26 Juan Landivar (2hr) AI in Agriculture: Opportunities and Challenges of Unmanned Aircraft Systems in Research and Precision Management ● 10/28 Jan Suchodolski (2hr) The importance of the intestinal microbiome in health and disease ● 11/10 James Cai (1hr) Application of Modern Data Science Methods to Single-cell Data for Problem Solving in Genetics

4. 培育教師創新與先進教學

教師教學技巧研習課程：邀請獲多次教學特優獎項之 Dr. Jack Elliot，為本校教師講授國際農生領域課程全英文教學策略，精進教學實務技巧

講師	單位	主題	講題	時間
Jack Elliot		**NCHU-TAMU Enhancing Teaching Skills Webinar**	Efficient Online Teaching Principles	110/12/3
			Lectures' Leadership Peactices	110/12/21