

華 美 食 品 學 會
CHINESE AMERICAN FOOD SOCIETY



NEWSLETTER



VOLUME 13, NUMBER 2

FEBRUARY, 1991

敬 祝
新 春
如 意
前 程
似 錦



1990-1991 EXECUTIVE COMMITTEE MEMBERS:

President:	Yao-wen Huang	(黃耀文)	(404)	542-2286
President-elect:	Tung C. Lee	(李東慶)	(201)	932-9611
Secretary:	Christin Chou	(周翠芬)	(206)	872-7155
Treasurer:	Shwu-pyng Chen	(陳雪芬)	(415)	373-9433
Past president:	Daniel Y. Fung	(馮怡)	(913)	532-5654
Members (89-91):	Grace R. Yao	(姚詠芬)	(312)	927-6622
(89-91):	Michael Tao	(陶玉)	(812)	429-7653
(90-92):	Chi-tang Ho	(何志堂)	(201)	932-9672
(90-92):	Shu-chi Lee	(李秀吉)	(312)	998-7918

OPERATIONAL COMMITTEE: (*: Chairperson)

Annual Meeting:	Tung C. Lee*	(李東慶)	(201)	932-9671
	William Wang	(王智)		
	Romeo J. Leu	(劉嘉)		
Awards:	Y. Hang*	(韓俊)	(315)	787-2265
	Jimbay Loh	(樂俊)		
	Pei-kung Chang	(張佩玉)		
By-Law:	Santa Lin*	(林鍾志)	(314)	982-3138
	David Chou	(周國揚)		
	Peter Wan	(萬劍)		
Conference Overseas:	George Chu*	(朱志中)	(312)	461-4222
	Peter Wan*	(萬劍)		
	Iris Lee	(李翠芬)		
Employment:	J.G. Keng*	(耿景光)	(312)	563-6533
	Chi-hang Lee	(李長航)		
	Anthony Chen	(陳安鈞)		
	Yuan K. Liu	(劉元光)		
Fund Raising:	James K. Chan*	(陳嘉基)	(213)	637-9556
	Ada Chen	(陳惠)		
Long Range Planning:	Cathy Y. Ang*	(王淑英)	(404)	546-3493
	Daniel Y. Fung	(馮怡)		
	Wai-kit Nip	(李威)		
Nomination/Election:	Daniel Y. Fung*	(馮怡)	(913)	532-5654
	Cathy Ang	(王淑英)		
Membership/Public Relation:	Yen-con Hung*	(洪延)	(404)	228-7284
	Y. Albert Hong	(洪)		
	Y. Diana Hao	(何)		
	Nelson Yeh	(葉利代)		
	Mike Chen	(陳錦平)		
Publication:	Emil A. Huang*	(黃聖一)	(612)	481-2688
Student Affairs:	Kow Ching Chang	(張國清)	(808)	944-1456
	Shaw Wang	(王秀亮)		
	Rose Tseng	(張溫)		
Historian:	B.S. Luh	(陸伯勳)	(916)	752-0151
Legal Council:	Marian S. Ming	(明錫)	(312)	782-8200

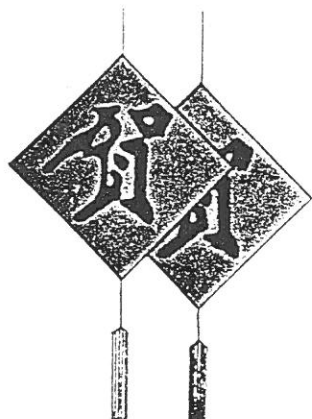
SPECIAL STRATEGIC ADVISORS TO THE PRESIDENT:

Cathy Ang (王淑英 404-546-3493); T.S. Chen (陳同善 213-885-2841);
 Tuu-ji Chai (蔡士及 301-742-4266)

STATEMENT OF POSITION: The Chinese American Food Society (CAFS) is a non-political and nonprofit organization dedicated to the scientific and professional betterment of its members. The members of CAFS wish to interact with all scientists based on common cultural and scientific interests. CAFS takes no political stand or preference. Selection of materials for all CAFS publications is based on the scientific content and general interest. Any inadvertent connotation should not be deemed as the official position of CAFS.

CAFS NEWSLETTER is published quarterly by CAFS for its members. contributions of articles or news should be sent to the editor. Dr. Emil Huang, RT&E, LAND O'LAKES, Inc., P.O. Box 0116, Minneapolis, MN 55440-0116

Special Announcement	1
徵聘海外學人回國任教東海大學食品科學系	2
Continue For Excellence	3
食品工業研究所董事長 馬保之博士對華美食品 學會同仁的盼望	4
拜會食品工業研究所所長 劉廷英博士	5
Welcome New Members	6
IFT-CAFS FORUM: Uses of Chinese Foods in Food Service Industry	7
Professional Scientist Award: Nomination	8
Student Scholarship Award: Nomination	9
Application Form Scholarship	10
A taste of Chinese Culture Seminar	11
微生物快速自動化檢測研習會	12
Greeting From The Fongs	17
The Traveling Fongs Odyssey in 1990	18
Special Announcement Concerning the New J. of Rapid Methods and Automation in Microbiology	19
Seminar on "New Product Development in Food Industry"	20
Survey	20
What New?	21
Excellence in Food Science at KSU	22
留學生就業市場趨勢分析與檢討	23
A New Food Science Book	24
華美食品學會	25



賀 馬保之博士榮任
食品工業發展研究所
董事長

劉廷英博士榮任
食品工業發展研究所
所長

華美食品學會 敬賀



馬博士保之先生



劉博士廷英先生

2

徵聘海外學人回國任教東海大學食品科學系

本系已獲教育部核准成立研究所，其教學研究重點為食品科技及食品工業管理，為加強食品工業管理之師資，徵求相關專才，其條件如下：

一、候選人應具備條件：

- (一) 學位：博士
- (二) 主修：食品工業管理、食品服務系統管理、食品科技並具管理訓練或農業經濟具食品市場及行銷專長。

二、東海將提供的條件：

- (一) 職位：以教育部聘任標準為依據。
- (二) 待遇：比照國立大學。
- (三) 宿舍：免費提供學人宿舍。
- (四) 子女教育：校內設有幼稚園、附屬小學及中學。
- (五) 福利：具公保及退休制度。
- (六) 居住環境：安靜優美、空氣新鮮、交通便捷。

三、起聘時間：民國八十年八月一日起聘。

四、聯絡地址：東海大學食品科學系主任王慶富接洽。

台中市中港路三段181號 TEL(公):(04)3590290

食品科學系主任 王慶富



CONTINUE FOR EXCELLENCE



Message from the president, Yao-wen Huang, 1990-1991

As the Chinese new year begins, I would like to say "Happy New Year" to you and wish you a prosperous year. Time flies. But, what we have done during the half year? I would like to inform you.

In order to have a communication to other Chinese society, last Fall I asked the secretary Dr. Shu-ping Tseng to represent our society to attend an activity sponsored by the North American Engineering Association. We also mail our Newsletter to some other societies. I believe this will help for our publicity and visibility.

For helping to identify the qualified speakers for a seminar held in FIRDI this Winter, we recommended two members from industry to address the refrigerated and frozen new food products. We always provide information regarding member's expertise to the inquires from both members and non-members. Of course, we supported our members' requests too. Recently, we wrote a letter for supporting a member's publication.

This year, we will have a forum again during the IFT Annual Meeting. Program chairman Dr. T.C. Lee has been worked with me closely to identify the topics and panelists. This year's Forum is entitled "Uses of Chinese food in food service industry." Last year, we had a successful Forum, I believe that we will have another excellent one. Recently, the CAFS co-sponsored a special seminar entitled "A taste of Chinese culture" with the Athens Chinese Language School. Cathy Ang and I spoke about the traditional Chinese food. The principal of the Athens Chinese Language School is our member Joe Jen's wife, Salina. The seminar was very successful. It was supported by the Pacific Cultural Foundation.

The proceedings of the 1990 IFT-CAFS Forum, "Traditional Chinese food with advanced technology", is in press. The proceedings will be available soon. Secretary Christin Chou has been working on the new membership directory, she is going to publish a new directory with pictures in it. Hope all of you send a passport picture. Publishing an updated directory is a hard job because of member's changing address with no notice. Please to notify either the secretary or the treasurer anytime when you change your mailing address. Again, we want to have a membership directory with members' pictures. It has been a dream for the Immediate Past President Daniel Fung and myself. Without your hundred percent commitment, it will just be a day dream and never be a true.

Again, I am asking you to nominate qualified members for the 1991 CAFS Professional Achievement Award and Student Scholarship Award. Dr. Yuan Hang, the Award committee chairman is ready to accept any nomination from you. Please help us to have a good one. Other committees such as Long Range Planning, Membership/Public Relation, Nomination/Election are also very active for their duties. Please see their reports in the Newsletter.

Thank you very much! You made the society excellent.

4

食品研究所董事長馬保之博士對華美食品協會
同仁們的期望。

國家強盛而進步，我相信而科技發展的程度有重大的關聯。我們政府在科技發展上是絕對的支持，只要有好的計劃，合乎國家及人民的利益，並符合國情而需要者均可以由政府補助而實施。對於對食品工業方面，我希望各位會友能配合國家的政策，人民的需求，來協助我們引進國外的技術，讓我們充分的合作以提昇我們工業的層次。在這一項過程中，我們食品工業研究所將扮演很重要的角色。我個人希望是將本所成為新科技的消化中心 (Digestion Center)，將新科技引入本中心後由本中心科學人員作精細研究瞭解，可行的話並將它更為改進後再轉移給民間的生產機構去使用。為了達到這個目標，我希望各位會友能協助我們做到下面三點：

- (一) 組織成立之國外顧問公司。顧問公司應以華美食品協會的成員為主幹，由各位輪流回國主持業務，本所願意提供地方作為該公司的辦公室。
- (二) 集合國內外的力量舉辦科技研討會。研討會將以新科技為中心題目。這研討會將由國內外代表共同提出方案將決定討論的方式及，可向經濟部提出專案，由政府支持。
- (三) 對國內業者能協助他們對作業人員的專業訓練，以提高作業人員的素質，並可藉此來刺激國內研究發展的氣氛。

最後我很希望大家有機會多多回來，到我們這來參觀，讓我們有機會聚在一起互相交換雙方的心得再意見。國內仍然缺乏許多技術人員，希望各位學友能回國勝服。

拜會食品工業研究所所長劉廷英博士

首先恭禧劉博士接任食研所所長，並感謝所長能在百忙中抽身接見。茲將面談經過略述於后，以供會友參考。

5

食品工業研究所自成立以來均以對提供我國食品工業業者之服務為宗旨。今後我們除將配合國家建設計劃外，最主要的任務是協助國內工業層次的提昇。我們將引入國際上最好且最適合於國內必須的生產技術，經本所專員研究發展，並將改進後即將這些技術轉移民間生產機構。當然在技術轉移後本所也將提供對業者之訓練及輔導。讓我舉幾個例子來說，目前在全國大工廠已普遍實施的GMP，本所是政府的計劃，但全由本所來從事規化、訓練及輔導，將GMP全數轉移到國內工廠中去施行。對於今後本所將從那方面發展呢？我個人希望本所往下列數點發展：

10

15

一、鼓勵個人提出研究計劃，無論是有關基礎科學、產品或程式的發展，只要對食品工業有價值的計劃，都可以立案而推行。

20

二、將本所成為美國FDA公認(certified)的實驗所。若此可代替FDA發給公證書以便產品外銷。除節省時間、增加外銷能力外，本所將無形中擴大我們的服務範圍，因為我們不但只是對食品工業服務，進一步的我們可對其他的工業也提供服務。

25

三、擴大CCRC (Culture Collection and Research Center) 的業務範圍。我希望將來CCRC不但繼續提供國內方面的服務，並將其業務國際化而能提供國際間的服務而研究發展，使CCRC更充實更堅強。

30

四、希望本所協助亞洲農業中心、中國農業中心對第三世界提供技術合作，並能負起協助他們從事食品研究發展上的計劃。

最後我希望我們國內外的同行專家、學者，能互相不斷的交換意見，並更希望 CAFS 的會友們等多多提供技術資訊，在這方面幸貴會黃耀文會長率訪時，我會同他另外商談，對於以後如何實行這復又方面好之企圖，及才提以實施。

5

 ** **
 ** WELCOME NEW MEMBERS **
 ** **

L LIFE MEMBERS:

PROFESSIONAL MEMBERS:

- Dunn, Danny 17541 Yorba Linda,
Yorba Linda, CA 92686
- Wang, William C. 1602 Brighton Drive
Carrollton, TX 75007
- Yong, Nyet V. 1405 Hillmont Ave
Modesto, CA 95355

STUDENT MEMBERS:

- Chen, Jon S. 384-3 Maguire Village
Gainesville, FL 32603
- Cheng, Shi-tzu (Emily) 400 Atrium Way, #422
Davis, CA 95616
- Chiou, I. Peng 250 N. Santa Rita, #111
Tucson, AZ 85719
- Huang, Tung-shi Food Science Building
University of Florida
Gainesville, FL 32611
- Liu, Ming-Bang 1600 W Plum, #24A
Fort Collins, CO 86521
- Yang, Zhaomin Department of Viticulture and Ecology
UC Davis, CA 96616

TITLE OF IFT-CAFS FORUM: Uses of Chinese Food in Food Service Industry

Challenges and opportunities facing the Chinese food service industry in year 2000 will be addressed. Discussions include how to establish Chinese fast food chains, what factors are involved in using Chinese foods in lunch programs, how governmental food regulations affect the Chinese food service industry, what role R & D has in manufacturing Oriental food for food service, how to implement the total customer satisfaction concept into the fast food industry, what is the future of Taiwan's food industry in the new century, and how Taiwan can face the challenge posed by the invasion of the Western fast food system.

DATE & TIME: June 5, 1991 (Wednesday) 2:00-5:00 p.m.

FORUM SPONSORED BY: Chinese American Food Society and
Chinese Institute of Food Technologists

FORUM CHAIRMEN: Dr. Yao-wen Huang, University of Georgia and
Dr. Tung-ching Lee, Rutgers State University

PROPOSED PANELISTS:

Dr. Ada A. Chen, President
Food and Agriculture Consulting Technology Corp.
Fort Collins, CO 80524

Dr. Mike L. Chen, Group Leader
Food Science Group
International Trans-Technics Corp.
Los Angeles, CA 90032

Mr. George C. Chu, Director
Quality Assurance
American Maize Company
Chicago, IL 60604

Dr. Y. Hang, Professor
Department of Food Science and Technology
Cornell University
Geneva, NY 14456

Dr. Romeo J. Leu, Manager
Technical Service
Minh Food Corp.
Pasadena, TX 77508

Dr. Tin-yin Liu, Director
Food Industry Research and Development Institute
Hsin-Chu, Taiwan, ROC

Mr. Chung-hsin Tsai, General Manager
Han-Hwa Chinese Fast Food Corp.
Taipei, Taiwan, ROC

PROFESSIONAL SCIENTIST AWARD - nomination
Chinese American Food Society

Purpose: To recognize a professional member for his/her outstanding contributions to the field of Food Science and Engineering, as it relates to teaching, research, extension, administration, or leadership in industry.

Please type:

Name of Nominee: _____ address: _____

Position: _____

Date of Birth: _____

Please include the following information on a separate sheet of paper:

- A. Educational Background (Institution, degrees, year, major and minor fields)
- B. Professional Societies (Offices held, dates)
- C. Professional Activities
- D. Publications
- E. Honors and Awards
- F. Nomination Statement (A one-page description that establishes the nominee's qualifications for the award. Personality characteristics and contribution to other fields are not pertinent. Please confine this statement to one page.)
- G. Submit four (4) copies to:

Professor Yong D. Hang
Dept. of Food Science & Technology
Cornell University
Geneva, New York 14456
Tel: 315-787-2265
Fax: 315-787-2397

- H. Deadline: April 8, 1991

Student Scholarship Award - Nomination/Application

Purpose:

- a. To Stimulate students to engage in food research.
- b. To promote excellence in the application of scientific methods.
- c. To encourage excellence in communication research results.
- d. To develop self-confidence and professionalism in communicating scientific knowledge.

Eligibility:

Competition will be limited to students for members of the CAFS who are undergraduate or graduate students or persons having completed the degree within the past year.

One manuscript may be entered for competition during any one year. A person may enter in competition during succeeding years by presenting new data.

Requirements:

The written manuscript will be evaluated on the following:
(1) Objective, (2) Experimental design, (3) Data interpretation,
(4) Clarity of wording, (5) Style and form.

The manuscript must be in the style and form suitable for publication in a journal which has an editorial staff. The contestant shall be the senior author. Titles, abstracts, and four copies of the finished manuscript shall be submitted to the chairman of the Award Committee along with the completed application form by April 8, 1991.

Application for Scholarship
Chinese American Food Society

10

Date of Application _____

Legal name _____, _____, _____
Last First Middle

Chinese name _____

Mailing address: _____

Phone number including area code _____

Date of Birth _____

You will be a candidate for what degree? _____

Major Department _____ University _____

Major courses taken at current institution (please attach your transcripts to this application)

Grade Point Average (current institution) _____ (A=4, B=3, etc.)

Thesis Topic _____

State briefly your professional experiences including teaching, research, and other professional activities (organization membership, meeting, presentation, club activity, etc.)

State briefly your career goal

List names and phone numbers (including area codes) of three persons who are familiar with your past academic work and who may be contacted for further information.

I certify that the information given on this form is complete and true.

Signature of applicant _____

Submit four (4) copies to:

Professor Yong D. Hang
Dept. of Food Science & Technology
Cornell University
Geneva, New York 14456
Tel: 315-787-2265
Fax: 315-787-2397

Deadline: April 8, 1991

文化新

A Taste of Chinese Culture Seminar

Program:

January 19, 1991 2pm - 5pm, Room 137 Tate Student Center, UGA

2:00 pm Introduction

2:15 pm Traditional Chinese food, their flavor, color and variety.
by Dr. Yao-wen Huang and Dr. Cathy Ang

3:15 pm Unique Chinese music and dance.
by Ms. Yunyu Wang

4:15 pm Silk Road and its role in East-west culture Exchange.
by Dr. C.H. Tsao

5:00 pm Limited Chinese food for sale
(The proceed of the sale goes to the Chinese Language School.)

January 20, 1991 3pm, Room 266, Physical Education Bldg

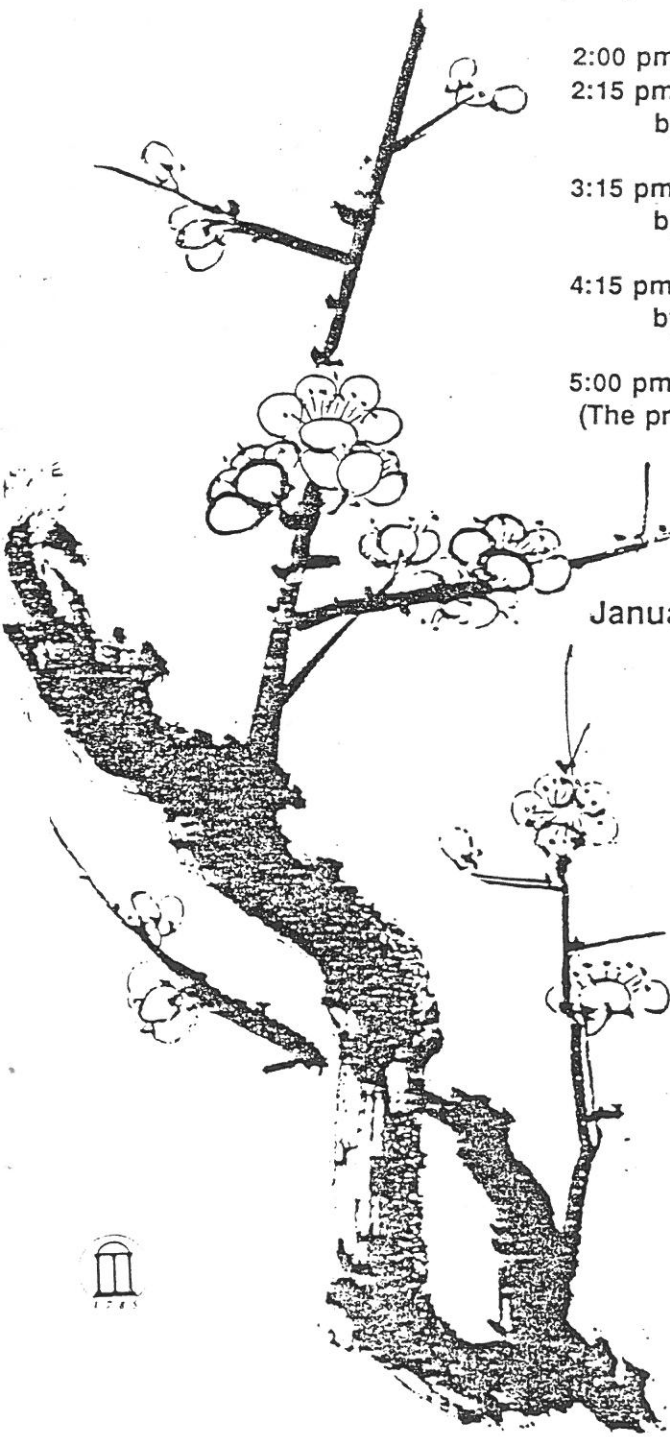
3:00 pm Demonstration of Chinese painting
by Ms. Salina Jen

Sponsored by
Chinese American Food Society
Chinese Student Association, UGA
Dept of Dance, UGA
Athens Chinese Language School

Supported by
Pacific Cultural Foundation, R.O.C.

FREE ADMISSION

Advance ticket for food & information call:
Salina Jen 354-4214
Yunyu Wang 542-4432



(請張貼)

微生物快速及自動化檢測 研習會

期：民國80年3月11日~3月15日

點：食品工業發展研究所—服務大樓

講：馮貽澤 博士 (Dr. Daniel Y.C. Fung)

美國堪薩斯州立大學教授

習指導：呂秋娟 博士 (Dr. Sheree C.C. Lin)

曾任美國漢堡王 (Burger King) 公司

食品檢驗部經理

劃：張長泉 博士 (食品工業發展研究所)

研習會課程 (中文講解)

3月11日 (星期一)

- 8:30-9:20 報到、繳費、領取資料
- 9:20-9:30 開幕式
- 9:30-10:40 Introduction—Conventional and Miniaturized Microbiological Methods
Dr. Daniel Y.C. Fung
- 10:40-11:00 Coffee and Tea Break
- 11:00-12:30 Comparative Analysis of Diagnostic Methodology
Dr. Daniel Y.C. Fung
- 12:30-13:30 Lunch
- 13:30-15:00 Current Development and Application of Viable Cell Count Methods
Dr. Daniel Y.C. Fung and Dr. Sheree C.C. Lin
- 15:00-17:00 Workshop—Inoculation of Culture to Conventional and Miniaturized Systems
Dr. Sheree C.C. Lin and Dr. Daniel Y.C. Fung

3月12日 (星期二)

- 9:00-10:30 Up-date of Instrumentation and Automation
Dr. Daniel Y.C. Fung
- 10:30-11:00 Coffee and Tea Break
- 11:00-12:30 Rapid Detection of Emerging Pathogens by Novel Methods
Dr. Daniel Y.C. Fung
- 12:30-13:30 Lunch
- 13:30-15:00 DNA Probe and Related New Methods
Daniel Y.C. Fung
- End of Symposium
- 15:00-17:00 Workshop—Rapid Viable Cell Count Methods—Redigel, Petrifilm, Isogrid. Reading of Results of Monday's Experiment
Drs. Daniel Y.C. Fung and Sheree C.C. Lin

3月13日 (星期三)

- 9:00-10:30 Discussion and Inoculation into Vitek System
Mr. Jim Ellis
- 10:30-11:00 Coffee and Tea Break
- 11:00-12:30 Bactometer Discussion and Inoculation
Mr. Jim Ellis
- 12:30-13:30 Lunch
- 13:30-15:00 Spiral System Discussion and Inoculation
Mr. Peter Pratt
- 15:00-17:00 Read Viable Cell Count Data and Perform Diagnostic Kit Tests (API, Enterotube, Spectrum 10, MicroID)
Drs. Daniel Y.C. Fung and Sheree C.C. Lin

3月14日 (星期四)

- 9:00-10:30 Demonstration and Operation of DNA Probe, ELISA Test and Biocontrol
- 10:30-11:00 Coffee and Tea Break
- 11:00-12:30 Read Reactions of Wednesday's Tests
- 12:30-15:00 Lunch
- 13:30-15:00 Malthus Demonstration and Discussion
- 15:00-17:00 Lumac, ATP, Catalase Tests, Reduction Test

3月15日 (星期五)

- 9:00-10:30 Rapid Toxin Tests. Latex Bead Technology
 10:30-11:00 Coffee and Tea Break
 11:00-12:30 Aflatoxin Tests
 12:30-13:30 Lunch
 3:30-15:00 Collection of Data and Group Discussion
 6:00 Presentation of Certificates
 7:00 Workshop Adjourn

參加辦法

研習別：研習別分為兩種

- A. 全程研習(包括研討及實驗)。
 B. 只參加研討部份。

研習日期：A. 全程研習：3月11日至3月15日
 (9:00~17:00)

B. 只參加研討部份：3月11日及12日
 (9:00~15:00)

名額：A. 全程研習：30名
 B. 只參加研討部份：80名

研習地點：食品工業發展研究所(服務大樓四樓)
 新竹市食品路331號

費用：A. 全程研習：3000元
 (含午餐) B. 只參加研討部份：1000元

報名：即日起用所附報名表逕向本所訓練單元報名

報名截止日期：民國80年2月15日

※由於場地限制參加全程研習人數暫限30名，本所
 將依報名先後次序及需要性甄選決定參加人員。

※報名後本所將於3月1日左右另函通知報到事宜。

※食宿及交通：研習會期間供應午餐，住宿交通請
 自理。

※洽詢專線：TEL-(035)223191轉231或269

FAX-(035)214016 (訓練單元)

微生物快速及自動化檢測 研習會

報名表

姓名：_____

出生：_____年_____月_____日

服務機關：_____

現職：_____

連絡地址：_____

連絡電話：() _____

F A X：() _____

研習別： 全程研習(研討及實驗)
 (請於內打v) 只參加研討會部份

※本表請於80年2月15日前逕寄

食品工業發展研究所 訓練單元

※本表限壹名報名，如有兩名以上參加者請自行影
 印本報名表。



Rapid Methods and Automation in Microbiology

Workshop Purpose

Rapid methods and automation is a dynamic area in applied microbiology dealing with the study of improved methods in the isolation, early detection, characterization, and enumeration of microorganisms and their products in clinical, food, industrial, and environmental samples. This workshop, "Rapid Methods and Automation in Microbiology," will focus on the practical application of conventional and new commercial systems of rapid identification of microorganisms from medical specimens, foods, water, and the environment. Workshop participants will receive eight days of intensive theoretical and hands-on training in microbiological automation under the direction of **Dr. Daniel Y.C. Fung**, an internationally known authority in the field.

A special 2-day mini-symposium will be offered as an integral part of the workshop. Workshop participants must attend both the symposium and the workshop. Some individuals may opt to attend the symposium only.

Designed for

- Microbiologists
- Food Scientists
- Medical Technologists
- Consultants
- Quality Assurance and Control Managers
- Laboratory Directors
- Researchers

Workshop Director



Dr. Daniel Y.C. Fung is Professor of Food Science in the department of Animal Sciences and Industry at **Kansas State University**. He has gained an international reputation as a lecturer on rapid methods and automation in microbiology at symposia in Sweden, Germany, Great

Britain, France, Czechoslovakia, Washington, D.C., Canada, Italy, Republic of China, Singapore, Finland (1990), and the United States. He has about 300 publications in journals, books, and proceedings, and is the recipient of the **Faculty Service Award** given by the U.S. National University Continuing Education Association because of the uniqueness of this workshop series. He is the coeditor of the book *Anaerobic Fermentation* (Marcel Dekker, Inc., 1988) and *Instrumental Methods for Quality Assurance and Research in Foods* (Marcel Dekker, Inc., 1991). He made a round-the-world lecture tour in the Fall of 1988. He is chairman of the Food Microbiology Division of ASM, and Fellow of the American Academy of Microbiology.

Visiting Professors



Dr. Nelson A. Cox, a research microbiologist with the United States Department of Agriculture, holds an adjunct professorship in the Poultry Science Department at the University of Georgia. He is a well-known **poultry microbiologist** and has published extensively in the field of food microbiology and diagnostic kits for food microbiology. He has over 250 publications in journals and abstracts and is coeditor of the book *The Microbiology of Poultry Meat Products* (Academic Press, 1987).



Dr. Millicent C. Goldschmidt, professor of the Dental Branch, Dental Science Institute, at the University of Texas Health Science Center in Houston, has authored more than 160 publications. Her particular expertise in microbiological instrumentation led her to be recognized as an **Outstanding Woman In Science** in 1985-1986, by the Association for Women in Science. A Fellow of the American Academy of Microbiology, she presented several papers at international meetings recently.

Guest Lecturers



Dr. J. Stanley Bailey, research microbiologist with the United States Department of Agriculture, works extensively with poultry microbiology and diagnostic kits and systems. He has about 200 publications to his credit and has received a **U.S.D.A. citation** for excellence in rapid methods and automation in microbiology.

Reginald Bennett, P.C. Vasavada, Cecile Lahellec, and Paul A. Hartman have been guest lecturers in recent years.

Previous Participants

Participants in 1981, 1982, 1983, 1984, 1985, 1986, 1987, 1988, 1989, and 1990 workshops came from more than 40 states in the United States, Algeria, Argentina, Australia, Belgium, Brazil, Canada, Denmark, Finland, France, Germany, Great Britain, Guatemala, Honduras, Hong Kong, Iceland, Iraq, Iran, Japan, Mexico, The Netherlands, New Zealand, Norway, Republic of China, Saudi Arabia, Singapore, and Spain.

Workshop Agenda*

Thursday July 11, 1991**

Registration at 1:30 p.m.

Food Microbiology Seminar at 2:30 p.m.

"Origin of *Salmonella enteritidis* in Poultry and Eggs"

Dr. Gilles Salvat, Ploufragen, France

Keynote lecture: Dr. Paul A. Hartman

"Rapid Methods in Water and Environmental Samples"

Friday July 12, 1991**

Morning Lecture: Introduction to conventional and miniaturized methods (Dr. Daniel Y.C. Fung)

Afternoon Laboratory: Viable Cell Counts—Conventional, Petrifilm, Redigel, DEFT, Catalasemeter

Saturday July 13, 1991

Morning Lecture: Comparative Analysis of Diagnostic Kits (Dr. N.A. Cox and Dr. J.S. Bailey)

Afternoon Laboratory: API, MicroID, Enterotube, Minitek Spectrum 10, IDS, Biolog

Sunday July 14, 1991

Morning Lecture: *Salmonella* and *Listeria* detection—Conventional vs. Rapid Methods (Cox and Bailey)

Afternoon Laboratory: ELISA (Organon Teknika), DNA Probe (Genetrak), Biocontrol, Tecra (Vitek), Report (3M)

Monday July 15, 1991

Morning Lecture: Mechanization, New approaches, Sophisticated light scattering detection systems, Impedance, Conductance (Dr. M.C. Goldschmidt)

Afternoon Laboratory: Artek Systems, Isogrid, Malthus, Spiral Plate

Tuesday July 16, 1991

Morning Lecture: Radiometry, Microcalorimetry, ATP detection (Goldschmidt)

Afternoon Laboratory: Vitek Systems, Bactomatic, Lumac, Omnispec

Wednesday July 17, 1991

Morning Lecture: Emerging Pathogens—*Campylobacter*, *Yersinia*, *Hemorrhagic E. coli*, etc. (Cox and Bailey)

Afternoon Laboratory: Detection of emerging pathogens. Conventional vs. rapid methods. MUG, Motility enrichments, Polymerase Chain Reaction

Thursday July 18, 1991

Morning Lecture and Laboratory: Rapid detection of microbial toxins (Reginald Bennett) Oxoid, Aflatest
A look into the future, presentation of certificates

Noon: Departure

*The participation of commercial companies is in the negotiation state.

**A mini-symposium occurs on July 11 and July 12.

Location

The Rapid Methods and Automation in Microbiology Symposium Workshop will be held at the Holidome in Manhattan, Kansas, and Call Hall on the Kansas State University campus. Manhattan has an airport served by U.S. Air-Air Midwest. The city is approximately 130 miles west of Kansas City on Interstate Highway 70, a drive of about two and one-half hours.

Social Activities

Welcome and farewell receptions, one lunch, two banquets, and a midweek picnic are planned. Informal, optional dinner meetings will be arranged. Spouses are welcome. Due to hot weather, casual dress during the workshop is recommended.

Graduate Student Fellowships

Fellowships, including tuition, room, and board, may be awarded to highly qualified degree-seeking graduate students to participate in the workshop as special assistants. Contact Dr. Fung for details.

1987 Fellows: Marilyn Hattier
Kathy Richter

1988 Fellows: Margie Lee
Kim Payne
Elliot Ryser

1989 Fellows: Hassan Gourama
Adela Aguirre

1990 Fellows: Elaine Berry

Distinguished Fellows

1990: Dr. Stephanie Doores
Dr. Leroy Blankenship

Special Scientists

1988: Frank Borius
1989: Merja Manninen

American Society for Microbiology Certification

Participants will receive 5.25 ASM Continuing Education units to be granted upon successful completion of the workshop.

Notice of Nondiscrimination

Kansas State University is committed to a policy of nondiscrimination on the basis of race, sex, national origin, handicap, religion, age, sexual preference, or other nonmerit reasons, in admissions, educational programs or activities, and employment, all as required by applicable laws and regulations. Responsibility for coordination of compliance efforts and receipt of inquiries, including those concerning Title IX of the Education Amendments of 1972 and Section 504 of the Rehabilitation Act of 1973, has been delegated to Jane D. Rowlett, Ph.D., Director, Affirmative Action Office, 214 Anderson Hall, Kansas State University, Manhattan, Kansas 66506-0104, (913/532-6220)

Workshop Fees

The registration fee for the 1991 Rapid Methods and Automation in Microbiology Workshop is \$1,055 (includes the mini-symposium). This includes two hours of graduate credit, eight days of program sessions and laboratories, all handout materials, and 5.25 American Society for Microbiology Continuing Education units. Also included are two banquets, one lunch, a picnic, and receptions. Other meals, lodging, and transportation are not included.

Payment must be in U.S. dollars or by World Wide Money Order.

Mini-Symposium Fees

The registration fee for the Mini-Symposium of July 11 and July 12 is \$150. The fee includes all sessions, handouts, coffee breaks, one lunch, Symposium banquet, and a reception.

Registration Information

The workshop registration fee, less a \$30 handling charge, will be cheerfully refunded if notice is received on or before **June 24, 1991**. Thereafter, a 75 percent refund will be made. If you have questions concerning the workshop scientific content or format, contact **Dr. Daniel Y.C. Fung** at **Tel: (913) 532-5654** or **FAX: (913) 532-5681**.

Questions concerning registration or general information should be directed to the Rapid Methods and Automation in Microbiology Conference Coordinator at **1-800-255-2757** (outside Kansas) or **(913) 532-5575** (in Kansas or outside the U.S.).

You may **FAX** your registration to us at **(913) 532-5637** anytime, day or night.

Accommodations

A block of rooms has been set aside for workshop participants at the Manhattan Holiday Inn/Holidome, 530 Richards Drive. **Please refer to the workshop when making reservations directly with the Holiday Inn/Holidome at (913) 539-5311**. The rate for a single or double room is **\$52** plus tax per night. Please make reservations before **June 26, 1991**, to receive the reduced rate.

Student residence hall facilities featuring single rooms with bathroom facilities on each corridor are also available for workshop participants. If you would like a reservation for residence hall accommodations, please call **(913) 532-5575**, before **June 24, 1991**.

Limited Enrollment

Enrollment in the Workshop is limited. Please return the registration form or FAX, or telephone your registration as soon as possible to guarantee your enrollment. There is no enrollment limit for the mini-symposium (July 11 and 12, 1991).

cut and mail

Rapid Methods and Automation in Microbiology

July 11-18, 1991
Kansas State University

Registration Form

Name (as you wish it to appear on certificate)

Job Title (Please be specific)

Company

Address

City, State, ZIP Code, Country

Telephone (_____) _____ FAX (_____) _____

- _____ **Workshop registration fee of \$1,055 (includes the mini-symposium) (July 11-18, 1991)**
- _____ **Mini-Symposium registration fee of \$150 (July 11-12, 1991)**

- _____ Check (payable to Kansas State University)
- _____ Invoice my company at the address on form
- _____ Charge to  

Print Cardholder's Name

Cardholder's Signature

Card Number Expiration Date

To register by telephone, call **(913) 532-5566** and ask for conference registration. Or FAX your registration to us at **(913) 532-5637**.

Return this form to:
Rapid Methods and Automation in Microbiology
Division of Continuing Education
Kansas State University
College Court Building
Manhattan, KS 66506-6015



GREETINGS FROM THE FUNGS:

1990 has been an ENERGETIC YEAR!!

Catherine

1. passed all four preliminary exams
statistics, professional development, adult education,
and self-perception psychology)
2. played on Steinway's Third Artcase (500,000TH)
grand piano, now on tour in Europe.
first artcase (100,000TH) at Smithsonian
second artcase (300,000TH) at Whitehouse
3. celebrated the beginning of the Third Season
of her T.V. show (still on every Tues.
and Wed. for 30 mins.)

Busy with Ph.D. research. Target in 1991: Dr. Catherine L. Fung ! Pulsar NX still going strong!

Francis just turned handsome 17. Straight "A" Senior at KSU, majoring in Math and Physics.

Presented his second paper and won the best paper award at the Joint Math Meeting.
Appointed NSF-REU Fellow and spent 2 months at the University of Oklahoma in Math.
Finalist in the Barry Goldwater Fellowship competition (\$14,000 stipend).

BUDAPEST SEMESTERS IN MATHEMATICS—will travel to Hungary to study Math with some of the
world's leading mathematicians for 5 months in Spring, 1991.
Catherine and Daniel plan to visit him sometime in Europe.

GOOD FRIENDS IN EUROPE, PLEASE WATCH OUT, THE FUNGS MAY COME TO DINNER!!

President of the Pi Mu Epsilon Chapter and Vice president of the Math club.

Growing fast physically and especially mentally.

Daniel took many trips this year. Besides the ones with Catherine he went to Van Couver,
Toronto, Ottawa, Windsor, Portland, St. Louis, Washington, D.C., N.Y., etc. for professional
meetings and visited relatives, especially sister Yvette and cousins in Canada.

Deeply saddened by the loss of his beloved aunt and benefactor Dr. Marie Fung, M.D.,
a decorated ophthalmologist (Hong Kong) in Ottawa, Canada.

His second book "Instrumental Methods for Quality Assurance in Foods", to be published by
Marcel Dekker, Inc., will appear in April, 1991. Very busy with 15 Ph.D. and M.S. students.
He has now about 300 publications. In academia "Publish or Perish", no kidding!!

Celebrated the 10th anniversary of his Rapid Methods and Automation in Microbiology
workshop in July. A super success.

Active in Church and Lions Club.

WE WISH YOU A VERY HAPPY 1991 !!

THE TRAVELING FONTS ODYSSEY IP 1990

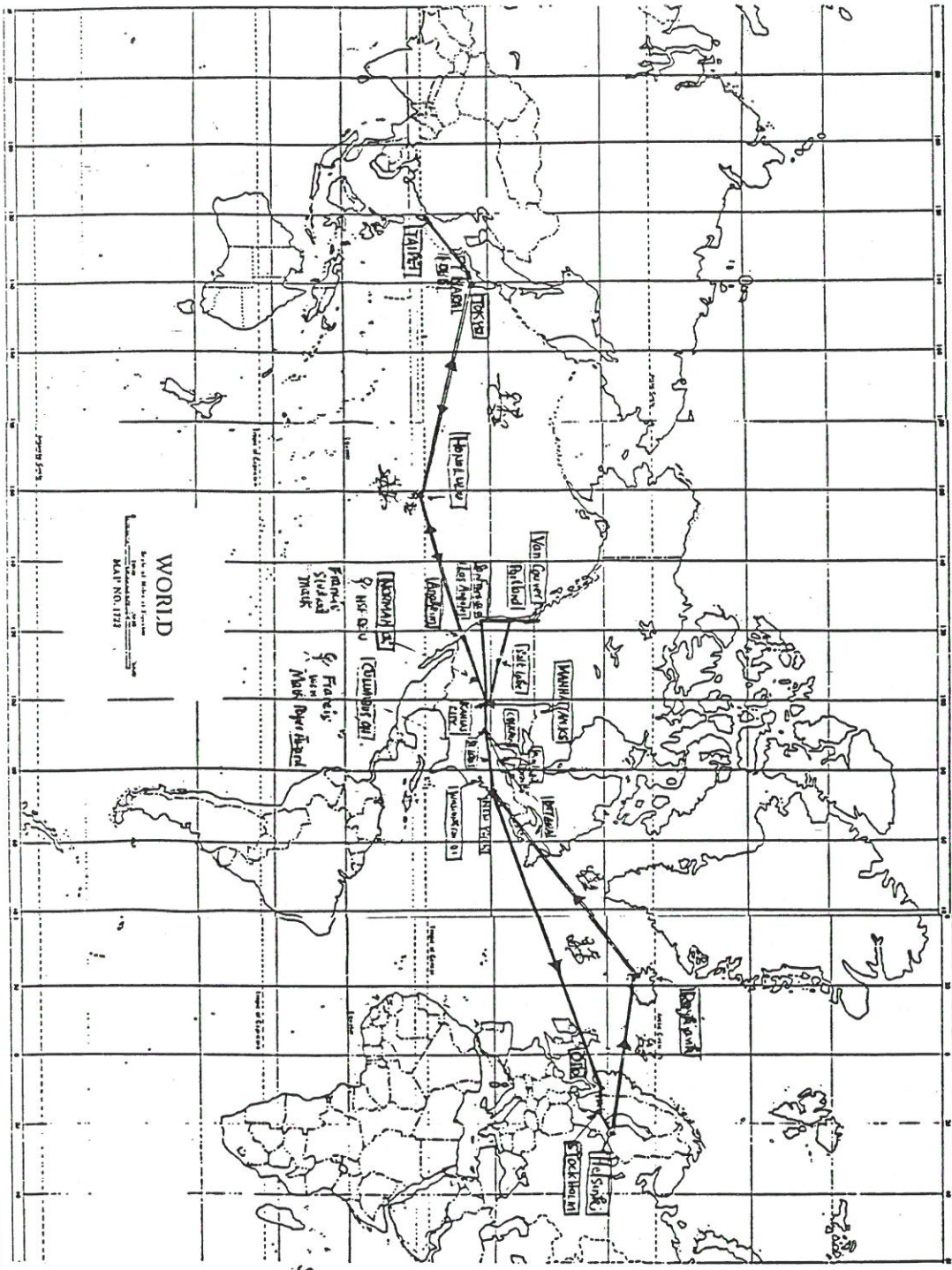
Catherine
in
Little
Kingdom
in
Tibet

Darrin
Kata

15 course Japanese
Dinner
MUM

SUN Moon
Lake in
Taiwan

Beautiful Mount
Fuji
Japan



Fond of
Money

Blue Lagoon of
Iceland
Hot Springs

SMOOTH CRUISE
ON THE BALIC

Champion chef
serves catfish in
Paris

Special Announcement Concerning the New
Journal of Rapid Methods and Automation in Microbiology

Daniel Y.C. Fung has been invited to be a guest editor for two issues of the Journal of Food Safety with a sub-title of Rapid Methods and Automation in Microbiology in 1991. After the first two successful issues, the journal will be formally named the Journal of Rapid Methods and Automation in Microbiology.

The first issue will probably be published in July, 1991. Following are some articles in the process of review:

- ◆ History and Future of Rapid Methods and Automation in Microbiology
- ◆ A rapid and novel Listeria detection method (for a patent-pending procedure).
- ◆ A new direct rapid Salmonella detection method.
- ◆ Practical evaluation of the Spiral System and Laser Method.
- ◆ Omnispec 4000 evaluation and use.
- ◆ Gravimetric dilutor study.
- ◆ Practical application of Fung's double-tube method for Clostridium perfringens.
- ◆ etc.

The future of the journal depends on great papers from colleagues. Fung is actively requesting papers related to rapid isolation detection, enumeration, and identification of microorganisms (by microbiological, chemical, biochemical, biophysical, immunological, serological, etc. methods) in food, water, industrial and environmental samples.

There will be no page charge for the publication of your peer reviewed research papers.

Great news:

Fung has negotiated a great deal with Food and Nutrition Press, Inc. (publisher of the new journal) for subscriptions of the journal. For our **Workshop participants** the rate for one volume of the Journal is only \$40.00, about a 50% discount!! If you are interested in subscribing to this journal please return the survey (no commitment to subscribe).

SURVEY

I MIGHT like to subscribe to the new Journal of Rapid Methods and Automation in Microbiology
(No obligation at this point at all.)

Name: _____

Class of _____

Address: _____

Telephone: (____) _____

FAX: (____) _____

Please mail this to:

Daniel Y. C. Fung
Kansas State University
Call Hall, 207
Manhattan, KS 66506-1600

SEMINAR ON "NEW PRODUCT DEVELOPMENT IN FOOD INDUSTRY"

- o SPONSER : FOOD INSUSTRY RESEARCH AND DEVELOPMENT INSTITUTE
- o DATE: Jan. 10, 11 and 15, 1991
- o PLACE: Hsinchu, Taichung, and Kaohsiung, ROC
- o PROGRAMS:
 - "Development of Engineered Meat Products" - Dr. Pie-ya Meng (Swift-Eckrich, Inc.)
 - "Development of Microwave Baking Mixes" - Dr. Whu-Ta Lee (Park Corp.)
 - "Development of Sous-Vide Products" - A French expert
 - "New Product Development of Refrigerated Foods in USA" - Dr. E. A. Huang (Land O'Lakes, Inc.)
 - "Cryostabilization Theory and Application in Frozen Prepared Foods" - Dr. Victor Huang (Pillsbury Co.)
 - Discussion - Chairman: Mr. Chung-ping Huang, FIRDI

WHAT
NEW?

K-Stater earns national honors

Lee joins OSU as chair of new food science faculty

Ken Lee, formerly professor at the University of Wisconsin, Madison, has joined The Ohio State University as professor and chairman of the newly formed Department of Food Science and Technology.



Lee, who was at Wisconsin for the last ten years, chaired a \$6 million building program for the new food science facility in Madison, expected to be completed this year. He also was chairman of the Technical Advisory for the Wisconsin Center for Dairy Research. He maintained an active research program in mineral nutrients and taught food science to more than 1,500 undergraduates each year via cable and broadcast television, winning an award for teaching excellence.

He received his B.S. in food science from Rutgers University in 1975, and his Ph.D. from the University of Massachusetts in 1980. A Professional Member of IFT, Lee currently serves as chairman of the Institute's Long-Range Planning Group. In addition, he was recently elected to IFT's Committee on Nominations and Elections, is an IFT Councilor, and has served as a Regional Communicator for ten years.

He is this year's Trout Visiting Scholar Speaker at Michigan State University, was keynote speaker at the AHI meeting in New Orleans, and on October 11 was an invited lecturer on risk communication in The Hague, The Netherlands.

Food science faculty at Ohio State formerly resided in several departments, but in October 1989 a single department was formed to bring together the diverse elements of food science and to form a high stature food science program. The total effort of the resulting new Food Science and Technology Department includes Lee's appointment as chairman, a new facility, new faculty positions, additional technicians, and two endowed chair positions—one to be filled and one recently awarded to IFT Professional Member Charles Morr.

Huang joins agricultural engineering faculty at KSU

Chi-Tai Huang has recently joined the faculty of Kansas State University, Manhattan, Kan., as an assistant professor in the Department of Agricultural Engineering.

He received his B.S. in mechanical engineering and an M.S. in food technology in Taiwan, Republic of China, then earned a second M.S. and his Ph.D. in food engineering at the University of Massachusetts, Amherst. He spent a year as a postdoctoral research associate at the University of Massachusetts, then was a member of the Nabisco Company's extrusion research group for approximately two years.

Huang is a member of IFT, SPE, and AIChE. His research will be in the area of extrusion, physical properties of biological materials, and baking-related operations. He will teach courses in food processing engineering, physical properties of foods, and food plant design.

A paper by Francis Fung, a senior in physics and mathematics at Kansas State University, was chosen one of the five best student papers presented at the national meeting of Pi Mu Epsilon, the national honorary mathematics society.

Fung has received a \$100 cash award from the American Mathematical Society. The paper, "The Game-Theoretic Analysis of Superior Beings," focuses on the probability of intelligent life throughout the universe.

Additionally, he is one of 32 students chosen nationally to participate in a mathematics program this semester in Budapest, Hungary.

Fung is taking mathematics and Hungarian language courses taught by faculty of Eotvos University and the Mathematical Institute of the Hungarian Academy of Sciences in Budapest. The mathematics courses are taught in English, and the faculty have had experience teaching in U.S. or Canadian universities. Many cultural opportunities are available to student participants.

The Budapest Semesters in Mathematics Program is offered through St. Olaf College, Northfield, Minn. Hungary has long been noted for the prominence of its mathematicians.

Fung, 17, is the son of Daniel Y.C. and Catherine Lee Fung, Manhattan.



"I'm worried. She says my raise is on the back burner. At home our back burner hasn't been touched in years."

Excellence in Food Science at KSU

Kansas State University recently celebrated the "Excellence in Food Science" program on the occasion of the installation of the new Food Science Graduate Program Chair, Len Harbers and Undergraduate Program Chair, Melvin Hunt in a day-long program in conjunction with the Kansas City IFT meeting as well as the KSU Food Science Seminar Series.

The day started with a tour of the internationally renowned American Institute of Baking and the recently renovated KSU Weber Hall (meat science laboratory). The Seminar speaker was the immediate past president of IFT, Paul Hopper who enlightened the 100 plus attenders on the subject "Health Claims--A Scientific and Business Dilemma". The day ended with a whole hog roast picnic hosted by the Food Science Club. Chair of the celebration was Daniel Y.C. Fung, a professional member of IFT. and immediate past president of CAFS.

留學生就業 市場趨勢 分析與檢討

梅雪松

留學生學
留學生學

成歸國貢獻智慧，引進

新科技，不但有補助政府發展高科技工業，也為國家建設奠定深厚基礎。本會自民國六十年七月接辦輔導留學生回國服務業務以來，不斷因應高級人力市場趨勢，致力開拓留學生之就業機會，截至本（七十九）年六月止，總共協助二一、〇一六人回國服務，而每年回國人數正持續增加中，今年上半年已有一、三七八人回國，較去年同期增加二五·二六%，全年預估回國人數將逾三千人。本文謹將近半年來回國服務留學生之基本資料及就業趨勢作一簡略的分析，並說明本會當前輔導的工作重點，提供給您作為回國就業時之參考。

壹、基本資料分析

七十九年上半年計有一、三三七人經本會協助回國服務，茲將他們的學歷狀況、任職機構、專長類科及留學國別等分別析述如下：

一、學歷狀況：在一、三七七人中，以具碩士學位者最多，計有一、二三五人，占總人數八九九%；博士有一三八人，占一〇·〇二%；其餘為研究但未獲學位者有四八人，占〇·二九%。

二、任職機構：
留學生中除有二八六八人占總人數二〇·七六%係自行就業、創業或由本會安排短期研究工作外，其餘以在民營企業任職者最多，計有三三八八人，占二四·五四%，在大專院校任教者緊次於後，計有三三三五人，占二四·三二%，其餘依序分別是研究機構一六六八人，占一二·〇五%，政府機關一五四八人，占一·一八%，公營事業九八八人，占七·一七%。

三、專長類科：以商科的人數較多，有四九八八人，占三六·一七%。其次為工科四一七人，占三〇·二八%。其餘依序為文科一四〇人，占一〇·一七%；教育科一三七人，占九·九五%；理科九三人，占六·七五%；法科四六八人，占三·三四%；醫科二七人，占一·九六%；農科一九人，占一·三八%。

四、留學國別：以留學美國者一、二三三人，占總人數八九·五四%比率最高，其次是日本一〇〇人，占七·二六%，其餘為英、德、法、泰、韓……等十餘個國家，共四四人，占三·二〇%。

貳、國內就業機會分析

本會經由各種資訊管道，積極為留學生蒐集各類就業機會以供參考聯繫；茲將近半年來本會所蒐集到一、四九九個就業機會依其所需學位、機構類別及所需專長作一分析：

一、所需學位：在一、四九九個就業機會中，以需碩士學位者所占比率最高，達七四·七八%，需博士學位者則占二四·〇二%。

二、機構類別：依統計，以來自民營企業求才比率最高，占五五·七〇%。其餘為政府機關二三·二二%，各級學校一九·三五%，公營事業一·七三%。

三、所需專長：以商科需求比率偏高，占四一·六九%，其餘依次為工科三九·九五%，理科七·三四%，文科四·九四%，法科四·〇七%，醫科三·三四%，教育科二·二〇%，農科一·八七%，美藝科一·七三%，海洋科〇·七七%。

參、綜合分析

鑑於國內教育普及，國民所得提高，國人出國留學意願趨強，致使出國人數快速增加；同時受到美國限制外國留學生就業措施影響以及國內工作待遇及研究環境日趨合理，使得留學生返國人數

亦逐年增加。而國內就業市場對高級人力需求的數量，亦不斷成長當中。雖然本會蒐集的就業機會不一定能準確反映出人才供需消長之顯著關係，惟從中也可得知，當前民營企業需求商科及工科人才甚殷，這是國內工商業蓬勃發展的必然結果。

肆、當前工作重點

為因應國內就業市場供需狀況之變遷，本會在協助留學生回國服務上，也採取若干擴大該類資訊流通的措施，其中較重要的有：

一、本會接到留學生申請回國服務資料後，立即鍵入電腦，並在最近一期國內外碩士以上人才通報一刊登，該通報每月發行一次，寄送國內各大專院校每一系所、政府機關、最具規模之公、民營企業，計五千餘個單位，以資直接延攬；此外，任何機構倘若登記求才，本會亦隨時將該項資料提供其作為選用人才之參考。

二、對留學生則於其提出申請起三個月內，按月寄送國內各機構求才資訊，讓其瞭解國內就業市場情形，並供聯繫可能之就業機會。

三、本會除在海外中心簡訊報導國內就業機會分析外，也另將若干中、長期求才之機會，編印成冊，按季寄送我國駐外機構、學術聯誼團體及同學會，請多加利用。（本文作者現任青輔會第三處編審）

A NEW FOOD SCIENCE BOOK

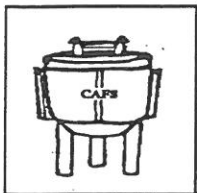
Fung, D.Y.C. and R.F. Matthews, Eds. 1991.

Instrumental Methods for Quality Assurance of Foods.

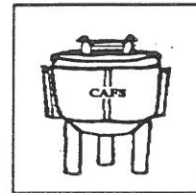
Marcel Dekker, Inc. Scheduled to be complete in April, 1991.

- Chapter 1. Rapid Methods and Automation for Food Microbiology
Daniel Y.C. Fung
- Chapter 2. Ion Chromatography for the Food Industry
Maurice R. Marshall, Ronald H. Schmidt and Bridget L. Walker
- Chapter 3. Gas Chromatography and Mass Spectrometry in Quality Control and Research
Gary A. Reineccius
- Chapter 4. pH and Ion Selective Electrode
John Comer
- Chapter 5. Modern Methods of Analyzing Mycotoxins in Foods
William G. Ikins
- Chapter 6. Metal Detection Systems
Alfred K. Frei
- Chapter 7. Machine Vision for Quality Control in the Food Industry
N. Ronnie Sarkar
- Chapter 8. Color Measurement and Interpretation
Frederick J. Francis
- Chapter 9. Viscosity Measurements in Foods
Malcolm Bourne and A. Rao
- Chapter 10. Laboratory Robotics and Automation
W. Jeffrey Hurst
- Chapter 11. Computer-aided Quality Control and Research in Thermal Processing of Canned Foods
Arthur A. Teixeira
- Chapter 12. Pattern Recognition Techniques for Food Research and Quality Assurance
Ike J. Jeon

A "Book signing" reception will occur at the National Institute of Food Technologists Meeting on June 3, 1991, Dallas, TX. Contact Fung [(913) 532-5654] concerning this free gala gathering.



華 美 食 品 學 會
CHINESE AMERICAN FOOD SOCIETY



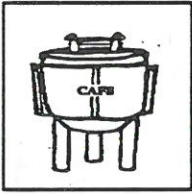
MEMBER (ACTIVE): Any person who resides in the USA or Canada, with close relation to Chinese culture, and holds a bachelor's degree or its equivalent in a field related to food science or technology or is actively engaged in food technology related professions for at least 3 years. An active Member shall have all rights and privileges of this Society.

STUDENT MEMBER: Any student who is enrolled in an institution of higher learning in the USA or Canada and is pursuing programs of study in or closely related to food science or an allied field. Student Members shall have all the rights and privileges of this Society except that they shall not vote or hold office.

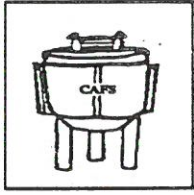
ASSOCIATE MEMBER: Any person who is interested in food science and technology but not classified as an Active Member or Student Member. Associate Members shall have all the rights and privileges of this Society except that they shall not vote or hold office.

LIFE MEMBER: Any active Member in good standing and has submitted an application for the Life Membership with the approval of the Executive Committee. Life Members shall have all rights and privileges of this Society.

SUSTAINING MEMBER: Any person or organization who financially supports the Society's operation. The sustaining membership entitles the individual or organization to designate one representative who will be given individual membership (active or associate member), a Certificate of Sustaining Membership and recognition in the Society's publications.



華 美 食 品 學 會
CHINESE AMERICAN FOOD SOCIETY



MEMBERSHIP APPLICATION

Name: _____ Name in Chinese: _____
(Individual Member or Representative of Sustaining Member, as you wish it to appear on certificate)

Professional Affiliation (or Name of Sustaining Member): _____

Business Address: _____

Telephone No.: _____ Fax No.: _____

Residence Address: _____

Telephone No.: _____ Fax No.: _____

Preferred mailing address: _____ Business, or _____ Residence

Education (Degree, Year, University/College, Major): _____

B.S.: _____

M.S.: _____

Ph.D.: _____

Present Position and Areas of Interest and Specialization: _____

Professional Experience: _____

Membership Dues of Calendar Year: _____

_____ Initiation Fee (\$10) (one time only, a handsome certificate will be mailed to you)

_____ Active Member (\$15)

_____ Student (\$5)

_____ Associate (\$15)

_____ Life (\$200) (one time only for life)

_____ Sustaining (\$200) including dues for one representative as
_____ Active Member or _____ Associate Member

Total Enclosed \$ _____ (Please make check payable to CAFS)

Applicant's Signature: _____

Certification (for student membership) that applicant is a student

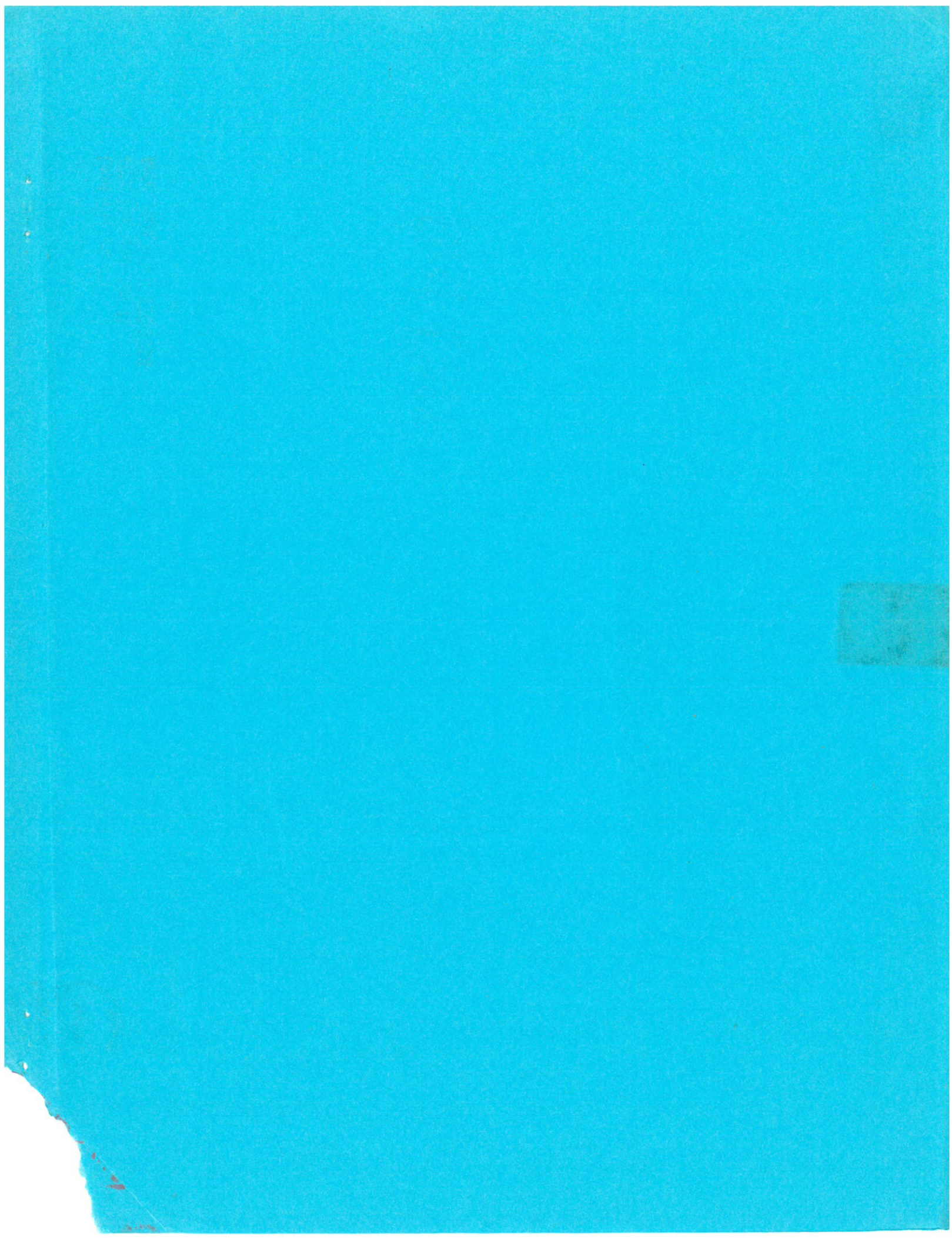
(signature and title of university faculty member)

Membership I.D. Code No.: _____ (to be filled by Treasurer).

Please return this form and payment to:

Dr. Shwu-Pyng T. Chen, CAFS Treasurer
Western Flavors and Fragrance
2001 Peraita Street
Oakland, CA 94566





E. Huang
Land O'Lakes, Inc.
4001 Lexington Ave. N.
Arden Hills, MN 55126-2998

First Class

0001 LIFE L
ANG, CATHARINA, Y.W.
110 WHIPPORWILL CIR.
ATHENS, GA 30605

SAINT P.
MAR 18 1991
MINN.