Strategies for High-Tech Academia Uprising in 21st Century

Bing Sheu, Chair Professor & University Strategy Advisor, National Chiao Tung University

and

Chung-Yu Wu, Dean of EECS College, Chin-Teng Lin, Associate Dean of EECS College, National

Chiao Tung University,

Bin-Da Liu, Professor, National Cheng-Kung University,

Mark Liao, Professor, Institute of Information Sciences, Academia Sinica,

Bill Tai, Jui-Lin Lai, Rong-Jian Chen, Professors, National United University

Abstract

Many factors directly affect the uprising in high-tech academia in the 21st Century. The major ones include, but not limited to, (A) governmental/institutional investment, (B) technical breakthrough, and (C) influential participation in professional societies. These factors are entangled among one another. The overall impacts are the product from (A), (B), and (C). If a modern weapon system is used as an example, then factors (A) and (B) are related to the design/development of powerful and precision war-heads. On the other hand, a capable delivery system, such as cruise missile or stealth bomber, will be the subject for factor (C). Similarly, each researcher will wish to make significant and long-lasting impacts to the scientific community. In this talk, we will examine factor (C) in great detail. Especially, an innovative and collaborative effort on "Globalization Leadership Professors Promotion Committee" (GLPPC) will be highly elaborated.

Executive Summary

As we all know, Japan is already the second largest financial contributor to the United Nations. Do you know why Japan is eagerly seeking a permanent seat at the Security Council at United Nations? The answer is very straight-forward: to be at an even more influential position to maximize the effect of contributions.

Do the following names sound anything special to you: (1) Prof./Dean Peter Wu as 2004-05 Vice President for Conferences of IEEE CAS Society, (2) Prof. Brian Liu as 2005-06 Vice President of Region-10 of IEEE CAS Society, and (3) Prof. John Rong-Jian Chen to serve on 2005 Editorial Board of IEEE Circuits and Systems Magazine? For (1), Dean Peter Wu is the first non-Regional VP from Region-10. For (2), Prof. Liu is the first Regional VP from Taiwan. For (3), Prof. Chen is the first grass-root Editorial Member on IEEE CAS Magazine from Taiwan. Their achievements are all parts of the GLPPC efforts. So far, there is no grass-root Editor-in-Chief of archival CAS Journals from Region-10, while there exist plenty such examples from Region 1-8. We wish that through the accumulated efforts in GLPPC, a further breakthrough on this subject can be made in not-too-far future.

Several GLPPC Divisions have been formed. The first Division was established at National Chiao Tung University in 2002. The second Division was at Institute of Information Sciences,

Academia Sinica in 2003. In this year, many new Divisions are formed, including the 3rd at National United University in Miaoli City, the 4th at National Cheng-Kung University in Tainan City, the 5th at I-Sou University in Kaohsiung County, the 6th at TamKang University in Taipei County, the 7th at Chang Gung University at Tao-Yuan County, and the 8th at National Sun Yat-Sen University in Kaohsiung City. The 2004 International Workshop on Efficient and Competitive Professors was successfully held in Hsin-Chu City during Dec. 4-5.

First, researchers are encouraged to seek promotion from IEEE Members to IEEE Senior Members if they have not done so. This approach is consistent with the policy at the IEEE headquarter. Next, researchers are encouraged to play active and even pro-active roles in the following areas.

(1) In Conference Activities:

Researchers can serve as an organizer and/or chair of special sessions. They can serve as the Review Committee Member (RCM) for the ISCAS symposium, or on Technical Program Committees or Organizing Committees for other conferences co-sponsored by the CAS Society. Next, they can participate on Panel discussion, to give tutorial talks. Eventually, they can deliver a plenary or keynote speech for the conference.

(2) In Publication Activities:

Researchers can serve as a reviewer to the manuscripts. Next, they can seek opportunity to serve as an Associate Editor. In some special occasion, they can propose and then serve as a Guest Editor on a Special Issue for emerging topics. Eventually, some of them can have the opportunity to serve as the Editor-in-Chief for Society Journals.

(3) On Technical Committees:

Researchers can join multiple technical committees that coincide with their research interest. They will have the chance to serve as Secretary, and then Chair-Elect of the given Technical Committee. Eventually, some of them can be elected to serve as Chair of the Technical Committee.

(4) In Regional Activities:

Researchers can be nominated to serve as a Distinguished Lecturer to give presentation in another country or in a different Region. They can serve as the Chair of a local Chapter. Next, they can participate in the Board-of-Governors election or in the Executive-Committee election for a VP position to make further service contributions. Eventually, some of them can have the opportunity to win the President-Elect position to lead the CAS Society.

In summary, uprising is a never-ending endeavor. The opportunity to present at Forum-II during 2004 ISCAS symposium provided us great stimulus to pursue the more efficient and highly competitive method.

Acknowledgement

We feel very thankful to the encouragement and supports from many sources, including but not limited to: presidents at many major universities, the key officers at Ministry of Education, and professional organizations such as IEEE. We especially would like to thank Ms. Wenling Huang (Senior Specialist at MoE) and Ms. Sophia Chen (Secretary to Prof. CT Lin) for their constant helps. The active researchers in many GLPPC Divisions make the fundamental contributions. Please note that the GLPPC effort is open for motivated researchers from all over the world to join and contribute. Together, we can achieve a brighter tomorrow for Higher Education in the 21st Century.