

Editorial

Guest Editorial

THIS ISSUE is devoted to the operation of Nanyang Technological University in Singapore. In asking this university to expose their philosophy and ways of approaching engineering education, the editor thought that here is a modern institution which has the ingredients of representing the phenomenal economic success of the Little Tigers of Asia: Hong Kong, Korea, Singapore and Taiwan. The Little Tigers are challenging Japanese hegemony in high technology products. Nanyang Technological University warrants our attention due to its unique development history. It started up as a technological education institute setting up practical engineering education as a pillar in its basic approach. It then became a full fledged Technological University—maintaining a strong practical education element in its programs. The concept—now being adopted or at least considered by many technological universities around the world—has been extremely successful, as is documented by the rapid success and expansion of Nanyang. The success of Nanyang is particularly important in the current soul searching climate of higher engineering education. These times of reflection are due to a series of related events. First and foremost is the downfall of the barriers between East and West. In Europe, this is leading to a revolution in the capabilities of Central and Eastern European technical universities. While there were always excellent theoretical accomplishments in these countries equipment and structure were hopelessly outdated. This is now changing fast—the countries of the former Soviet bloc are becoming equal partners in technological developments. This means that the American-Japanese-European supremacy in technology may be facing real challenges. Concurrently, but starting sooner, Asia outside Japan has also been advancing at a tremendous pace. Now these countries are going to be challenged by developments in the former eastern bloc oriented South East Asian countries such as Lao and Vietnam (see the paper by Coowar *et al.* on developments in Lao in Vol. 11,2). All this is in addition to immense capacities being developed in China. Moreover, the highly industrialized countries in the West, i.e. in Europe and the USA, are facing a crisis in engineering jobs. This crisis is reflected in engineering education. The number of jobs as well as the number of students in engineering is experiencing a nose dive in the high production cost countries. This means that it is time to rethink educational strategies. Nanyang provides a case in point for an institution working in a technology friendly climate. Moreover, it is an institution with a streamlined organization, excellent planning and careful staff selection. I am sure that other technological universities will find that Nanyang represents an example to watch.

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M. S. Wald