

Engineering: Premium career for School-leavers

By J. B. Muller

With little or no career guidance in the schools' system, parents and secondary school leavers are faced with an enormous predicament. Which way to go? How to choose both a viable and sustainable career that guarantees a rewarding future?

Let's go back a bit. The outstanding and significant civilizations of Man developed on the banks of the great rivers: We have the Nile in Egypt, the Tigris & Euphrates in Mesopotamia [modern day Iraq] the Indus and the Ganges in India; the Yangtze-kiang, Yellow and the Hwarig-Ho in China, and Sri Lanka's own unique hydraulic civilization.

To do these things ancient peoples built canals and channels, reservoirs to store water, cities with sanitation and sewage systems, great palaces and religious edifices, and all of them had to develop and utilize engineering skills. Simultaneously, they developed mathematics, writing, astronomy, water management, animal husbandry and agronomy. Undoubtedly, the foundation for their amazing achievements was engineering. It is, therefore, the fundamental underpinning of civilization itself. You would not be reading this page if it were not for the engineering, in all its complexity, that makes it possible to print this page and put it in your hands!

To any young man or woman with the idealism to change the world there is no nobler profession than that of engineering. Just think, where would we all be if not for electricity, clean water, sewerage, roads and railways, ships and planes, buildings, air-conditioning systems, structures, bridges, telecommunications, radio & television, electronic banking, information & communications technology and the thousands of other facets of modern life? Back in the Stone Age, living in caves, hunting and gathering for our sustenance! Indeed, if not for engineering, there just would be no civilization at all!

Now, a young school-leaver considering a career does not have to try entering one of the three universities that have engineering faculties (Peradeniya, Moratuwa and Ruhuna) because the competition is so intense and the places so few. Rather, he or she could follow professionally designed and conducted courses at the Institution of Engineers, Sri Lanka [IESL]. These courses are in three parts, Part I, Part II, and Part III, the passing of which entitles the successful candidate to apply for and be admitted as an "Associate Member. After a period of apprenticeship under fully qualified professional engineers the 'AM' is enabled to apply for and obtain the status of a fully-fledged 'chartered engineer' and to use the letters 'C.Eng.' after his or her name.

Passing through the portals of the IESL is equivalent to obtaining a university degree and the degree awarded by the IESL is recognized on par with university degrees, there being no diminution whatsoever in the quality of the degree earned. Government and the private sector acknowledge it as a valid qualification and it is one that is recognized internationally.

The disciplines in which one may major are many, ranging from Aeronautical to almost everything else that one could think of. The popular areas are Civil and Structural, Electrical, Electronic, Mechanical, Marine, Chemical, Automobile, Nuclear, Telecommunications, Irrigation, Agricultural & Plantation, and Metallurgy. The choices are many and varied, allowing for specialization in a variety of sub-disciplines.

Once a young person becomes an engineer that is not the end. Unlike the university, the IESL has an ongoing programme known as CPD - Continuous Professional Development - which keeps the young engineer abreast of the latest developments in his or her discipline and that makes a big difference to a person's career. Yes, engineering IS the way to go!

A career in Engineering also admits the young engineer into a worldwide fraternity in one of the largest and most widespread professions in the world. The opportunities therein are unbelievable, if the person is both dynamic and proactive, in carving out a satisfying future. The thrust of this is that a young person can make a difference, can change lives and lifestyles and, in doing so, change the world. That's what engineering has been about from the dim mists of prehistory. It will continue to be the backbone of civilization into the foreseeable future, too.