Editorialⁱ

Humanities and Social Sciences Education: Synergy between Technology & Society



It is imperative that undergraduate engineering education focuses on the interface between technology and society, in addition to the intensive technical knowhow. The interdisciplinary perspective of Social Science and Humanity courses has a pivotal role to play in addressing the broad domain of knowledge so as to understand societal needs and humane values. This is accomplished by knowledge acquired through a vast range of disciplines, to name a few, economics, finance, management, sociology, gender studies, political science, psychology, philosophy, history, and

linguistics, covering topics on rural/urban development, cultural processes, governance, gender sensitization, conflict management, heritage, poverty alleviation, climate change, and globalization. This endeavour helps future technocrats in developing a holistic personality that enables them to understand the intricate nuances of societal patterns and behavioural sciences, thereby making them well equipped to handle challenges in life.

Exposure to Humanities and Social Science education leads to creativity and innovation. Science and technology is embedded in the social and cultural milieu, and it is thus important that students of undergraduate engineering programme are ingrained into the social environment, which is the base for practising the technology learnt. Humanities and Social Science courses are instrumental in instilling critical thinking, analytical approach, and good humane values amongst students, amidst the pursuit of knowledge, active-learning, community outreach and in building skills to gain hands-on experiences. Understanding of human nature, society, culture and institutions is central to Social Science education. This helps students to prepare for personal enrichment, pave way for productive careers, achieve enlightened citizenship and lifelong learning, along with skill development so as to face challenges in real-life situations with ease and confidence. Meanwhile, empirical research and field studies help in understanding social realities, learning research methodology in Social Sciences, computational application in data analysis, preparation of reports and making presentations. The use of multi-dimensional approaches in an integrated framework helps in impact assessment of developmental programmes. Impact assessment provides a framework for balanced considerations of the social, economic, environmental and health impacts of development interventions, and in this way, it strengthens students' analytical capacity and assessment skills by making them work through ground realities.

Technical education that is accompanied by value based courses highlighting moral and social values helps them to become fine human beings armed with professional knowledge. The key point is that technocrats must not be restricted to merely engineering and technological knowledge; they must also develop sensitivity to the socio-cultural environment, thereby bringing in greater cohesiveness between technology and society.

It has generally been observed that Humanities and Social Science courses are often perceived as soft courses, take a back seat in engineering and technological institutes, and this issue needs to be addressed.

While imparting engineering and technology education, it is worthwile to take note of the importance of Humanities and Social Sciences in building sensitivity to societal variables, learning scientific pursuits in the backdrop of Millennium Development Goals, identifying gaps in amalgamation of scientific knowledge and social change, promoting multidisciplinary approaches to research with a synergy between technology and society, encouraging problem solving approach that bridges the gap between theory and practice, as well as sharing the best practices in providing knowledge for holistic development of budding engineers and technocrats.

In this era of inter-disciplinary education, the application of science and technology to the issues of societal concern would be instrumental in providing holistic knowledge to students of professional stream.

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