

INSTITUTE OF GENETIC ENGINEERING

2019-2020

BEST PRACTICE – 1 RESEARCH-an integral part of the CURRICULUM –

Engaging in research while studying at the college level significantly impacts student's growth and development. Students generally acquire only limited knowledge through curriculum based lectures in classrooms, syllabus based practical in laboratories, and limited reference work in libraries. This does not expose students to real-life situations. Hence, the adoption of scientific techniques, for acquiring knowledge becomes essential for students.

For this reason, the institute has adopted few initiatives

a) In our present curriculum, university has agreed to include Research Methodology as a skill enhancement course (SEC) for all second year students (B.sc). This course objective - is at the end of this course students should be able to understand some basic concepts of research and its methodologies, identify appropriate research topics, select and define appropriate research problem and parameters, prepare a project proposal v and methods of writing a research proposal as well as writing papers and thesis.

b) The final year students in their final semester has to go for a short project under their discipline specific elective course of a credit value of 6 which is similar to a core course of theory and practical. This short project is mandatory but they can take varied topics like microbial, plant, animal, or medical biotechnology or genetics or purely molecular based work or computer based work or dry lab work like bioinformatics based work. After completion they have to present their project work before an external subject expert to get properly evaluated.

Final year PG students also has similar norms for a mandatory project work.

The whole process offers a chance for better learning and understanding of a specified topic and presenting this before a group of faculties, experts and students help them to acquire confidence for their future. Provision for research projects at the UG level will enable the students to adopt a scientific approach to the study of any problem, develop analytical skills for data collection/ experimentation and analysis of data as well as a thorough learning of scientific report preparation and analytical presentation.

BEST PRACTICE 2- Extension activities -THALASSAEMIA AWARENESS CAMPAIGNS

Thalassaemia is the number one genetic disorder in India and is very common in Eastern part of India-

especially in West Bengal. There are numerous families who are suffering also from social problems due to this disease – like rejections or social taboos from near relatives, neighbours, in-laws, husbands etc.

The females especially who are carriers of this disease are often face rejection by their male partners both before and after marriage. it's often go to such extreme that an affected child often got rejected by their own father and family where only mothers have to carry on the treatment and care of the children.

The most interesting aspect of this is that, though the disease is preventable and when the developed world has taken appropriate preventive measures and successfully reduced this problem. However, in our country, prevention effort has

not succeeded so far due to lack of community engagement which results from lack of awareness. Since Thalassemia Foundation is tied up with this institute so in this context, it was felt that students should reach out to community and engage themselves in Thalassemia prevention strategies in order to reduce the burden of disease. The thalassemia unit is engaged in all sorts of awareness program for Thalassemia and also the control and prevention strategies along with daily lifestyle strategies for disease control among all populations. Mass awareness campaign had been done in every year on "World Thalassaemia Day" (8th May) and students and teachers participated in this programme.