

AN E-MAIL INTERVIEW WITH PROF. LILA KANTA NATH

Prof. (Dr.) Lila Kanta Nath is the founder teacher and Head of the Department of Pharmaceutical Sciences, Dibrugarh University, Dibrugarh, Assam. He offered his service as Head of the Department during 1983-1985 & 1989-1997. He joined in the post of Professor in the year 1996. He also served as Dean, School of Science and Engineering, Dibrugarh University during 2014 -2018. After completing academic qualifications in Pharmacy from Dr. H. S. Gour Vishwavidyalaya, Sagar (M.P.), India; he stepped into research field at Jadavpur University and has been awarded Ph. D. Degree of Jadavpur University in the year 1991. His research interests include Pharmaceutics, Novel Drug Delivery System, and Formulation development. Sixteen Ph. D. scholars have completed their research under his supervision. He has completed 12 research projects funded by AICTE, DBT, DST and UGC. Prof. Nath has published more than 100 research and review articles in journals of national and international repute. He is associated with several national organizations and committees like PCI, AICTE, APTI and IPA as member.



Chief Editor: Sir, as you are a pioneer academician of higher education and research in pharmacy of this region. I would request you to edify on the development of pharmacy education and research in this region based on the following framed inquiries for greater interest of upcoming pharmacy professionals.

1. Would you please drop few lines on the development and changes related to pharmacy education and research at Department of Pharmaceutical Sciences, Dibrugarh University?

Ans: B. Pharm. course was started by Dibrugarh University in the Department of Pharmaceutical Sciences in 1983 and this was the only Degree course in Pharmacy at that time in the entire North Eastern region of the country. The Department could not show remarkable growth and development till the year 2001. So many factors may be considered as obstacles in its development, a few of them are dearth of qualified persons for teaching staff, lack of senior faculty members for the higher posts, insufficient fund for infrastructural development, working faculty member were yet to be awarded their Ph.D. degree etc. However, the Department could provide quality education at degree level as appreciated by experts in this profession in the country and the Pharmaceutical Industries. During the period from 1983 to 2000 some of the existing faculty members obtained their Ph.D. degree and after inception of the M. Pharm. course in three specializations in 2001 the Department had started its development both in imparting education and research activities. A few more number of teaching posts have been created, some existing faculty members were promoted to higher posts, faculty members have been able to bring fund for infrastructural development from various funding agencies through Modernization and R&D projects, research activities of the faculty members have been recognized by reputed journals, number of students have been awarded Ph.D. degree under the guidance of the eligible faculty members, few faculty members have been granted post-doctoral studies by the MHRD at abroad, few faculty members have presented their research findings in seminar and conferences at abroad and now, the Department is in the position 18 of the list of NIRF ranking in India.

2. How would you like to evaluate the current setting of pharmacy education in NE India?

Ans: The present scenario of Pharmacy education in the North Eastern states of India is quite satisfactory. The numbers of Pharmacy Institute have been increased remarkably during the last five years or so. Till 2013 there were four Govt Institute and four private Institute offering Degree course in Pharmacy in the entire North Eastern states. Now in 2019 the number of Govt Institute remains same, but the private Institute have been increased to ten in number. Now, the demand of human resource in the profession of Pharmacy in this region would probably be fulfilled by those Institutes. The important issue which need immediate attention of these Institutes is to produce quality personnel. Secondly, the Governments of North Eastern states should also invite the Industrialists to set up more Pharma Industries in this region to accommodate this huge number of Pharmacy graduates.

3. In terms of quality, do you feel that the research activities in the north-eastern states have improved during the last decade?

Ans: Quality of research depends on the quality of the researchers, facilities available for research and scope of the resources for research. In the north-eastern states the scope of research in Pharmacy is abundant as this region is a basket of flora and fauna most of which have medicinal value. To explore this medicinal world we have no sufficient infrastructural facilities. However, the organizations under CSIR, Govt of India within this region have contributed much in medicinal plants and herbal drug research during the last decade. The quality of research in the Department of Pharmaceutical Sciences, Dibrugarh University has also been much improved during the past decade.

4. In this region, to which specific area priority should be given?

Ans: Research in Pharmaceutical Sciences includes exploration of medicinal plants leading to isolation of lead molecules, herbal drug research, development of drug delivery systems and chemical synthesis of drugs and Pharmaceuticals. In my opinion, priority should be given to the exploration of medicinal plants of this region including herbal drug research because, this field has much more scope than the other areas mentioned.

5. In your opinion, how the students of pharmacy should prepare themselves for the growth of their career in view of increasing number of pharmacy institutes in this region?

Ans: This is the age of competition and quality is the main weapon for competition. Self-motivation, acquire knowledge through hard work, exposure to the industrial environment , guidance of the experienced faculty members are some of the ways and means in which the students should concentrate themselves in building their career within the huge number competitors.

6. In India, which particular area in formulation development would be beneficial and which of the diseases need more attention?

Ans: The research in Formulation Development will bring benefits to those areas-

- a) Prolongation of therapeutic action of some drugs in the body
- b) Targeting of some drugs to the specific organs
- c) Overcome the stability problems against various environmental and enzymatic actions
- d) Reduce toxicity of anticancer drugs

The diseases which need more attention on research are- cancer, diabetes, heart diseases and communicable diseases.

7. As regards to facility for pharmacy education, what is the current status in our country?

Ans: In terms of research facilities the current status of Pharmacy Education in India is quite satisfactory. Through establishment of 5 more NIPER during the last decade Govt of India has given proper attention in creating facilities in drug development research. Ministry of HRD, Govt of India is also providing sufficient fund through DST, DBT, ICMR, AICTE to the Educational Institutes for research in drug development and discovery. Now, the research facility in India is almost comparable to the developed countries of the world.

8. What is the possibility for development of pharmaceuticals from natural source available in this region?

Ans: In the North Eastern region of India there are lots of possibilities for development of Drugs and Pharmaceuticals from natural sources as this area is full of medicinal plants and herbs, a few of them have been explored and most of them are still unexplored. The plants and herbs with hidden therapeutic constituents, Pharmaceutical excipients and nutraceuticals need extensive research for their utilization.

9. What initiatives should be taken for expanding/improving research in the north-eastern region?

Ans: To improve the research in the North Eastern States the State Govts and the authorities of the Educational Institutes should take some

combined initiatives. The Govt. should be convinced to setup a Research Board/ Centre in Drugs and Pharmaceuticals dividing in to 3 to 4 units at different states of NE region. Selected Scientists are to be given the responsibly as Chairpersons/ Directors to prepare the Projects and Plans of research. Several Research Associates, Research Assistants and Scholars are to be selected/ appointed to carry out the research. The outcome is to be assessed time to time for modification and improvement. The Institutions in this field should be provided sufficient facilities to carry out basic research to develop human resources competent for carrying out research in those Research Boards.

10. What should be the short term and long-term goals for a pharmacy researcher?

Ans: The short term goal of research in Pharmaceutical Sciences would be to develop drugs for controlling Epidemic and Communicable diseases like, malaria, encephalitis, dengue, bird-flu etc. The long term goal of the research in Pharmaceuticals would be to develop drugs and pharmaceuticals for better treatment of incurable diseases like diabetes, cancer, heart diseases etc.