North-Eastern Hill University

(A University with Potential for Excellence)
NAAC Reaccreditation (2009): 'A' Grade
Shillong 793 022 India



Annual Quality Assessment Report 2012-2013

PART - A

The IQAC was entrusted with the responsibility of scrutinizing Self Appraisal Reports of teachers desirous of being promoted to the next stage. This responsibility was successfully executed during the period.

PART - B

1. Activities reflecting the goals and objectives of the institution:

The University has been regularly conducting UG and PG courses and research degree programmes since its inception.

2. New Academic Programs initiated (UG and PG)

The University established new Departments for conduct of B.Tech. degree programmes in Nanotechnology, Biomedical Engineering and Energy Engineering

3. Innovations in curricular design and transaction:

University initiated steps for introduction of semester system at the undergraduate level.

4. Inter-disciplinary Programs started:

No new programmes were taken up during the year under review.

5. Examination reforms implemented:

Computerized tabulation and result preparation implemented.

6. Candidates qualified: NET/ SLET/ GATE etc.:

Sixty students with UGC/CSIR NET eligibility joined Ph.D. programmes in various disciplines.

7. Initiative towards faculty development Programs:

University regularly conducts Orientation/ refresher courses through its Academic Staff College for the benefit of Faculty.

8. Total number of Seminars/ Conference/ Symposia/Extension Programmes etc.:

Attended - 40, Organized - 27

9. Research Projects: New Projects – 09, Completed Projects – 15, Ongoing Projects – 24, Awards – 01

10. Patents generated, if any:

None

11. New Collaborative Research Programs:

CENTRE FOR DISTANCE EDUCATION

India: The Centre conducting the following courses on Special Education Programme in collaboration with the Rehabilitation Council of India, New Delhi.

B.Ed. – SEDE

Post Graduate Professional Diploma in Special Education (PGPD-SEDE)

Foundation Course on Education of Children with Disabilities (FC-SEDE)

CENTRE FOR SCIENCE EDUCATION

Faculty Member	Collaborator			Arc	ea of Collabora	ation	
Prof. P. K. Patra	Prof. Satish Kumar,		Nanophysics,	mechanical	properties	of	
	Department of Physics,		carbon nanotub	oes			

	NEHU, Shillong	
Prof. M.S. Bisht	Prof. S. Rama Rao,	Molecular and cytogenetical analysis of
	Department of Biotechnology	Citrus plants in North-East India, Organic
	and Bio-informatics, NEHU,	garbage recycling and reuse.
	Shillong	
Prof. M.S. Bisht	Prof. C. Nirmala, Botany	Nutritional analysis of bamboo shoots,
	Department, Panjab	promotion of bamboo as health food in
	University, Chandigarh	North-East India.

DEPARTMENT OF ANTHROPOLOGY

India: Dr. B. T. Langstieh collaborated with Dr. L. N. Lyngdoh, NEIGHRIMS, Shillong and Dr. K. Vasantha, NIIH, Mumbai, for DBT Twinning project for Northeast India.

Prof. R. Khongsdier collaborated with Dr. S. Bisai and Dr. K. Bose, Vidyasagar University, for the project on Body composition in relation to obesity and associated factors among adolescents in Meghalaya and West Bengal.

Abroad: Dr. B. T. Langstieh collaborated with: (i) Prof. Maria Sasvari-Szekely and Dr. Csaba Barta, Institute of Medical Chemistry, Molecular Biology and Patho-Chemistry, Semmelweis University, Budapest, Hungary and Dr. Anna Szekely, Institute of Psychology, Eotvos Lorand University, Budapest, Hungary, for the project on psychogenetics, (ii) Prof. Donna Leonetti and Dr. Geoff Kushnick, Department of Anthropology, University of Washington, Seattle, for the project on human behavioural ecology.

Prof. T. B. Subba and Dr. G. Ranjan collaborated with Dr. J. Seberg, Department of Anthropology, Aarhus University, Denmark, for the project titled "Nepal on the Move: Conflict, Migration and Stability."

DEPARTMENT OF ENVIRONMENTAL STUDIES

Abroad: Prof. Devesh Walia has research collaborations with Dr. P. Banerjee, NTU, Singapore.

Prof. B.K. Tiwari has research collaboration with Professor Wolfgang-Albert Flugel, Insitut fur Geographie, Lehrstuhl fur Geoinformatik, Geohydrologie und Modellierung, Friedrich- Schiller- Universitat Jena, Lobdergraben 32, 07743 Jena.

DEPARTMENT OF GEOGRAPHY

(1) Indo-Japan Collaboration with Disaster Prevention Research Institute, Kyoto University (Japan), Team Member: Prof. H.J. Syiemlieh and Prof. L. Cajee and Prof. S. Singh. (2) Fredrich-Schillar University, Jena, Germany, B.S. Mipun and B.K.Tiwari.

DEPARTMENT OF LINGUISTICS

The faculty members collaborated with several national and international institutes like: (1) International: Australian National University, Australia; and Nanyang Technological University, Singapore. (2) National: Central Institute of Indian Languages, Mysore; CDAC-Pune and Language Division, Kolkata.

Dr. Umarani Pappuswamy and Mr. Bijoy L. Dhanwar: Consultancy services to the Mother Tongue Survey of India, a mega project undertaken by the Language Division, Kolkata.

DEPARTMENT OF BIOCHEMISTRY

Three collaborative projects of Prof. D. Syiem, Prof. A. K. Singh & Dr. M. B. Syiem under DBT-Twining are continuing in the department. Two other collaborative DBT-funded research projects are running in the laboratory of Dr. T. Tripathi. There are also research collaborations at individual level with the following institutes: University of California, USA; Institute of Enzyme Research, Japan; Toho University, Japan; Research Centre, Juelich, FRG; Osaka University, Japan; University of Cambridge, UK; Newcastle University, UK; JNU, BHU, etc.

DEPARTMENT OF BIOTECHNOLOGY & BIOINFORMATICS

India: 1. Bose Institute, Kolkata and Prof. A. Chatterjee. 2. NIPER, Chandigarh and Prof. A. Chatterjee. 3. National Bureau of Plant Genetic Resources, New Delhi (ICAR) and Prof. S. R. Rao. 4. A collaborative research work in the field of microbiology on characterization of novel metal tolerant gene(s) has been going on between Dr. Celin Acharya of BRNS-BARC and Dr. SR Joshi. 5. Indian Institute of Technology (IIT) Kharagpur and Dr. A. Bhattacharjee. 6. University of Madras and Dr. A. Bhattacharjee. 7. A collaborative research work in the field of microbiology-endophytes on characterization of novel endophytes and their anti-cancer properties has been going on between Dr. A. Chattopadhyay of VisvaBharati and Dr. SR. Joshi.

DEPARTMENT OF BOTANY

India: Jawaharlal Nehru University, New Delhi.

Abroad: Freiberg University, Freiberg, Germany University of Ljubljana, Slovenia.

DEPARTMENT OF ZOOLOGY

India: Prof. V.Tandon collaborated with JNU, New Delhi: International Centre for Genetic Engineering and Biotechnology, New Delhi; Manipal Institute of Biomedical Sciences; Aravind Eye Hospital, Madurai.

- Prof. R. N. K. Hooroo collaborated with Prof. S. K. Dutta, Department of Ecology, Indian Institute of Sciences, Bangalore.
- Prof. N. Saha collaborated with Dr. Manas Kumar Santra, National Centre for Cell Sciences, Pune.
- Prof. B. Roy collaborated with Dr. Rakhi Chaturvedi, IIT, Guwahati, Assam and Prof. S. P. Sinhababu, Visva-Bharati University, Santiniketan, West Bengal.
- Prof. A. S. Dixit collaborated with Prof. Vinod Kumar, Delhi University, New Delhi and Prof. Sangeeta Rani, Lucknow University, Lucknow.
- Dr. B. Das collaborated with Dr. Amit Sharma, International Centre for Genetic Engineering and Biotechnology, New Delhi, Prof. K. Satyamoorthy, Manipal University, Manipal, Prof. S. Mishra, ILS, Bhubaneshwar, Odisha, Dr. A. Kataki, BBCI, Guwahati, Assam and North Eastern Indira Gandhi Regional Institute of Health and Medical Sciences.

Abroad: Prof. R. N. K. Hooroo collaborated with Prof. I. Das, Sarawak University, Malaysia.

- Prof. N. Saha collaborated with Prof. Dr. D. Haussinger, Department of Gastroenterology, Infectiology and Hepatology, Heinrich-Heine University of Dusseldorf, Germany.
- Prof. A. K. Yadav collaborated with Dr. Andreas-Schmidt Rhaesa, University of Hamburg, Germany.
- Dr. B. Das collaborated with Dr. Rakesh Kumar, Professor and Chairman, Department of Biochemistry and Molecular Biology, Catharine Birch & William McCormick Chair, Director Institute of Coregulator Biology, Washington, USA and Dr. V. Ferro, SIPBS, Strathclyde University, Scotland, UK.

DEPARTMENT OF CHEMISTRY

- Prof. K. Ismail has academic collaboration with (i) Dr. P. A. Hassan and Dr. V. K. Aswal, Bhabha Atomic Research Centre, Mumbai, and (ii) Dr. S. Mahiuddin, North-East Institute of Science and Technology, Jorhat, Assam.
- Prof. R.A. Lal is in collaboration with Dr. A. Kumar, Faculty of Science and Agriculture, The University of West Indies.
- Prof. K. M. Rao has academic collaboration with Dr. Therrien Bruno, Institut de Chimie, Universite de Neuchatel, Switzerland and Dr. Yurij Mozharivkyj, McMaster University, Ontario, Canada.
- Dr. A.K. Chandra has research collaboration with the Quantum Chemistry Group of the University of Leuven, Belgium.
- Dr. T. S. Basu Baul has academic collaboration with Universita di Palermo, Italy; Virije Universiteit Brussel, Belgium; University of Zurich, Switzerland; Pharmachemie BV, Haarlem, The Netherlands; Universita di Camerini, Italy; The University of Texas at San Antonio, USA; University of Malaya, Malaysia; University of the District of Columbia, USA; Universiti Sains Malaysia, Malaysia.
- Dr. M.K. Sahoo is collaborating with Prof. R. N. Sharan, NEHU, and with Dr. D. B. Naik, BARC, Mumbai.
- Dr. S. Mitra has research collaboration with Dr. D. Kumar, BITS, Pilani, with Dr. A. Bhasikuttan, BARC, Mumbai, and with Dr. S. Jenkins, College of Chemistry and Chemical Engineering, Hunan Normal University, Changsha, Hunan 410081, China.

DEPARTMENT OF PHYSICS

- Prof. B. M. Jyrwa collaborated with Dr. H. Naik, Radiochemistry Division, and with Dr. Suryanarayana, Nuclear Physics Division, BARC, Mumbai, in generating nuclear data for compilation.
- Prof. Satish Kumar collaborated, for research work with Dr. P. K. Patra, Centre for Science Education, NEHU, Shillong.
- Prof. A. Saxena has collaborations with (a) R. J. Buenker and H. P. Liebermann, Bergische University, Wuppertal, Germany; (b) D. Walia, Department of Environmental Science, NEHU, Shillong.

DEPARTMENT OF BASIC SCIENCES AND SOCIAL SCIENCES

India: Dr. H. Choudhury has collaborative research with (i) Prof. P. Tandon and Dr. S. Kumaria of Department of Botany, NEHU, Shillong on Micropropagation of *Nardostachys grandiflora* and *Malaxis wallichii*, two threatened medicinal plants of Northeast India, (ii)

Prof. S. K. Barik, Prof. N. Venugopal and Dr. M. C. Das of Department of Botany, NEHU, Shillong, and Dr. A. Chettri, Sikkim University, Gantok, Sikkim and Dr. K. K. Singh, GBPIHED (Sikkim Unit) Sikkim on Preventing extinction and improving conservation status of threatened plants through application of biotechnological tools and (iii) Dr. S. Kumaria of Department of Botany, NEHU, Shillong and Dr. S. Menon of Herbal Research Lab., Ramnarain Ruia College, Mumbai, Maharastra on Phytochemical profiling, molecular characterization and conservation of *Flemingia vestita:* Endemic medicinally important plant of Northeast India.

Dr. K. Upadhaya has collaborative research with Prof. N. K. Chrungoo and Dr. S. Kumaria of Department of Botany, NEHU, Shillong, Dr. P. Kumari of BSI, Howrah, West Bengal on Preventing extinction and improving conservation status of threatened plants through application of biotechnological tools.

12. Research grants received from various agencies:

Funding Agency	Total Funding (Rs. In Lacs)
ICSSR, NER, Shillong	Rs. 50,000
MRB, Shillong	Rs. 34,000
SBI, Shillong	Rs, 15,000
Indian Institute of Dalit Studies, New Delhi	Rs. 2,50,000
National Council of Applied Economic Research (NCAER)	Rs. 2,77,026
New Delhi	
Indian Council of Social Science Research (ICSSR)	Rs. 50,000
MHRD, New Delhi	Rs. 6,30 Lakhs
UGC, New Delhi	Rs. 4.22
MoPFI, New Delhi	Rs. 7.95
DST, New Delhi	Rs. 5.61
Ministry Of Environment and Forests, New Delhi	Rs. 8.930
Ministry of Water Resources, New Delhi	Rs. 5.470
UGC	Rs. 3.500
DRDO	Rs. 3.140
Ministry of Earth Sciences	Rs. 21.898
North Eastern Council, Shillong	Rs. 55.000
National Biodiversity Authority, Chennai	Rs. 2.100
DST-FIST: PURSE Programme	Rs. 2.50
International Seminar	Rs.7.92
Individual Projects	Rs. 17.84
Wildlife Trust of India	Rs. 1.07
ICSSR	Rs. 1 Lakhs
Ministry of Communication & Information Technology	Rs. 78.11
ICSSR, CIIL New Delhi	Rs. 4.70
DST-PURSE	Rs. 6.0 Lakhs
UGC-DRS-II	Rs. 4.0 Lakhs
DBT	Rs. 72.0 Lakhs
ICMR	Rs. 8.5 Lakhs

DST-SERB	Rs. 9.0 Lakhs
DST	Rs. 5.57 Lakhs
BARC-BRNS	Rs. 12.5 Lakhs
UGC	Rs. 8.55 Lakhs
DBT Twining projects	Rs. 80.43 Lakhs
DBT, Govt of India	Rs. 282.33 Lakhs
DST-FIST	Rs. 51.00 Lakhs
DBT-Strengthening	Rs. 04.00 Lakhs
DST-PURSE	Rs.06.00 Lakhs
ICAR/NAIP	Rs. 12.30 lakhs
DIT	Rs.54.10 lakhs
NEC,DoNER	Rs. 16.00 Lakhs
DBT-Biotechnology	Rs.22.00 Lakhs
DBT-Empowerment	Rs. 56.14 Lakhs
DBT-HUB	Rs.124.79 Lakhs
CAS	Rs.10.80 Lakhs
UGC, DBT, ICMR-ICAR, MoE&F, DST	Rs.575.51 Lakhs
DST/DAE/BRNS/CSIR/UGC/DIT/DBT	Rs. 132.0 Lakhs
DST-PURSE	Rs. 6.00 Lakhs
Fund received for holding Symposium /Chemistry	Rs. 6.00 Lakhs
BRNS (Dept. of Atomic Energy)	Rs. 3,26,700 Lakhs
BRNS (Dept. of Atomic Energy)	Rs. 4,36,025 Lakhs
Dept. of Science & Technology (FIST Program)	Rs. 6.75 Lakhs
UGC for DRS-I SAP (Project)	Rs. 5,19,983 Lakhs
SAP-DRS Phase III grant from UGC	Rs. 5,20,000 Lakhs
DIT,GoI	Rs. 10.944 Lakhs
UGC, New Delhi	Rs. 40 Lakhs
DST, Govt. of India, New Delhi (Non Plan)	Rs. 5,00,000 Lakhs
(Plan)	Rs. 29,55,000 Lakhs
National Board for Higher Mathematics (Dept. of Atomic	Rs. 11.25 Lakhs
Energy, Govt. of India,) Library grant to Mathematics	

13. Details of Research Scholars (Ph.D)

Departments	No. of Research
Department of Economics	01
Department of Library and Information Science	01
Department of Management	01
Department of Education	13
Department of Education (Tura)	02
Department of Adult & Continuing Education	01
Department of Anthropology	06
Department of Environmental Studies	02
Department of Geography	06
Department of Rural Development and Agricultural Production	01
Department of English	05

Department of English (Tura)	04
Department of Garo	01
Department of Hindi	05
Department of Khasi	02
Department of Philosophy	02
Department of Biochemistry	03
Department of Biotechnology and Bioinformatics	03
Department of Botany	10
Department of Zoology	05
Department of Chemistry	10
Department of Mathematics	01
Department of Physics	05
Department of Statistics	01
Department of Cultural and Creative Studies	04
Department of History	02
Department of Political Science	04
Department of Sociology	01

14. Citation Index of Faculty Members and Impact Factor:

Research publications of faculty have been widely cited. The impact factors of the Journals where such work was published ranged between 1 to 5.

15. Honors / Awards to the Faculty:

DEPARTMENT OF ECONOMICS

Prof. N. Srivastav was nominated as member of a Sub-Committee under the 'Meghalaya Economic Development Council Secretariat for Road and Tourism Development' constituted by the Planning Department, Government of Maghalaya, Shillong, October, 2012.

Prof. B. Panda was appointed by Ministry of Rural Development, Govt. of India, a member of the expert committee on effective initiatives under Mahatma Gandhi NREGA administration.

DEPARTMENT OF MANAGEMENT

Mr. Deepak Bhagat has been appointed as president of the North-Eastern Region Chapter of the Institute for Supply Management (ISM) – India (An affiliate of ISM, USA).

CENTRE FOR DISTANCE EDUCATION

Dr. R.N. Rai is nominated as Member of Editorial Board PSYBER NEWS, International Psychology Research Publication from April 2012, 10A, Veer Savarkar Block, Shakarpur, Delhi – 110092

State Coordinator of Meghalaya from May 2012 for India School of Psychology Association, 7, 14th Street, Krishna Nagar, Puducherry – 605008.

Regional President of Indian Academy of Applied Psychology from June 2012, National Institute of Technology Teachers Training and Research (MITTTR) Taramani, Chennai – 600113 India.

DEPARTMENT OF ADULT & CONTINUING EDUCATION

Prof. E. Jyrwa awarded "Tagore Literacy Award" for the 2012 from the Indian Adult Education Association, New Delhi.

Prof. E. Jyrwa elected as member of the Executive Committee of the Indian University Association for Continuing Education (IUACE) for the year 2013-15.

Dr. J. Mawthoh was elected as MLA.

DEPARTMENT OF ANTHROPOLOGY

Prof. T. B. Subba was appointed Vice-Chancellor of Sikkim University.

Dr. B. T. Langstieh was awarded Fullbright-Nehru Senior Fellowship to University of Washington, Seattle for 8 month's duration (15th Sept 2012 – 15th May 2013).

DEPARTMENT OF ENGLISH

Esther Syiem was nominated member of General Council, Sahitya Akademi for five years from January 2013.

Mala Renganathan completed the first spell of the IUC-IIAS Associateship in Indian Institute of Advanced Studies, Shimla for the year 2012 from 1 to 30 November 2012.

DEPARTMENT OF GARO

Marak Crystal Cornelious D. received the State Literary Award on 17th February 2012 for his book Singkam, which was published in 2009.

DEPARTMENT OF HINDI

Dr. B.P. Tripathi awarded by 'Yuva Shikhar Sahitya Samman-2011', on May, 2012 at Shikhar Sanstha, Shimla (Himachal Pradesh).

DEPARTMENT OF KHASI

Prof. S. Dkhar Awarded "A Daughter of Himalayas" in the 9th International Poetry meet held on 2nd July 2012 at Katmandu, Nepal.

Recipient of Meghalaya Tirot Sing Award, 2013 by the State Government.

DEPARTMENT OF LINGUISTICS

Umarani Pappuswamy, Member of the Publication Committee, Indian Linguistics, Journal published by the Linguistics Society of India for the term January 2012 – December 2014.

Umarani Pappuswamy, Member, Advisory Committee, UGC-Academic Staff College, NEHU.

DEPARTMENT OF PHILOSOPHY

Dr. P. Biswas was appointed as a Member of North East India Studies Committee of Indian Council of Philosophical Research since August, 2012.

Granted Visiting Fellowship by Tata Institute of Social of Development Studies at TISS, Mumbai in July-August, 2012.

Invited as Visiting Scholar at Indira Gandhi National Tribal University, Imphal campus to Lecture on Human Rights in September, 2012.

DEPARTMENT OF BIOCHEMISTRY

Prof. R. Sharma, President of the Association of Gerontology (India). Member, editorial board of Biogerontology from Springer, The Netherlands. Member, editorial board of International Journal of Development Neurosciences, Elsevier, USA. Member, editorial board of Frontiers in Aging research, Switzerland.

Dr. Timir Tripathi, Selected as a member of World Association of Young Scientists, UNESCO. Selected as Webmed Central Biophysics and Biochemistry faculty. Editorial Review Board member of International Journal of Biomedical Science (IJBS) and Scientific Journals International (SJI).

DEPARTMENT OF BIOTECHNOLOGY & BIOINFORMATICS

Prof S.R. Rao was awarded Certificate of Appreciation from ICAR.

Dr. Atanu Bhattacharjee was awarded the DBT Associateship for training at Max Delbruck Centre for molecular medicine, Berlin, Germany, for three months.

DEPARTMENT OF ZOOLOGY

Prof. B. K. Sharma was awarded 'Eminent Rotiferologist' at the 13th International Rotifer Symposium, ROTIFERA XIII.

Prof. N. Saha was appointed as a PAC member in the DST-SERB Animal Science group for a period of three years and also in the DST-SERB programme for Empowerment and Equity Opportunities for Excellence in Science for a period of three years.

DEPARTMENT OF CHEMISTRY

Prof. R. H. Duncan Lyngdoh was a Member of the Expert Committee for Evaluation of Major Research Projects in Chemistry and Polymer Sciences, University Grants Commission, which met at New Delhi in August 2012 and January 2013.

DEPARTMENT OF PHYSICS

Prof. P. Shukla was appointed as Member of the Editorial Board for *Pramana: Journal of Physics* (ISSN 0304-4289) in January 2013.

Was chosen as mentor for Dr. Soumik Banerjee under the Dr. D. S. Kothari Postdoctoral Fellowship awarded by the University Grants Commission, Govt. of India (February 2013).

DEPARTMENT OF HISTORY

Dr. S. N. Lamare received a cash award and a citation for research work and publications on the Jaintias on the Sesquicentennial Death Anniversary of U Kiang Nangbah from Sein Raij Shillong on 30th December, 2012.

DEPARTMENT OF BASIC SCIENCES AND SOCIAL SCIENCES

M. Mahato was awarded the Degree of Doctor of Philosophy (Ph. D.) by Calcutta University for his work "Studies on Protein Conformation in Water and Air/Water Interface by Langmuir Blodgett Technique" on 8th March 2013, under the supervision of Prof. G. B. Talapatra, Department of Spectroscopy, Indian Association for the Cultivation of Science, Jadavpur, Kolkata from Calcutta University, WB.

UGC ACADEMIC STAFF COLLEGE

NAAC assessment: The Academic Staff College, NEHU Shillong was reviewed and assessed by NAAC from 20^{th} to 22^{nd} February 2012 and was awarded 3^{rd} Rank on National Level.

16. Internal Resources Generated:

Resources generated through fee and corpus investment fund.

17. Details of Departments getting SAP, COSIST (ASSIST), DST, FIST, etc., Assistance/Recognition:

Department of Chemistry was awarded the Status of UGC Centre of Advanced Studies. The CAS status of the Department of Botany has been extended for a second term.

18. Community Services:

The NSS cell conducts such activities from time to time.

19. Teachers and Officers Newly Recruited:

Teaching Staff

Sl. No.	Name of the Post	Total Post								
110.	the rost	Sanctioned	Filled	Gen.	OBC	SC	ST	PWD	Total	Vacant
1.	Assistant Professor	204	178	*133	17	15	13	Nil	178	26
2.	Associate Professor	146	99	**93	-	1	5	Nil	99	47
3.	Professor	92	59	***57	-	-	-	Nil	59	33
4.	PRO/REA	1	-	-	-	1	1	-	-	1

^{*}Under General Category, out of 133 there are 57 belonging to ST category although not appointed against reserved category.

Non-Teaching Staff

Sl. No.	Name of	Total Post								
NO.	the Post	Sanctioned	Filled	Gen.	OBC	SC	ST	PWD	Total	Vacant
1.	Group-A	69	65	***65	-	-	-	-	65	4
2.	Group-B	185	140	137	-	1	1	1	140	45
3.	Group-C	456	326	325	-	ı	-	1	326	130
4.	Group-D	323	247	247	-	ı	-	-	247	76

^{***}Under General Category, out of 65 there are 36 belonging to ST category although not appointed against reserved category

20. Teaching – Non – Teaching Staff Ratio: Academic : Non- academic staff = 1: 180 app

^{**}Under General Category, out of 93 there are 17 belonging to ST category although not appointed against reserved category.

^{***}Under General Category, out of 57 there are 13 belonging to ST category although not appointed against reserved category.

21. Improvements of Infrastructure in Library:

(SHILLONG CAMPUS)

(Important Activities/Steps Accomplished towards Improvement of Library Services)

Reference Section added 106 new volumes and the section was reorganized and unusable documents removed from the shelves.

The officer in-charge and the staff of Documentation Section regularly attend to library members/visitors/scholars from other institutions/government departments.

A list of e-journals available under UGC INFONET Digital Library Consortium during the period were compiled by the Computer Unit and forwarded to Heads of Department for their red reference. The Unit further forwarded to INFLIBNET Centre, Ahmedabad soft copies (in pdf format) of Ph.D. Thesis (46 nos) and Dissertations (36 nos.) received by the library during the period for uploading in Shodh Ganga repository.

The Technical Section of the library undertook and accomplished the task of processing the books acquisition by the library during the period including Hindi books so as to ensure that they are made available for use by their potential readers.

The Periodical Section of the Library initiated the task of binding the loose issues of the journals into Bound Volumes. During the period a total number of 400 issues were bound. With a rich collection of print journals that the section housed for reference, sectional statistics recorded indicated that 90 journal issues were consulted by users from various academic disciplines of the university and a total of 253 issues of journals were send to the photocopying section of the library as per user's request. The user's mainly comprises of students, research scholars and faculty members of the university and from other institutions/universities. With the enhancement of necessary infrastructure (book shelves), the Social Sciences Back Volume stack area was re-organized and re-arranged in the alphabetical ascending order (from A to Z) of journal titles which will facilitate speedy retrieval of these documents. As a result of this, the said area received a face-lift for which earlier due to un-availability of proper infrastructure resulted in undesirable confined and ununiformed shelved spacing, leaving the back volumes scattered. During the period, the section also shouldered the additional task of carrying out Stock Verification procedure of the Sociology Book Collection on account of the circulation section being involved in the processing and issuing of smart ID cards to both students and employees of the university.

Valuable, Rare and out of copyright Books which falls under the category of the North-East Collection have been digitized (table of contents only) and uploaded into the NEHU Digital Repository for visibility as part of digital information dissemination programme.

22. New Books/Journals subscribed and their cost:

(SHILLONG CAMPUS)

Library Budget: 186.75 Lakhs

Library Resources

(I) Books Collection : 2, 73, 629 Vols.

(II) Data Bank (Government Publications & Reports) : 11,082 Vols.

(III) Books added during the Year : 6,162 Vols.

(IV) Periodical Subscription (Print)

(i) Foreign Journals : 175

(ii) Indian Journals : 211

Total : 386

Library User's Enrollment Including Usa Services:	ige of E	E-Resour	rces and Other Online
(I) Total No. of Registered Members	:	1513	
(II) Daily Average No. of Books issued/			
Return/renewal (including Law Dept.)		507	
(III) Daily Average			
No. of users who			
availed consultation services	:	375	
(IV) Usage of Journals/ Back Volumes/ T	Theses		
Students	:	520 per	month
Research Scholars	:	230 per	
Others	:	68 per 1	
(V) Average Internet users		-	461 per day
(VI) Photocopying Services			77,723 copies
(VII) Printing Services			4200 copies
(VIII) Resources sharing under UGC INFO	NET		1
Digital	:	326 arti	icles
(XI) NEHU usage of UGC INFONET Digit	al Libra		
(TURA CAMPUS) Allocation of Books and Periodicals durin (i) Book Grant = (ii) Periodicals Subscription = Rs. 6.8	Rs. 3.5 30 Lakh	50 Lakhs ns	
	.30. Lal	khs	
Collection Development			
Total Books Collection up to 31.03.2013	=	22,080	Vols.
Purchased	=	21,353	
Gifted		=	727
Dooley Added During the Veen (2012-201	12)		1084 Vols.
Books Added During the Year (2012-201	-		1004 VOIS.
Purchased	=	1039	
Gifted	=	45	
No. of Journals Subscribed	=	88	
Indian Journals	_		75
Foreign Journals	=	13	73
1 oreign southurs	_		
		13	
Library Membership Statistics		13	
Library Membership Statistics Total Memberships	=	437	
Library Membership Statistics Total Memberships	=		
Total Memberships	=		
	=		

12,117 11,751

=

Books Returned

Consulted = 38,081 Internet Users (Average) = 20 per day *(This also includes the statistics of Management Library)

Statistics of Technical and Library Automation Units:

Book Classified = 1084 Bar-coded = 3776 Vols.

Statistics of Reprographic Unit of Campus Library:

Total Number of Xerox Exposures = 12206

Revenue Collected during the financial year 2012-2013

Reprography Services = Rs. 6041/-Overdue fines = Rs. 4400/-

Total = Rs. 10,441/-

23. Courses in which student assessment of teachers is introduced and action taken on student feedback:

All courses offered by the University at its Shillong and Tura campuses.

24. Unit cost of education:

25. Computerization of administration and the process of admissions and examination results, issue of certificates:

Admission process and examination activites have been computerized.

26. Increase in the infrastructural facilities:

Department of Journalism & Mass Communication

Five Desktop Computers for the faculty and office.

Department of Geography

Environmental Lab: Water Analyser Kit, Digital Precision Balance, Trinocular Microscope with CCD, BOD Incubator, Magnetic Stirrer with heater, Flame Photometer, Double Distillation Plant.

Department of English (Tura)

- 1. A Digital Projector with screen.
- 2. A Multi-media set with microphone
- 3. A few sets of computers and a Xerox machine

4.

Department of Biochemistry

UV/Vis Spectrophotometer, Lyophilizer, HP-TLC, X-ray chamber.

Department of Cultural and Creative Studies

The Department has modeling studio along with modeling stands, enamel furnace and accessories for conducting the practical training for P.G. Diploma course in painting. In

^{*(}This includes both new books and retro-conversion)

addition to this, terracotta furnace along with shade is in place for the students admitted to this course. Besides, music practical class-room along with musical instruments and painting practical class-room along with easels and painting tables are available for the students studying the music and painting courses. Other infrastructural facilities include such things as class-room furniture for students of folkloristic, painting and music courses and for modeling studios.

Department of Electronics and Communication Engineering

Speech and *Image* Processing Laboratory: 8PCs with core i7 and i5 HP machines and one Voice Server connected to a Toll Free number to collect voice data for analyzing various features of speech signals over mobile networks.

Department of Energy Engineering

Two laboratories of fluid mechanics and thermodynamics have been set-up, faculty rooms and class rooms have been partially furnished.

Bioinformatics Centre

Computer & Communication Facility.

Leased Line Internet Connectivity (4 Mbps plus 2 Mbps through DeLCON w.e.f. December 2010)

Implementation of LAN on a Structured CAT 5 UTP Cabling Network using Switches and Hubs

Servers (3 nos.)

PCs (20 nos.) & Workstations (2 nos.)

Printers (3 nos.)

Scanner (1 no.)

UPS (4 nos.)

LCD Projector (2 nos.)

Scientific Software packages

- Accelrys Gene 2.5 (Sequence Analysis Work Bench)
- Matlab 7.0
- Winspirs ver 4.1 for Biotechnological Abstracts
- Reference Manager

Databases & other informations resources

- Derwent Biotechnological Abstracts (July 1987- March 2006)
- Reference Update Deluxe Edition (July 2002- June 2004)
- Parasitology Database (obtained through MOE&F)
- Application Software's from Microsoft, RHEL, SQL, Adobe and Apple etc.

Facility procured through DIT sanctioned NEPIAC project:

- Apple Work Group 13 node Cluster (HPCC)
- Apple iMAC (7 nos.)
- 40 kva UPS (1 no.)
- SPSS
- iWork, iNquiry software's

DeLCON facility through DBT, GOI- free access to 917 selected journals available to the potential users through University LAN.

Facility procured through NER Twinning Next-Gen Sequencing Project:

- Apple Mac Pro (1 no.)
- 10 kva UPS (1 no.)
- Apple iMAC 21" (6 nos.)

Facility procured through DBT, GOI sanctioned IBIN- BRIC Project:

- Backup Device (1 no.)
- Workstation (1 no.)
- HP Procurve Switch (1 no.)
- Cisco 1841 Router (1 no.)
- Server (2 nos.)
- Red Hat Enterprise Linux 6 Advance Platform (1 user)
- Microsoft SQL Server 2008 R2 Enterprise Edition (1 user)

Sophisticated Analytical Instrument Facility

The following Sophisticated Analytical Instrument are available for analytical services:

- Scanning Electron Microscope (JEOL JSM 6360)
- Transmission Electron Microscope (JEOL JSM 100CX)
- Transmission Electron Microscope (JEOL JEM 2100)
- FT-NMR 400 MHz (BRUKER AVANCE II-400)
- LC-MS Spectrometer (Waters ZQ-4000)
- Atomic Absorption Spectrometer (Perkin Elmer PE 3110)
- Graphite Furnace (analytic Jena AG Vario 6)
- CHN-OS Analyser (Perkin Elmer PE 2400)
- Liquid Nitrogen Plant (Philips PLN 106)
- Microscope with Image Analyser (LEICA DMRX)*
- Image Analysis Microscope DMRX has been made functional from March 2013.

New Facility: One new Ultra microtome, A Gradient accessory board in the FT-NMR instrument were installed in 2012; and EDAX Oxford INCA 350 procured in 2012 is under installation with the Scanning Electron Microscope.

27. Technology up gradation:

New Implementations of NEHU DATA and VOICE NETWORK (NDVN)

A New Mail Server on open source has replaced the Lotus Notes Mail Server. The server also functions as an LDAP (Lightweight Directory Access Protocol) for required authentication for proxy server and Wi-Fi access.

Microsoft Campus License for Windows operating System and office software was renewed providing legal copies for Windows computers in the campus.

An additional Media Gateway 450 for telephone access to new P-Type Quarter has been installed. This will also provide telephone connections to Type IV and Type III Quarters.

28. Computer and internet access and training to teachers and students:

The Computer Centre of the University

i. Provides computational facility to faculty members, research scholars and students of the University.

- ii. Develops and maintains software program developed for in-house use.
- iii. Assists Examination Section in Automation
- iv. Conducts training programmes in computer related subjects (both hardware and software).

29. Financial aid to students:

Scholarships/ Aid Fund: During 2012-2013, 73(Seventy-three) P.G. Students (including ST/SC) were awarded NEHU Post-graduate Merit Scholarships @ Rs. 3000/- per student and 88 (Eighty-eight) students (including ST/SC) were selected for the Students Aid Fund @ Rs. 3000/- per student for Post-graduate, and @ Rs. 4000/- per student for undergraduate.

Fellowships to the M.Phil./Ph.D. Students: During 2012-2013, 485 (Four hundred and eighty-five) eligible Research Scholars were selected/ provisionally selected for the award of the UGC Non-NET fellowship. Each Ph.D. scholar was awarded Rs. 8000/- per month while Rs. 5000/- per month was awarded to M.Phil. Scholars.

30. Support from the Alumni Association and its activities:

First meeting of the Alumni Association was successfully organized.

31. Support from Parents-Teachers Association and its activities:

No such system is in place.

32. Health services:

(SHILLONG CAMPUS)

The following facilities are available at the Health Centre Shillong:

CONSULTATION: Medical Officers are available for consultation at fixed hours as well as for emergency consultation outside duty hours.

PHARMACY: The required medicines are purchased from wholesale suppliers and stocked at the medical store. These medicines are issued to the patients based on the prescription by the Doctors.

DRESSING ROOM: Dressings, Injections and Minor surgical procedures are carried out in the dressing room.

LABORATORY: Bio-Chemical and clinical pathology tests for blood and urine analysis are performed in the Health Centre.

IN-PATIENT TREATMENT: Patients requiring in-patients treatment are referred to the Hospitals/ Specialist within Shillong thereafter outside Shillong depending upon the necessity.

AMBULANCE: Ambulance service is provided during emergency for transporting the severely sick patients from residents to Clinic/Hospitals.

EMERGENCY DUTY: The Resident Medical Officers and Resident Nurse are doing emergency duty outside duty hours whenever needed.

FIRST AID SERVICE: First Aid service is provided at sports tournaments and other big functions organized by the University.

CREDIT BILLING FACILITY: We have credit billing facility available for patients admitted in Nazareth and K.J.P. Hospitals in Shillong and C.M.C. Hospital, Vellore.

FREE MEDICAL CAMPS: We have been organizing various free medical camps on BMD test, Hemoglobin Test etc. conducted by various medicine manufacturing companies from time to time, for the entire NEHU community.

(TURA CAMPUS)

The following facilities are available at the Health Centre Tura:

CONSULTATION: Senior Medical Officer is available for consultation in the Health Centre at fixed hours as well as for emergency consultations and advice outside duty hours.

AMBULANCE: Ambulance service is provided for transporting the sick patients to the Clinics/ Hospitals.

EMERGENCY & IN-PATIENT TREATMENT: Patients requiring inpatient treatment are referred to hospitals/specialists within Tura and thereafter outside Tura depending upon the necessity.

SPORTS: First Aid service is provided at sports tournaments organized by the campus.

33. Performances in sports activities:

The Department of Sports, seeks to promote and encourage student's participation in sports and games activities in order to tap the hidden talent of the students by giving them an opportunity for their all round development. The Department had organized Inter College Tournament in various disciplines for the session 2012-2013; these include *Badminton*, *Table-tennis*, *Chess*, *Basketball*, *Football and Cricket* where several affiliated colleges and NEHU P.G. Teams participated. On many occasions the Vice-Chancellor Prof. A.N. Rai was the Chief Guest.

NEHU Football team participated in the East Zone Inter-University Tournament organized by Burdwan University, West Bengal. The Table Tennis (women) team participated in the East Zone Inter-University Table Tennis organised by Calcutta University, West Bengal.

The Department of Sports also assisted and gave all logistic and financial support to the NEHUSU in the Varsity Fest-2013.

The Department of Sports in consultation with the CDD, NEHU, has begun the project of developing the first phase of fencing and drainage of the NEHU ground and the work is in progress. Initiative is also being taken for the improvement of the basketball courts.

The Department of Sports at present is looking after the two gymnasiums meant for both boys and girls at the Fitness Centre and are fully functional.

34. Incentives to outstanding sportspersons:

Adventure Programme by NSS

NSS volunteers participated in the adventure Programme at Nagaland, Arunachal Pradesh, Jaisalmer (Rajasthan) and Narkanda, (HP).

15 NSS volunteers from different colleges along with 1 Programme Officer of Shillong College, Shillong participated at the Summer Adventure Programme held at Patnitop (Jammu & Kashmir) from 29th June- 8th July, 2012

Other Activities by NSS

NSS volunteers organized a mass awareness rally on "Save Wah Umkhrah", a Seminar on "Fresh Water Crisis, a challenge of the 21st Century", "Climate change the role of Christianity", a street show on HIV/AIDS Programme.

Besides observing the International Day against Drug Abuse and Illicit Trafficking, NSS in collaboration with the Civil Defence Department organized a three day training Programme on Disaster Management.

Apart from the above, NSS also organized free health camps, drawing and painting competitions, cleaning drives, etc.

35. Students Achievements and Awards

Degrees Awarded:

- (a) M.Com 16
- (b) M.A. 45+29+21+38+26+23+44+29+27+27+37+43+44=433
- (c) M.Sc. -25+21+20+29+09+26+21+18+22+18=209
- (d) M.A/M.Sc. 29
- (e) M.Phil. -5+3+2+9=19
- (f) MBA 27
- (g) B.Ed SEDE 41
- (h) B.A. LLB (Hons) -40
- (i) B.Tech -50+49=99
- (j) FC-SEDE 361
- (k) **PGPD-SEDE** 18
- (I) P.G. 43+18+28+21+18=128
- (m) P.G. Dip (Music) & (Painting) 13+9=22
- (n) Ph. D -

1+1+1+13+2+1+6+2+6+1+5+4+1+5+2+2+3+3+10+5+10+1+5+1+2+4+1+=98

36. Activities of the Guidance and Counseling Cell:

Inviting various potential employers for recruitment of students through campus selections.

37. Placement service provided to students by Counseling & Placement Cell:

The Cell carried out the following activities during the year (2012-2013) under report.

The Placement Cell, Tura, had conducted four Campus Interviews during the year under report. IDBI Bank Limited, Professional Assistance for Development Action (PRADAN), New Delhi, Bajaj Allianz Insurance Company Pvt. Ltd. and Prefetti Company, conducted the Campus interviews. 12 students were offered placement by the above companies. The Cell also organized a training for SAP01-pre-specified e-module for the 3rd Semester MBA students.

38. Development Programs for Non-teaching Staff:

In house training is provided to staff.

39. Best Practices of the Institution:

Involvement of Faculty in various administrative matters. Enhanced transparency in decision making process.

40. Linkage developed with National / International, Academic / Research Bodies:

Department	Collaborating Agencies
Centre for Distance Education	Special Education Programme in collaboration
	with the Rehabilitation Council of India, New
	Delhi.
	B.Ed – SEDE
	Post Graduate Professional Diploma in Special
	Education (PGPD-SEDE)
	Foundation Course on Education of Children
	with Disabilities (FC-SEDE)
Centre for Science Education	Nanophysics, mechanical properties of carbon nanotubes
	Molecular and cytogenetical analysis of Citrus
	plants in North-East India, Organic garbage
	recycling and reuse.
	Nutritional analysis of bamboo shoots,
	promotion of bamboo as health food in North-
	East India
Department of Anthropology	NATIONAL: NEIGHRIMS, Shillong, NIIH,
	Mumbai, for DBT Twinning project for
	Northeast India.
	Project on Body composition in relation to
	obesity and associated factors among
	adolescents in Meghalaya and West Bengal.
	INTERNATIONAL:Institute of Medicaal
	Chemistry, Molecular Biology and Patho-
	Chemistry, Semmelweis University, Budapest,
	Hungary and Institute of Psychology, Eotvos
	Lorand University, Budapest, Hungary, for the
	project on psychogenetics, (ii) Department of
	Anthropology, University of Washington,
	Seattle, for the project on human behavioural
	ecology.
	Aarhus University, Denmark, for the project
	titled "Nepal on the Move: Conflict, Migration
	and Stability."
Department of Environmental Studies	INTERNATIONAL: NTU, Singapore.
	Insitut fur Geographie, Lehrstuhl fur
	Geoinformatik, Geohydrologie und
	Modellierung, Friedrich- Schiller- Universitat
	Jena, Lobdergraben 32, 07743 Jena.
Department of Geography	Indo-Japan Collaboration with Disaster
	Prevention Research Institute, Kyoto
	University (Japan), Fredrich-Schillar
	University, Jena, Germany.
Department of Linguistics	NATIONAL: Central Institute of Indian
	Languages, Mysore; CDAC-Pune and

	Language Division, Kolkata. Consultancy services to the Mother Tongue Survey of India, a mega project undertaken by the Language Division, Kolkata. INTERNATIONAL: Australian National University, Australia; and Nanyang Technological University, Singapore.
Department of Biochemistry	DBT-Twining are continuing in the department. DBT-funded research projects are running in the laboratory. University of California, USA; Institute of Enzyme Research, Japan; Toho University, Japan; Research Centre, Juelich, FRG; Osaka University, Japan; University of Cambridge, UK; Newcastle University, UK; JNU, BHU, etc.
Department of Biotechnology and Bioinformatics	Bose Institute, Kolkata, NIPER, Chandigarh, National Bureau of Plant Genetic Resources, New Delhi (ICAR), Indian Institute of Technology (IIT) Kharagpur, University of Madras.
Department of Botany	NATIONAL: Jawaharlal Nehru University, New Delhi. INTERNATIONAL: Feiberg University, Feiberg, Germany University of Ljubljana, Slovenia.
Department of Zoology	NATIONAL: JNU, New Delhi: International Centre for Genetic Engineering and Biotechnology, New Delhi; Manipal Institute of Biomedical Sciences; Aravind Eye Hospital, Madurai. Indian Institute of Sciences, Bangalore. National Centre for Cell Sciences, Pune. IIT, Guwahati, Assam, Visva-Bharati University, Santiniketan, West Bengal. Delhi University, New Delhi, Lucknow University, Lucknow. International Centre for Genetic Engineering and Biotechnology, New Delhi, Manipal University, Manipal, ILS, Bhubaneshwar, Odisha, BBCI, Guwahati, Assam and North Eastern Indira Gandhi Regional Institute of Health and Medical Sciences. INTERNATIONAL: Sarawak University, Malaysia. Department of Gastroenterology, Infectiology

	and Hepatology, Heinrich-Heine University of
	Dusseldorf, Germany.
	University of Hamburg, Germany.
	Director - Institute of Coregulator Biology,
	Washington, USA and SIPBS, Strathclyde
	University, Scotland, UK.
Department of Chemistry	Bhabha Atomic Research Centre, Mumbai, and
The second secon	North- East Institute of Science and
	Technology, Jorhat, Assam.
	University of West Indies.
	Institut de Chimie, Universite de Neuchatel,
	Switzerland and Dr. Yurij Mozharivkyj,
	McMaster University, Ontario, Canada.
	The Quantum Chemistry Group of the
	University of Leuven, Belgium.
	Universita di Palermo, Italy; Virije Universiteit
	Brussel, Belgium; University of Zurich,
	Switzerland; Pharmachemie BV, Haarlem, The
	Netherlands; Universita di Camerini, Italy; The
	University of Texas at San Antonio, USA;
	University of Malaya, Malaysia; University of
	the District of Columbia, USA; Universiti
	Sains Malaysia, Malaysia.
	BARC, Mumbai.
	BITS, Pilani, BARC, Mumbai, College of
	Chemistry and Chemical Engineering, Hunan
	Normal University, Changsha, Hunan 410081,
	China.
Department of Physics	Radiochemistry Division, Nuclear Physics
	Division, BARC, Mumbai, in generating
	nuclear data for compilation.
	Centre for Science Education, NEHU,
	Shillong.
	Bergische University, Wuppertal, Germany;
	Department of Environmental Science, NEHU,
	Shillong; Apeejay Satya University, Gurgaon,
	Haryana).
Department of Basic Sciences and Social	NATIONAL: Department of Botany, NEHU,
Sciences	Shillong Sikkim University, Gangtok, Sikkim,
Sciences	
	GBPIHED (Sikkim Unit) Sikkim, Herbal
	Research Lab., Ramnarain Ruia College,
	Mumbai, Maharastra on Phytochemical
	profiling, molecular characterization and
	conservation of Flemingia vestita: Endemic
	I I'' II'' A A I A CAT AI A T I'
	medicinally important plant of Northeast India. BSI, Howrah, West Bengal on Preventing

extinction and improving conservation status
of threatened plants through application of
biotechnological tools.

41. Any other relevant information:

PART-C

Detail plans of the Institution for the Next Year:

The XII plan shall be implemented as per original plan proposal submitted to UGC. However, since the grant sanctioned under the XII plan is less than one third of the original projection, necessary adjustments shall be made in the plan. The University plans to start semester system at the undergraduate level in its affiliated colleges. All formalities have been completed and this system shall be implemented from the next academic session.

In addition to this, the University shall seek NAAC re-accreditation cycle three and scrutinize SARs of Faculty members for promotion under CAS.

Prof. A.K. Misra
Director
Internal Quality Assurance Cell

Prof. P. Shukla Chairperson Internal Quality Assurance Cell

Froho Lankle