



विज्ञान एवं प्रौद्योगिकी उच्च अध्ययन संस्थान

(भारत सरकार के विज्ञान एवं प्रौद्योगिकी विभाग के अधीन एक स्वशासी संस्थान)

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INSTITUTE OF ADVANCED STUDY IN SCIENCE AND TECHNOLOGY

AN AUTONOMOUS R & D INSTITUTE UNDER DEPARTMENT OF SCIENCE & TECHNOLOGY, GOVT. OF INDIA

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GUWAHATI-781035, ASSAM: INDIA

2018 Nov 19

To

Prof. Vinod K Jain

Vice-Chancellor

Tezpur University

Dear Prof. Jain,

Greetings.

I've enclosed the final copy of the AAA2018 Report.

Thanks to all at Tezpur University for all the warmth, hospitality, co-operation and support that we received.

Regards and best wishes,

Shruba J. Sarkar

P.S. I am visiting IASST for a few days.

REPORT OF THE COMMITTEE CONSTITUTED FOR CONDUCTING ACADEMIC & ADMINISTRATIVE AUDIT FOR TEZPUR UNIVERSITY FOR 2018

The Tezpur University vide its notification F.20-70/1/2010(Acad) dated 23 Oct 2018 issued by Registrar constituted the following committee.

1. Prof. Dhruba Jyoti Saikia,
Former Vice-Chancellor, Cotton College State University, Guwahati, Assam *D.J. Saikia 2018 Nov 01*
2. Prof. Debabrata Chakraborty,
Professor, Mechanical Engineering, Indian Institute of Technology *[Signature] 01/11/2018*
Guwahati, Assam
3. Prof. Archana Sharma,
Professor, Department of Economics, Gauhati University, Guwahati, Assam *[Signature] 01/11/2018*
4. Prof. Munindra Kakati,
Vice-Chancellor, Assam Rajiv Gandhi University of Co-operative *[Signature] 11/11/2018*
Management (ARGUCOM), Sivasagar, Assam
5. Prof. Niranjana Roy,
Dean, School of Economics and Commerce, Assam University, Silchar, *[Signature] 11/11/18*
Assam

Prof. Subhrangshu Sekhar Sarkar, Head, Department of Commerce, School of Management Studies has assisted the committee as co-ordinator for Team B.

Prof. Dhruba Bhattacharyya, Dean – Academic Affairs, has assisted the committee as co-ordinator for Team A.

Prof. Deben Baruah, Director, IQAC acted as overall co-ordinator to the Academic and Audit committee.

The detailed schedule of interaction/visit, discussion with various stakeholders and functionaries on 29th, 30th and 31st October 2018 is attached herewith Annexure A.

Preamble

The members of the Committee were split into two groups, one (Group A) visited largely the academic departments and centres, while the second one (Group B) focussed on the administrative units. The two groups visited all the units as assigned (Annexure A); however the time allocated was inadequate in most cases. The members saw the presentations by the units and discussed relevant and important issues with all the units they visited. The overall impressions and recommendations are summarised in this Report; which are followed by impressions and recommendations for each unit. The Committee would like to thank the Vice-Chancellor, faculty members, staff and students for their unstinted support and co-operation during the entire exercise.

General observations

The deliberations started with a presentation by the Vice-Chancellor giving an overall view of the University, and the Deans presenting a picture of the facilities, personnel, achievements and progress made by their respective units. Tezpur University is very dear to the people of Assam, and the Committee appreciates the progress made over the last 25 years, which has been reflected in the rankings and the NAAC grading. The overall impression of the Committee is very positive; but we have taken the liberty of highlighting aspects which will take the University even further forward.

1. Overall the pedagogic and examinations processes are progressing smoothly and recommendations of the previous AAA2013 have been implemented in terms of number of tests for continuous evaluation and having more elective papers. However the following need more attention.
 - Overall the grading procedures and pattern need to be critically examined so that students of similar performance across departments and centres both in the sciences, engineering and humanities get similar grades. A committee may be constituted for the purpose which can critically examine the issue.
 - Research scholars and post-doctoral fellows could be tutorial assistants to assist in the pedagogic processes which will also give them good training to be teachers. However, the primary responsibility of teaching should not be delegated to a research scholar or a post-doctoral fellow.
2. Some newly established Centres, although based on socially relevant concepts, may not be viable and may only create an extra burden on both human and other resources of the University. The Committee feels that it will be wiser to tie up those centres/departments with larger and allied departments, and also leave open the option of closing them.
3. The Committee recommends that the University consider the possibility of starting a School of Languages and Linguistics at a future date. With its study of endangered languages, and slowly opening up to East and South-East Asian languages, some of which may have affinity with languages of the North-East, it could be a very unique school with potential for a lot of interesting work. Such a School could also be set up in collaboration with a reputed University from East or South-East Asia with a good emphasis on oriental languages. The existing language departments or language teaching such as Assamese, English, Hindi, Chinese, French and German, and also Linguistics could come under this School.
4. The Committee also recommends that the University consider the possibility of starting departments in some of the core humanities disciplines such as economics, history, political science and philosophy. The faculty selected must be the best possible with experience of multi-disciplinary work, so that the departments do not become just another department in the discipline but leading ones in the country doing exciting research work in addition to excellent teaching.
5. Mechanism for collecting student's feedback for courses is in place in all the departments and centres and corrective measures on the feedback are also being taken. However, the committee feels that a uniform feedback mechanism across the University maintaining the confidentiality of the feedback to individual teachers should be maintained. Committee strongly recommends initiating the process of making an on-line feedback system. The overall issues recognized in

the student feedback may be analysed and discussed in the departmental meetings to address any shortcomings, but not inputs towards individual teachers. The inputs to individual teachers may be communicated to the teacher by the Head of the Department/Dean. For significant issues, when relevant, the steps taken may be communicated to the students of the department.

6. Overall, the student-teacher ratio in the University has been good. The committee observed that this is not uniform across different departments and centres. While the committee understands the difficulty in maintaining the uniformity, some departments, especially Engineering Departments have a ratio of as high as 1:20. On the other hand, there are centres having this ratio as low as 1:6. This issue needs to be kept in mind while taking steps in making a judicious distribution of sanctioned posts.
7. Committee appreciates the steps taken in making a separate training and placement cell for engineering students as suggested by the last AAA committee in their report. However, a more organized effort in terms of involving alumni and potential employers and more participation from students are suggested to improve the placement scenario of Tezpur University in general and engineering students in particular as the percentage of campus placements is on the lower side. A similar cell may be made for humanities, social sciences and management, rather than being an activity of a Centre for Inclusive Development. Placement activities need to be pursued far more vigorously than those at present.
8. The involvement of alumni in contributing to the growth of the University, including helping in placements of students, could be far better. The silver jubilee celebrations of the University may be an occasion to get the alumni more closely coupled to the University. A position of Dean, Alumni Affairs, could be created to co-ordinate all efforts to get the alumni more closely coupled to the University, help raise resources for the University from the alumni and also help in placements. A few outstanding alumni could be felicitated on the occasion of the silver jubilee celebrations.
The present practice of organizing an alumni meet at the time of the Convocation is not recommended as everybody's focus is on the Convocation. An event/meet at a suitable time of the year where interaction of alumni with the students, faculty and administration can be maximised is recommended.
9. Overall, publications and citations from the University have been good which has also fetched a good national and international recognition to the University as a whole and some individual faculty members as well. The committee observed that some departments have done quite well in publications and undertaking sponsored projects, while there are other departments and centres which need to put in more

efforts to increasing their number of publications to enhance their visibility in the national and international level. One of the key suggestions in this regard is to enhance the interdepartmental as well as intradepartmental collaboration, as new knowledge is often created at the boundaries of traditional disciplines.

10. The committee appreciates the steps taken by the University to ensure that plagiarism does not take place at any level. Programs and display of posters in departmental notice boards sensitizing the community on issues of plagiarism are recommended.
11. All the centres and departments have proportional representations of all categories following the Government of India rules. Each department also takes care of weaker students by assigning faculty members as mentors to these students and by conducting remedial classes. Special emphasis on traditionally disadvantaged SC/ST students is recommended.
12. The Committee suggests that the University develop an institutional research model, where there is a database based on the admission data of the students giving their socio-economic backgrounds, gender, place of permanent residence etc. and their overall performance, which would be useful to develop policies to take proactive steps. At present there is very little information easily available to see how the SC/ST students are doing in different disciplines compared with other students. Committee also appreciates overall presence of women as students and faculty in the University, although the ratio is low in some of the engineering and science departments. An analysis of a database on faculty would also help examine issues of diversity, available expertise etc. The Departments of Sociology and Education could take this up as an institutional project.
13. Committee appreciates the revision of eligibility criteria for becoming a PhD supervisor benefitting the new faculty members. The Committee appreciates the step taken by the Vice-Chancellor to give a scholarship to all research scholars, benefitting the non-JRF scholars. However, the issue of providing JRF-equivalent scholarships to GATE qualified students and ICAR NET qualified students may be taken up by the University with the competent authorities.
14. The possibility of a limited number of sponsored PhD candidates from industry could be explored; as this may also help industry-academia interaction and also contribute towards placements of the students.
15. The number of elective papers or minors could be increased with centres and departments which are less loaded in terms of number of registered students and papers offered, proposing new papers. One of the areas which is generally weak

nationally is science journalism. With a Department of Mass Communication and Journalism located in a University with several strong science and engineering departments, the possibility of offering papers and training students on science journalism could be explored.

16. Although a Tezpur University Internal Complaints Committee (ICC) has been constituted, it is a good practice not to have any senior administrative person such as Registrar, Joint Registrar, Deans etc. as members of the ICC. Also unless there are multiple campuses, there should be only one ICC for the entire University. Departments may have a gender-sensitization cell which may also provide support and assist anyone affected, to complain to the ICC, but individual departments should not have an ICC as at present. The ICC is a quasi-judicial body and the powers of the University ICC should not be diluted by creating departmental ones. Also, there is a possibility of hushing up issues in smaller units.
17. The rapid increase in the number of students with introduction of new and integrated courses has stretched the available infrastructure in some of the departments and the hostels to its limits. Although we recommend increases given the demand, available resources should be kept in mind so that the pedagogic processes are not compromised and the students have a comfortable stay during their studies. Increase in student numbers must go hand in hand with development of infrastructure.
18. Some girl students complained about the quality of the food in the hostel and about lack of transparency in the management of mess dues. The Committee discussed the matter with some stakeholders and found that an audit mechanism involving the stakeholders is in place, but the same should be done more formally and transparently to avoid any misapprehensions.
19. Service providers or contractors either being entrenched in the University for long periods of time, or having a near monopoly on services is not healthy and provides a natural recipe for malpractices. The University administration needs to carefully look into this so that there is healthy competition and the University gets the best deal possible for all its members and stakeholders.
20. Attention to detail is essential while travelling along the path to excellence. For example Guest House rooms could also have a smaller-sized pair of 'chappals' as many visitors are women who tend to have smaller feet. Also, monitoring of the quality of food provided by the Contractor in the Guest House and ensuring that no towel or sheet is stained, could be better.

21. The campus is well maintained. The committee appreciates the move to not let students use motorized vehicles within the campus and encourage them to use bicycles; and also strive to minimise use of plastic. With a number of good water purifier systems in the Guest House and perhaps elsewhere, the use of plastic water bottles which is widespread in the Guest House could be done away with. Oxygen levels and the pollutants in the water bodies could be measured and monitored by the Department of Environmental Science. Water birds are far fewer than expected in water bodies of this size.
22. The websites of most departments are not up to date. This needs to be done regularly.
23. Considering that many of the equipment for experiments were bought several years ago, and there are increased chances of breakdowns as time goes on, the University should draw up an action plan so that work does not suffer. At present there seem to be issues with both TEM and SEM. Two of the equipment in the Health Centre were also not functional. Perhaps an AMC should be signed for all major equipment so that research activities do not suffer.
24. There is the natural grievance of technical and administrative staff of stagnation in some posts. The Committee appreciates the University letting them go for training programs. Perhaps the University could also conduct in-house skill development programs which would enable them to compete favourably for better positions both within and outside the University.

SPECIFIC RECOMMENDATIONS FOR EACH DEPARTMENT

DEPARTMENT OF CHEMICAL SCIENCES

It is a strong department with about 20 faculty members covering different aspects of chemical sciences, and about 70 research scholars. It offers the following courses: MSc in Chemistry, Integrated MSc in Chemistry, PhD in Chemical Sciences, MTech in Polymer Science and Technology and Integrated BSc BEd in Chemistry. The Department has been proactive in placements and also taking remedial courses. The number of NET/GATE qualified students looks reasonable. There is evidence of a slight decrease in the number of publications since 2014, although the number of citations shows a steady increase, suggesting increased recognition of the publications. The Department has been supported by both UGC-SAP and DST-FIST.

D. J. Sarant

Considering the demand for courses in the Department, the number of seats especially in the integrated MSc course could be increased, keeping the overall infrastructure in mind. The student teacher ratio is about 16:1 excluding B.Tech students. Given the present work load, and the growth of chemistry with the American Chemical Society now listing 31 Technical Divisions, the faculty strength could be increased, with some emphasis on areas which may be of interest in this region.

DEPARTMENT OF MATHEMATICAL SCIENCES

The Department of Mathematical Sciences is also one of the strong Departments under the School of Sciences with 15 faculty members, 4 contractual and 1 guest faculty. It offers the following programs: MSc in Mathematics, Integrated MSc in Mathematics, Integrated BSc BEd in Mathematics and PhD in Mathematical Sciences. The student teacher ratio is about 16:1 for the Departmental programs and about 77:1 for all programs. Assigning a mentor for each student of the Department is a good step. The number of research scholars is on the lower side, although there has been a significant increase in 2018. Given the nature of the subject and the speed with journals process the papers, the publication record is healthy. The number of NET etc. qualified candidates has also been increasing over the years, with a significant increase in 2017-18.

Given the huge demand for the Integrated MSc program, the number of seats could be increased keeping the overall infrastructure in mind. The number of applicants to seat ratio is over 60.

The committee recommends increasing the number of faculty members in applied mathematics and possibly statistics in future recruitments so that the Department is more balanced.

Changing the name of the Masters' Course to 'Mathematics and Computing' may be discussed in view of employment opportunities, as has been done in some IITs. For example IIT Kharagpur offers an MSc program in Mathematics and Computing, while IIT Guwahati offers a BTech program in Mathematics and Computing. Placements for those taking this course is said to be good. The Department may discuss its feasibility. The course content must of course reflect the name, and the Department may also consider involving interested faculty members from other Departments.

The computing facilities in the Department need to be enhanced both in terms of computing capability and required software.

DEPARTMENT OF PHYSICS

This is also a strong department of the University with 16 faculty members of varied interests, and about 20 research scholars registered during the last five years. It offers the following programs: MSc, Integrated MSc and Integrated BSc BEd besides the PhD

D. J. Anand

program. The student teacher ratio is about 10:1. The number of publications is reasonably good, and the Department has installed an optical telescope which could be used to do MSc-level experiments routinely. There appears to be a nucleus of a group interested in astronomy and astrophysics.

Here again, given the huge demand for the integrated MSc program, the number of seats could be increased keeping the overall infrastructure in mind. The number of applicants to seat ratio is over 60.

The number of NET/JRF qualified students seems to be on the lower side. The Department should take pro-active steps to ensure that this number goes up significantly. The number of research scholars could also be increased.

DEPARTMENT OF ENVIRONMENTAL SCIENCE

This Department has been established more recently, in 2004, compared with the other Departments under the School of Sciences. It has about a dozen faculty members, almost evenly split in gender, and about 50 research scholars. It offers an MSc and PhD program and a Diploma program in the distance mode.

The Committee observed that the candidates admitted to its programs are largely from a Biology background. Considering the multidisciplinary nature of the subject, one could proactively encourage students from relevant science backgrounds to apply.

Given the importance of the subject, the Department can take steps to popularize the subject to attract more students and enhance their employability. One of the possible suggestions is to critically examine the course curriculum involving representatives from potential employers and departmental alumni. The Department may also explore collaborations with other departments such as the Department of Civil Engineering, Department of Chemical Sciences where Green Chemistry is a growing field, in making the Master's program more attractive with better employability besides undertaking joint/collaborative projects. The University may also approach the Government of Assam in sanctioning regular positions in Environmental Science in the institutions of higher education given the importance of the subject, and have closer relationships with NGOs dealing with environmental issues, which would help both placements and research.

The Department is encouraged to monitor the environment within the campus, especially the water bodies which should be able to attract far more avian fauna than at present.

D. J. Saikia

DEPARTMENT OF MOLECULAR BIOLOGY AND BIOTECHNOLOGY

This is also a strong department of the University with about 20 faculty members and over 70 research scholars. However there is only one woman faculty member. About 45 per cent of the research scholars are women. It offers an MSc program, an integrated MSc program and a PhD program. The student teacher ratio is about 10:1.

Here too, given the huge demand for the integrated MSc program, the number of seats could be increased keeping the overall infrastructure in mind. The number of applicants to seat ratio is high.

The number of publications and also the number of NET etc. qualified students are both showing a slightly downward trend during the last three years, for which pro-active steps need to be taken.

The department needs more space for their laboratories to conduct laboratory classes and research activities. However, the committee also noted that each faculty has his/her own laboratory. The possibility of sharing the laboratory space by faculty members may be explored.

The Department may be encouraged to lay more emphasis on placements by collecting feedback from departmental alumni, potential employers and from other Institutes.

DEPARTMENT OF MASS COMMUNICATION AND JOURNALISM

This is a mid-sized Department with 10 faculty members but an important one for the democratic fabric of our country, and must flourish and grow. It offers an MA and PhD program. The student teacher ratio is about 10:1, including 16 research scholars. The Department has also been recognized as a National Resource Centre for Mass Communication by the MHRD. The Committee appreciates that steps have been taken as per the recommendations of AAA2013 especially in relation to placements and setting up a Community Radio Centre.

This Committee reiterates the recommendation of AAA2013 to organize a one-day event in Tezpur town showcasing the films made by the students as an outreach program of the University. This could be an important event in reaching out to the community in Tezpur.

The number of applications to intake ratio is about 10 for the M.A. program in Mass Communication and Journalism and only about 3 for the M.A. program in Communication for Development. One would have expected a higher demand for both the programs considering the importance of the discipline. The Department must

D. J. Sarma

consider means of popularising the course including using social media and departmental alumni besides enhancing interactions/collaborations with other departments and centres.

Only about half the faculty members are recognized guides. With the liberalisation of procedures to be recognized as guides, those eligible should apply which will also lead to an increase in the number of good research scholars and academic productivity.

The Department could consider offering more elective papers related to mass communication and journalism to both undergraduate and postgraduate students.

Given the presence of the Department in a University with strong science and engineering departments, the possibility of promoting science journalism in this region should be explored.

There have been 11 NET qualified students in the last five years. This is on the lower side and the Department should explore how to increase this number.

CENTRE FOR INCLUSIVE DEVELOPMENT

The Centre's activities are almost entirely on the UNICEF supported Post Graduate Diploma on Child Rights, for which the Department of Social Work would be the natural place for such a program. The faculty teaching this course as well as the students will benefit from being located within the larger framework of such a Department.

A Centre is expected to have a well-defined research programme. There does not seem to be any such programme, which at least partly could be due to the Director not having the expertise in this field. There does not seem to be any active programme on inclusive development.

The SC/ST Cell has been included in this Centre. There does not appear to be readily available data on SC/ST students and their performance. An SC/ST Cell should be headed by a person from either of these communities, and who should keep track of the performance of these students and take proactive steps for their welfare.

The non-engineering placements are handled by the Centre. However, the whole aspect of placements needs to be pursued vigorously in close co-ordination with the departments, alumni and potential employers.

There does not seem to be any strong argument for continuing with this Centre in its present form. If it is going to look at inclusive development issues in depth at a research level and be able to advise on policy issues using data it could be embedded within the

D. J. Anand

Department of Social Work. In this case it should be headed by a person with a strong background in the field.

CHANDRAPRABHA SAIKIANI CENTRE FOR WOMEN STUDIES

The Centre for Women's Studies, established in 2009, has only two faculty members, one of whom is associated with the Department of Cultural Studies. It conducts a postgraduate diploma in women studies, which has about 8 students, and offers a couple of elective papers in the CBCS model. Its activities have been limited given its small faculty strength.

However, as we move towards making more equitable and just societies, it is important that gender issues are examined in depth from all aspects. To be an effective research centre for women's studies, a couple of more regular faculty members initially are recommended. The faculty member in-charge should be associated full-time with the Centre. Future development of the Centre should be discussed after these are in place.

Given the nature of the studies, the Centre should work more closely with other relevant departments such as Department of Sociology, and the Department of law, and the ICC on issues related to gender sensitization and women's issue.

DEPARTMENT OF LAW

This is a very new Department, established in 2016, offering a two-year LLM course. It has one senior faculty member at Professor's level, who is leaving in a short while, and four young enthusiastic faculty members at the Assistant Professor's level.

It is recommended that new faculty members be recruited, especially at either the Professor's or Associate Professor's level to head the Department and also mentor the young faculty members. Even though there have been challenges in fulfilling the bar council's norms for starting LLB course, the University authorities may put in an effort to initiate the process of starting LLB course or BA-LLB course (along with Humanities and Social Sciences) which is in high demand these days. In this regard, National Law University and Judicial Academy Assam, BHU, AMU, Gauhati University (for LLB) or Dibrugarh University (integrated BA-LLB) may be contacted for inputs. Starting an LLB course will not only make the Department of Law a complete department but also will be significant in fulfilling the need of students of north-east in particular who want to pursue law as a career.

D. J. Saikia

Many of those who pass out from Tezpur University are likely to hold important positions and it is essential that they have a good knowledge of the Constitution of India, and other legal matters. The Department may be encouraged to offer a number of elective papers on the Constitution of India and other legal matters.

DEPARTMENT OF EDUCATION

This is a mid-sized department established in 2014 with about a dozen faculty members. Besides the BA BEd/BSc BEd program of four years' duration, it also offers a two-year BEd program, an MA in Education and a PhD program. A two-year MEd program will be offered from the coming academic session. The student teacher ratio at present is about 24:1. One of the most important challenges we face today regarding education is producing good teachers and this Department can and must play an important role towards this objective in this region.

The Department along with the Department of Sociology could take the initiative to develop an institutional research model, where there is a database based on the admission data of the students of Tezpur University giving their socio-economic backgrounds, gender, place of permanent residence etc. and their overall performance, which would be useful to develop policies to take proactive steps. At present there is very little information easily available to see how the SC/ST students are doing in different disciplines compared with other students. Committee also appreciates overall presence of women as students and faculty in the University, although the ratio is low in some of the engineering and science departments. An analysis of a database on faculty would also help examine issues of diversity, available expertise etc., which are important and critical parameters for the growth of good academic institutions.

Only about half the faculty members are recognized as guides. With the recent liberalization of rules, all eligible should be encouraged to apply for guideship at the earliest possible. Perhaps partly due to this, the number of research scholars is only about 13.

The Department should be proactive in getting a larger number of students qualified in NET as the number appears to be decreasing in the last couple of years. In 2017 there were only 3 who qualified NET and none with a JRF.

All faculty members should endeavour to publish in at least Scopus-listed journals.

D. J. Saikia

DEPARTMENT OF ENGLISH AND FOREIGN LANGUAGES

This Department with 19 faculty members covers English Literature (11), English Language Teaching (ELT; 2), Linguistics (5) and Chinese (1); the breakup for different components are given within brackets. It offers a wide range of courses: MA (English), MA (Linguistics and Language Technology, L<), MA (Linguistics and endangered languages), Integrated MA, Integrated BA, BEd, Certificate course in Chinese, French and German with the latter two being contracted out, and PhD, besides elective CBCS papers. The student teacher ratio for the MA programs varies from 9:1 for L< to 19:1 for English. There are 51 research scholars, with close to 80 per cent being women.

As also suggested by the earlier AAA2013, considering the nature of the disciplines and the range of courses being offered, it is advisable to constitute a separate Department of Linguistics. The faculty members of literature, language and linguistics agree on this move.

In this scenario, the Department of English and Foreign Languages would continue with the primary focus being on English Literature and ELT, with foreign languages being a component of the Department. Considering the range of courses and the importance of teaching English writing, including technical writing to the students, an increase in the number of faculty members may be desirable.

Given our strategic location Chinese is clearly an important language to be taught. Also with the Government's look east policy, the possibility of teaching other East Asian or South-East Asian languages could be explored in the future.

Only 11 of the faculty members are recognized as guides. With the liberalization of the norms by the University authorities, those eligible are encouraged to apply at the earliest possible.

The Department could be an important centre for doing good translations of selected North-East literature into English, so as to reach a much wider community. Support for such an activity is recommended.

The Committee recommends that the good work be published by national-level publishers so that it is easily available to a large community, and will bring in greater visibility to the authors as well as the Department and the University.

As mentioned in the overall recommendations, the Committee recommends setting up a School of Languages and Linguistics which given its geographical location in a region with a rich diversity of languages within the region and also in its neighbourhood, could become a very unique school.

D. J. Sankar

CENTRE FOR ENDANGERED LANGUAGES

The Centre started functioning from 2016 with the mandate that "The University will analyse and document the lesser-known languages of Assam as well as of Nagaland and Manipur." The Centre also acts as a nodal centre for the consortium of the other such centres in North-East India.

Given the close synergy with linguistics as can also be seen with the close association of the faculty members specializing in linguistics with the Centre, this could be a Centre in the Department of Linguistics, if such a Department is created as recommended earlier. This would help make optimal use of both human and other resources. It is an important activity for the region, and such a move would also give it stability in its continuation even if the UGC grant were to run out.

The demand for the MA course appears low. The possible job opportunities of the Masters' students need to be assessed and ascertained to examine the viability of continuing with the course. Although the course is technically being offered by the Department, it should not distract from the main objective of the Centre.

DEPARTMENT OF CULTURAL STUDIES

Set up in 1995 it is a relatively small department with 8 faculty members, 6 of whom are at the Assistant Professor level. It offers an MA program in cultural studies with the option of getting a PG Diploma after two semesters and a PhD program. It is an important area of study for North-East India, and should become a key centre for promotion of the rich and diverse cultures of this part of the country both nationally and globally.

Towards this end, digital archiving of valuable manuscripts and documents is a laudable contribution. The possibility of making these widely available via the web should be done and advertised via the University web page as well as social media. The Cultural Interpretation Centre is also shaping well.

Publications must be with at least national level publishers so that our rich cultural heritage is more widely disseminated.

To enrich the experiences of the students and also take up other projects, possibilities of collaborative work with Archaeological Survey of India and other archaeology departments in the region may be explored, which will help explore the cultural history of the region.

D. J. Acharia

One of the main challenges is placement since it is not a regular subject taught in institutions of higher education. Students must be taught additional skills such as making videos and short films on different cultural aspects of the North-East. The Department could have its own YouTube channel to upload such videos which will also help disseminate the rich culture of the North-East.

The Department of Mass Communication and Journalism has good facilities for making videos and short movies. Possibilities of vibrant and strong inter-departmental collaboration towards the above objections should be explored and put in place.

Another important aspect could be to teach them entrepreneurial skills taking help from School of Management Sciences as part of their regular course work so that they may be able to set up their own units to promote cultural tourism.

DEPARTMENT OF HINDI

It is a relatively small department established in 2010 with a sanctioned strength of 7, and presently with 4 regular faculty members. It offers an MA and a PhD program in Hindi, as well as a PG Diploma in Translation and a Certificate Course in official Hindi. There are at present 10 research scholars, six of whom are women. The number of PhDs awarded during 2014-18 is four. It also offers courses under CBCS.

To make the Department more vibrant, the vacant posts should be filled up and the Department too must take pro-active steps.

Good translation work is invaluable. The Department is advised to take on translations of important pieces of work, including significant pieces of Assamese literature into Hindi, and get it published by well-known publishers, to reach a wider audience. This could be kept in mind while making new recruits so that one or two persons are proficient in both a local language (e.g. Assamese) and Hindi, and with an interest in translational work.

The number of NET qualified students is on the lower side. Department is encouraged to take proactive measures so that more students are NET qualified.

The Department has mentioned about shortage of infrastructure. University is requested to look into it. However, the culture of sharing resources must also be encouraged so that all University resources are used optimally. For example, although it may be difficult to set up a language laboratory at short notice, the possibility of sharing one of the available language laboratories for the benefit of the students must be done.

D. J. Aikawa

DEPARTMENT OF SOCIOLOGY

The Department, established in 2006, is a mid-sized one with 10 faculty members, 7 of whom are at the Assistant Professor level and two Professors of Eminence whose terms are over. Three of the faculty members are women. It offers an MA and a PhD program, and also an MA program via the Centre for Open and Distance Learning. The student teacher ratio is about 9:1. There are 26 research scholars, with about 70 per cent of them being women. All faculty members are PhD guides and 85 students have qualified for NET over the last 10 years. It has published in several notable journals. With a largely young faculty, it must set high standards so that it becomes an important centre for sociological studies.

The Department along with the Department of Education could take the initiative to develop an institutional research model, where there is a database based on the admission data of the students of Tezpur University giving their socio-economic backgrounds, gender, place of permanent residence etc. and their overall performance, which would be useful to develop policies to take proactive steps. At present there is very little information easily available to see how the SC/ST students are doing in different disciplines compared with other students. Committee also appreciates overall presence of women as students and faculty in the University, although the ratio is low in some of the engineering and science departments. An analysis of a database on faculty would also help examine issues of diversity, available expertise etc., which are important and critical parameters for the growth of good academic institutions.

With the vast amount of data available today, the Department is encouraged to also look towards developing other strong research programs in quantitative sociology addressing questions of current concern. If necessary, the possibility of collaborating with someone familiar with handling large data bases from the science or engineering disciplines should also be explored.

The Department has been able to get a number of research proposals funded. However, since funding is getting more difficult, collaboration with other departments, especially science and engineering, could be explored which would also enrich the variety of research areas being worked on.

With a strong student community in sciences and engineering elective papers of interest to them as well as students of sociology, such as the sociology of science, could be offered.

D. J. Saikia

DEPARTMENT OF SOCIAL WORK

It is a relatively new Department and has the potential of playing an important role in addressing issues related to this field. There are five faculty members at the Assistant Professor level. They were earlier mentored by the Professor of Eminence, Department of Sociology and after his term was over, they are now being mentored by the Head, Department of Sociology. It currently offers an MA program in Social Work, and elective papers under the CBCS model. About a third of the student strength of about 15 have qualified in the UGC NET examination. It is potentially an important department as there is a shortage of trained social work professionals in the region.

Considering the importance of the Department, it would be helpful if a senior person from the field could be found soon to build up strong research and pedagogic programs. Further expansion may be planned in a phased manner once this is in place. The faculty members are young and enthusiastic and a good mentor with a strong commitment to social work would be very helpful for the Department to grow.

Placement is reasonable. The Department has built up linkages with a number of organizations, but this could increase significantly.

The number of NET qualified students could be better as this would give them more options. However, it is possible that many may not be interested in an academic career and would prefer working in the field.

AMBEDKAR CHAIR

Dr Ambedkar Foundation (DAF) of the Ministry of Social Justice and Empowerment has allocated an Ambedkar Chair to Tezpur University to "serve as a Centre of learning and research not only on the subjects concerning Dr Ambedkar's ideology and philosophy, but also on the issues concerning the socio-economic and cultural life of scheduled castes, scheduled tribes, minorities, backward classes and other weaker sections of the society including women" focusing on the North-East. With the meagre resources, the present incumbent is doing his best.

It is highly advisable to locate such Chairs within a larger department so that human and other resources could be shared, and it would naturally facilitate the interaction and participation of a much larger body of students, staff and faculty in its activities. The present incumbent is from the Department of Sociology, and it would be natural to include this within the Department of Sociology.

D. J. Sarkar

CENTRE FOR ASSAMESE STUDIES

This Centre has an absolutely skeletal staff of one faculty member at the Assistant Professor level, and offers elective papers titled MIL Assamese on different aspects to MA, BA, BEd students also a couple of papers in the CBCS scheme.

It has started a commendable job of digitizing valuable archival material in the form of notes, diaries, personal papers and books related to Assamese literature and culture. This work should be supported and continued as there does not appear to be any systematic effort to do this elsewhere in the state. After checking copyright issues and taking permissions where necessary, the material should be available via the web to all.

It is but natural that given its location and potential for both teaching and research, the Centre should be elevated to that of a Department which is adequately staffed.

COMMUNITY COLLEGE

This was established in 2015 under UGC's Community College Scheme towards imparting skills and contributing towards creating a skilled work force. It is overseen by a Nodal Officer who is presently from the Department of Electronics and Communication Engineering.

At present there is a Diploma in Paralegal Practice and three more courses have been approved by UGC to start from July 2019.

The number of students admitted has dropped to a mere 6 in 2017-18, in spite of a scholarship of Rs 1000/- per month, compared with 32 the previous year. With the placements being only about 5 from the 2016-17 batch in a skill-development job-oriented program, this could be at least partly responsible for the dramatic drop in intake.

It is necessary to critically examine the quality of the course; and also increase the publicity to the courses to be offered starting from next year. As the intake is from the 10+2 pass level, posters advertising the courses could be sent to all junior colleges and schools preparing students for the higher-secondary examinations. Possibility of inducting students after 10th class may also be looked into following the guidelines of funding agency.

Also placements and development of entrepreneurial skills must be vigorously pursued so that those who pass out can either get a job or start a small business to earn a livelihood.

D. J. Barua

DEPARTMENT OF ENERGY

This is a mid-sized department with 10 faculty members, of which only one is a woman, and has 28 research scholars, 54 MTech students and 28 B.Voc. students and one Research Associate. Energy is integral to our lives and the Department has focussed on research with ongoing research projects having a support of about 5.7 crore rupees.

A patent has also been filed. As suggested by AAA2013 the Department now has an active and vibrant outreach program, and has also initiated collaboration with industry.

The publication record is reasonable although the average has dropped significantly in 2017 and 2018 compared with the previous three years.

The BVoc program in renewable energy has a significant intake of 50 students. A crucial element is the employability of these students, which would be critical in sustaining the course. This needs to be discussed and addressed.

Course curriculum needs to be designed with an objective of enhancing the placement by collecting feedback from departmental alumni and potential employers and collaborating with other departments like Mechanical Engineering, Electrical Engineering, Physics.

DEPARTMENT OF ELECTRONICS AND COMMUNICATION ENGINEERING

This Department established in 1997 has 19 faculty members with the thrust area being microelectronics and communication, and 34 research scholars. It offers a BTech program in Electronics and Communication Engineering, MTech programs in Electronics Design and Technology and also in Bioelectronics, a PhD program and an Advanced Diploma on Healthcare Informatics and Management. It holds two patents and has applied for four more. The Department has been reasonably successful in obtaining external grants. The student to teacher ratio is about 16:1 including the PhD students.

The number of publications over the last two years has decreased compared with the previous two years.

The number of GATE qualified students peaked at 21 in 2016-17, was 13 during 2017-18 and so far only 2 during 2018-19. This downward trend is of concern and the Department should explore possible reasons for it and take corrective action.

Although a few selected alumni are well placed, the overall placement scenario needs to be much better. Department needs to examine possible reasons, including looking at course structure and syllabi, and take corrective steps.

It is one of the core engineering disciplines, and given the number of students, there is a case for increasing the number of faculty positions. Possibility of providing PhD

D. J. Naranga

fellowships at par with GATE qualified/PhD students at other Institutions like NITs and IITs may be taken up by the University authorities. This will attract better and more PhD students which will help boost to the research activities.

DEPARTMENT OF ELECTRICAL ENGINEERING

The Department of Electrical Engineering was established quite recently, in 2016, with sanctioned faculty strength of only 4. It is offering a BTech programme with the help of contractual and guest faculty members in addition to 3 regular faculty members. The student teacher ratio is about 22:1, and at present there are hardly any research scholars. 5 students qualified GATE from a class strength of about 40.

It is a core engineering discipline, and for it to grow it needs its own space and building infrastructure.

The number of faculty members clearly needs to be significantly increased for the Department to be effective. Another option which may be discussed is to merge this Department with the Department of Electronics and Communication Engineering, perhaps renaming the Department as Electronics and Electrical Engineering or some other suitable name which will be offering two BTech programmes viz. BTech in Electronics and Communication Engineering and BTech in Electrical Engineering. This has been there in some institutes and perhaps justified also for optimal use of resources and better management.

The regular faculty members should take a few research scholars, keeping the logistic constraints in mind, to help increase the academic activities of the Department and the University.

DEPARTMENT OF COMPUTER SCIENCE AND ENGINEERING

It is one of the major departments in the School of Engineering with 21 faculty members and offering a BTech program in Computer Science and Engineering, MTech in Information Technology, MCA and a PhD program in Computer Science and Engineering. There are 50 research scholars, with close to half being women and the student teacher ratio is about 20:1. The Department has been reasonably successful in getting external grants. It has obtained two US patents and a European one. The number of GATE qualified students has also been steady at about 20.

The publication has been steady approaching on the average 20 per year in reputed journals. There have also been books published by reputed publishers such as Springer

and Taylor and Francis. However, Lambert is effectively a predatory publishing concern and should be avoided.

The number of MTech applicants has been steadily going down and the number of selected students in 2018 has been the lowest compared with earlier years. Possible reasons behind this need to be understood before taking any measures.

Although the overall placement of students is better than most departments, placement of BTech students is showing a downward trend since 2014-15, which needs to be understood and addressed.

For all-round development of the BTech students, the number of electives offered from HSS and basic sciences could be increased. It appears a bit less at present.

Although the Department has a few consultancy and/or collaboration with industry this is small compared with the strength and expertise of the Department. Efforts should be made to increase this which may also help in the placements of the students.

The High Performance Computing (HPC) facility needs expansion.

Given the number of number of students and the activities of the Department there is a case for an increase in the number of faculty members.

DEPARTMENT OF MECHANICAL ENGINEERING

The Department established in 2006 has 17 faculty members of which 13 are at the Assistant Professor level. It offers BTech, MTech and PhD programs. The student teacher ratio is about 16:1.

About 6 of the Assistant Professors are without a PhD. They should be encouraged to finish their PhDs at the earliest possible, which will not only help them in their careers but also the Department in terms of its overall research profile.

Due to the above, the number of research scholars are also limited affecting the overall academic productivity of the Department. Possibility of providing PhD fellowships at par with GATE qualified/PhD students at other Institutions like NITs and IITs may be taken up by the University authorities. This will attract better and more PhD students and will be boost to the research activities. Pending this, the Department may look for employees from neighbouring Technical Institutes and from other organisations like the Army as sponsored PhD students. The Department may set suitable admission criteria and academic progress rules for such candidates and recommend to Academic Council for approval.

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Placements including those going for higher studies have been over 50 per cent in previous few years but has dropped to slightly over 30 per cent in 2017-18. This should be understood and emphasis laid on improving this.

The number of GATE qualified students was 22 last year which is reasonable. However, the average number of GATE qualified students for the last three years is almost half of that for the previous two years. This should be looked into by the Department and corrective steps taken.

The Department may initiate the procurement of Universal Testing Machine (UTM) in coordination with other departments like Civil Engineering, and the Sophisticated Analytical Instrumentation Centre.

DEPARTMENT OF FOOD ENGINEERING AND TECHNOLOGY

The Department established in 2006 has 14 faculty members, including an adjunct faculty member. It offers a BTech, MTech, PhD and BVoc programs, with the student to teacher ratio being about 16:1. The Department has been able to get research grants for ongoing projects of over 5 crore rupees. The number of publications in reputed journals has been steady over the last few years and showing an increase in 2017-18. One patent has been granted and 6 have been filed. Collaboration with industry and extension activities have shown a healthy increase. Although the number of NET qualified students has come down in 2018, those placed in a job has shown a significant increase.

In view of huge potential of food industries in this part of the country, entrepreneurship components should be included in the course curriculum to encourage graduate students to be future entrepreneurs.

The Committee is pleased to note that an incubation centre through SM Group Guwahati, and an Organic Food Processing Park through AGR Organic Food Private Limited, Sivasagar, are in progress. These should be pursued vigorously.

The Department may initiate with the University to explore the possibility of ICAR NET qualified fellows receiving PhD scholarship from ICAR.

Mechanism for sustaining the B.Voc course needs to be discussed and thoroughly addressed.

D. J. Barua

DEPARTMENT OF CIVIL ENGINEERING

The Department of Civil Engineering, established in 2009, is one of the smaller engineering departments with a faculty strength of 10, 9 of whom are at the Assistant Professor level. There is only one woman faculty member. Six of the faculty members are pursuing their PhD. It offers a BTech, MTech and PhD; the MTech program having started this year. The student teacher ratio is about 19:1. Responding to the recommendations of the earlier AAA2013 report, the Committee is pleased that laboratory equipment worth 87 lakhs have been purchased.

Faculty members pursuing their PhD must be encouraged to finish their PhDs soon in their own interest and that of the Department. This would enable them to take research scholars and build up research activities in the Department in the near future.

Since almost all but one of the faculty members are young, it would be advisable to recruit one or two at more senior levels to help mentor the young faculty and build up research activities as well.

At present, the research output is not satisfactory, and funding from external agencies could also be better. More project proposals need to be submitted to funding agencies, and emphasis laid on increasing the research output of the Department.

More collaborations with industries are required. Even though there are visible testing/consultancy works, more challenging consultancy works may be explored.

Emphasis must be laid on improving the placement percentage.

The new MTech program must also be carefully evaluated after a few years, with feedback from all stake holders must be taken, and with special emphasis on employment.

The Department of Civil Engineering must take an active part in the Centre for Disaster Management of the University and may work collaboratively with the Department of Environmental Science to add value to their master's course which would perhaps be more attractive than the existing one run solely by the Environmental Science Department.

DEPARTMENT OF BUSINESS ADMINISTRATION

The Department of Business Administration, established in 1995, has 14 regular faculty members in addition to an adjunct faculty and visiting/guest faculty. It offers an MBA, PhD programs in Business Administration and a Master of

A. J. Dhar

Tourism and Travel Management Program. It has about two dozen research scholars working on a variety of themes. The placement records of the passed out students is encouraging. There is also a growing concern for falling demand ratio over the years and students from outside the state.

Given the size of the Department, the number of ongoing projects is limited. Faculty members are encouraged to submit more proposals for project funds.

This also gets reflected in the number of publications which appear to be decreasing. The Committee recommends endeavouring to publish in premier journals and publishers.

It may help for the Department to identify a thrust area where it can really make its mark nationally.

The development fee collected from the students of the Department need to be allocated to the departmental head of account with more flexibility in utilisation of the fund by the Department for different academic activities and asset creation. The departmental affairs committee may be empowered in this respect.

The department may explore possibilities for NBA accreditation in future.

The class rooms need to be more modernised.

Efforts need to be made for attracting students from outside the state.

The students exchange programme need to be focused on both ways exchange.

Department may coordinate with other Departments in the School of Engineering to look into the possibility of starting a 5-year dual degree (BE+MBA) which will have better employment opportunities. Such courses have been in existence in many institutions in India and abroad.

DEPARTMENT OF COMMERCE

The Department of Commerce established in 2014 is one of the young departments of the University. It has 6 regular faculty members all the Assistant

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Professor level. The department offers an integrated M.Com programme. There is also provision for lateral entry. The first batch of students is in the final year of the programme. The number of applicants to intake ratio has been steadily increasing from 11:1 in 2014 to 32:1 in 2018, which is a healthy sign. The student teacher ratio is 22:1, which is on the higher side.

Although the Department is now headed by a Professor from the Department of Business Administration, there is a clear need for appointing further faculty members especially at the senior level who are directly related to the discipline and could devote all their energies to it. This will also help improve the student teacher ratio.

Four of the regular faculty members appear to be without a PhD. Those without a PhD must be encouraged to finish soon in their own interests as well as that of the Department and the University.

The number of research publications is limited. Faculty members are also encouraged to endeavour to publish in the best journals.

The Department may take necessary initiative for attracting students from outside the state as well.

The Department may collaborate with other professional organisations for capacity building programme for the students.

The curriculum and syllabus need to be updated regularly for inclusion of updated requirements in the field of commerce education for better professional career of the students.

CENTRE FOR DISASTER MANAGEMENT

The Centre for Disaster Management, established as early as 1997, has only one faculty member at the Assistant Professor level. It offers a Post Graduate Diploma in Environment and Disaster Management in the distance mode of education and a couple of CBCS courses. Due to its skeletal staff, the activities of the Centre have been very limited.

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Considering the importance of disaster management in the North-eastern region the Centre needs to be strengthened with more faculty members and other infrastructural facilities.

It should have a faculty member at a senior level, preferably at the Professor's level to give overall shape and direction to its activities in addition to more faculty at the younger levels.

Disaster management is a multi-disciplinary area, ranging from technical engineering aspects to management and counselling of persons affected by disaster, and also policies regarding rehabilitation. In addition to appointment of more regular faculty members with diversity of expertise, faculty members from relevant disciplines such as from the Departments of Civil Engineering and Environmental Sciences, from both within and outside the University could be made adjunct faculty members.

Anthropology or sociology of disaster is a growing and relevant field to understand human responses, how people cope with disasters, and evolve policies how best to help and counsel persons affected by disasters. A person from the Department of Anthropology or Sociology with relevant interest and expertise from both within and outside the University could also be made an adjunct faculty member. The Centre needs to collaborate with the Department of Civil Engineering and other relevant departments in making the PGD course attractive and employable. In addition, CDM and Civil Engineering may jointly offer short courses and write joint projects to funding agencies.

The Centre should explore the possibilities of collaboration with state/central disaster management authorities for sustaining the efforts of the centre. There is a piece of collaborative work with the Department of Water Resources, Government of Assam, which is good. But this is very limited.

The Committee covered the following areas of administrative units/activities and facilities of the University in line with the above schedule;

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ADMINISTRATIVE OFFICES, UNITS & FACILITIES

1. Registrar and his officers of administration
2. Finance Section
3. Engineering Cell
4. SC/ST Cell & Hindi Cell
5. Controller of examinations
6. TU Entrance Examination Cell
7. International Office
8. Internal Quality Assurance Cell
9. Dean R & D Cell
10. Intellectual Property Rights Cell
11. Alumni Cell
12. Yoga Centre
13. Health Centre
14. Sports Office & Facilities
15. Cultural Office
16. Library
17. Computer Centre
18. Sophisticated & Analytical Instrumentation Centre
19. Horticulture & Botanical Garden
20. Solar Power Plant
21. Bio-Waste Management Plant
22. Waste to Energy Conversion System
23. Hostels
24. Centre for Innovation, Incubation & Entrepreneurship Cell
25. AICTE Cell
26. Teaching Learning Centre
27. Internal Complaints Committee

OBSERVATIONS AND FINDINGS

INTERACTION WITH REGISTRAR INCLUDING ENGINEERING SECTION

Based on the interaction with the Registrar and other officers attached to Office of Registrar, the committee observed that there is evidence of good leadership in the Administration. The Teaching & Non-Teaching ratio at present is estimated to be 1:1.003, which is at par with UGC guidelines. Most of the office procedures are conducted manually through Notifications & other Orders are communicated electronically. However the Management Information System (MIS) is yet to be integrated by the administration. In this age of digital world all records of the University need to be digitized and integrated in to online system for office management.

D. J. Santhia

The Stock Registers are maintained by all the Academic & Administrative Units of the University. The purchase & procurement are done centrally through the established procedure as per GFR. There is the necessity for decentralization of purchase and procurement. For this a Purchase manual for purchase procedure in tune with GFR need to be formulated.

The legal matters of the University are very efficiently dealt directly by the Registrar. There are only nine Court cases pending before the Courts of Law. The committee also scrutinized the records of RTI cell & found that there are no major concerns related to RTI queries.

The Establishment Section deals with both teaching and administrative and technical staff regarding service matters. The Committee notes that with increased use of ICT the efficiency will be enhanced.

The Hindi Cell under the supervision of a Hindi Officer has been contributing to the implementation of Official language through translation of all circulars into Hindi.

The University adopted outsource policy for engaging contractual employees for cleaning, Hostel, Guest House, catering which are reviewed from time to time. The transport services for students are being hired from ASTC through MoU's and Contracts. As noted earlier contractual service providers to the University should not become entrenched, and there should not be near monopoly of any contractual service provider. This naturally leads to malpractices. It is in the interest of the University and its stake holders to encourage healthy and open competition.

The committee also interacted with the Executive Engineer & other officials of Engineering Cell. It is observed the Cell works on the basis of requirement and case to case basis both for new construction projects and maintenance and renovation. There is no annual plan prepared by the Engineer Cell in this respect.

On the basis of the above findings the committee recommended as follows:

1. The process of e-governance with emphasis on integrated MIS needs to be implemented.
2. The purchase & procurement manual in tune with GFR need to be formulated. The manual may also include disposal rules.
3. A proper manpower policy for professional human resource management needs to be formulated and adopted by the University.

J. Shankar

4. The online file tracking system for Administration, Finance & other offices needs to be in place
5. For monitoring construction activities (Large projects) project-wise Monitoring Committee may be constituted for quality assurance.
6. There should be system of coordination between the Engineering cell, Hostel wardens and the Estate Officer for better repair and renovation measures.
7. The Engineering Cell should assess & prepare an annual plan for repair, renovation & maintenance. For regular maintenance activities, the University may formulate guidelines with focus on more transparency.
8. In those hostels, where there is no hot-water availability, the Engineering Cell may draw plan for its provision in these hostels.

INTERACTION WITH FINANCE OFFICER

The committee members interacted with the Deputy Registrar Finance and other officials of the Finance Section. The Finance Officer post is presently vacant and is looked after by a Professor. The committee members were shown all documents relating to Annual Account, Audit Repots etc. There are some pending Audit observations of earlier years. However, the concerned officials of the Finance Section informed the committee that the para-wise compliance report has been submitted. The Budget estimate has been prepared centrally; however consultation between Academic Departments and Finance Section is very limited. The Finance Section has implemented a software for maintaining financial operations but its integration with Administration is absent.

On the basis of the above findings the committee recommended as follows:

1. The Internal Audit cell of the finance section needs to be made operational.
2. The mechanisms of consultation between Finance with Administrative and Academic Units need to be put in place for better co-ordination.
3. Strict adherence to GFR and other statutory financial guidelines may be ensured keeping in view the pending audit paras of earlier years.

INTERACTION WITH CONTROLLER OF EXAMINATIONS

The committee members interacted with the Controller of Examinations. It is observed that the O/o Controller of Examinations performs the duties relating to admission of students, examination works, disbursement of

A. J. Dabho

Fellowships and holding meetings of the Academic Council. With these multifaceted activities it is observed that Controller of Examinations becomes overburdened with associated activities like disbursement of Fellowship matters etc. There is an online system of registration of students, submission of Grades by the faculty members and online declaration of results. Relative Grade is awarded on the basis of continuous internal assessment through tests, assignments, seminars and quizzes, etc. The number of tests to be taken by a student is four, the last being conducted by the Dean of the concerned school in collaboration with controller of examinations. However, the grading system varies across disciplines and faculty members. The students pointed out that a uniform system of continuous evaluation does not work equally effectively in the different schools. They also raised concern about the efficacy of relative grading system.

After fruitful interactions with the stakeholders, the Committee makes the following recommendations:

1. The office of the Controller of Examinations need to be more focused on core competencies of the examination related works minimising other associated works like admission of students, disbursement of fellowship, conducting meetings etc.
2. The examination reforms need to be initiated with revisiting present system of continuous evaluation to particularly examine whether there could be more flexibility given to individual departments to do their continuous evaluation.
3. The grading system need to be uniform across all courses and disciplines, so that a similarly good student gets a similar grade whether the student be from the sciences, engineering or humanities and social sciences. A critical look at the data on the grading distributions of each Department needs to be looked at by a small committee.

INTERACTION WITH LIBRARIAN AND OTHER OFFICERS IN THE LIBRARY

The infrastructure facilities in the central Library in the University is very good. The library services are digitised to a great extent except that the RFID system is not in place. Presently library services are open for 15 hours on weekdays and 11 hours on holidays. The Committee interacted with the students and research scholars to gather their feedbacks. The committee therefore recommends the following:

1. The library may be operational for at least 16 hours both in weekdays and holidays. However the students may be issued exit slip at the night time for purpose of entry in hostels. This is important

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particularly being a residential University. Usage can be monitored to see how useful the extended hours have been but could be started on a trial basis at the earliest possible.

2. The cafeteria facilities in the library need to be strengthened.
3. The reading rooms need to be facilitated with electrical plug points and air-conditioning.
4. The existing system of procurement of books needs to be reviewed and funds may be allocated on a department-wise basis for more transparency.

INTERACTIONS WITH DEAN (R & D)

The committee interacted with Dean (R&D) for overview of the activities. There is a structured delegation of activities to the office of the concerned Dean with a set up for its office. There is a large number of on-going projects in the University which strengthened the research culture in the University. The committee recommends the following:

1. There should be a monitoring mechanism of the projects at the school/ departmental level at least once in a year.
2. The University must be a generator of new knowledge, and research is a fundamental component of a University. It is heartening to see a large number of faculty members actively engaged in research and publishing in reputed journals. This must contribute positively to the teaching-learning process as students also get into a research culture early in their careers. During the interactions with the students several raised concern about non-completion of courses by many teachers across Departments. It is not clear that this is due to time spent on research, and may have other reasons, but it needs looking into.
3. Policy guidelines may be prepared for allocation of a portion of overhead charges for the development/maintenance of the concerned department, especially scientific equipment. Students raised concern that in several departments some equipment are not functioning.

INTERACTIONS WITH DEAN (STUDENTS WELFARE), HOSTEL WARDENS, PHYSICAL DIRECTOR, NCC AND NSS

The DSW presented a list of different activities in his domain along with the activities of the Student Council. The committee visited all the facilities including hostels. The general impression formed by the committee that there exists very good infrastructural facilities

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like state of art Swimming pool, indoor and outdoor sports facilities, gymkhana etc.

On the basis of the feedback obtained from the students the Committee recommends the following:

1. There should be frequent interactions among the DSW, the Hostel wardens and the student prefects/monitors with regard to hostels and recreational facilities.
2. The DSW should develop an effective procedure to monitor the compliance and adherence by both male and female boarders to Hostel Rules.
3. The University should formulate proper guidelines for hostel timings and leave rules for boarders in consultation with different stakeholders and with emphasis on gender parity. The in-time for hostels may be made flexible for actual users of library and laboratories.
4. The dissemination of audit report of hostel mess fund be known to the student through proper display. The surplus fund, if any, may be utilised for the development of the concerned hostel in consultation with the borders.
5. Regular coaches may be engaged for coaching in sports and games, particularly for football, cricket, badminton, etc.
6. Records of users of different facilities should be computerized with reference to different faculty and staff, families of faculty and staff, etc.
7. Considering the ambit of cultural activities in the University the cultural cell may be strengthened with the involvement of students, teachers and staff.
8. The assessment of operational costs of different facilities vis-à-vis number of different types of users need to be assessed for sustaining the facilities. The user fee may be revised accordingly.
9. The DSW should coordinate with the NSS, NCC for wider participation in the activities. The University may provide need based transport facilities for undertaking different activities by both the NCC and NSS units.
10. There should be annual plan of activities to be chalked by both NCC and NSS units before the academic session begins. The activities need to be more focused on community orientation and outreach activities.
11. The NSS may co-ordinate with other concerned Departments for adoption of villages for resource mapping and community outreach and extension activities. The Centre for Disaster Management may also be involved in such efforts.

D. J. Aikens

INTERACTIONS WITH IPR CELL

The Tezpur University Intellectual Property Rights Cell has shown potential for further growth and development which is evident from the performance and activities undertaken since its establishment. However the time period of grant received from the MHRD has already been over and the Cell is now facing a critical challenge for its sustainability. Concomitantly the manpower strength and activities of the cell has also been reduced.

Considering the potentialities and importance of the Cell the Committee recommends the following:

1. The University should find alternative ways and means for sustaining the cell and its activities. The DoNER ministry/NEC or other institutions may be approached for funding.
2. A part of the overhead revenue of the University may be channelized for fund requirement of the IPR cell.
3. The IPR cell should develop appropriate training modules for capacity building in intellectual property rights and continue its onsite training programme in other institutions.
4. The Cell should make an annual plan of action along with budget estimate for operational expenditure.
5. The Cell may explore for introduction of certificate/diploma courses on IPR issues, and thereby also try to raise revenue on its own.
6. It may also explore for collaboration with other agencies for expanding the horizon of its activities and financial mobilisation.

INTERACTIONS WITH INTERNATIONAL OFFICE

The International Office is mostly doing MOU-based activities and liasioning with foreign students mainly allotted by ICCR. After a threadbare interactions with the concerned officials, the Committee recommends the following:

1. The IO may prepare a vision and mission statement keeping in view internationalisation of Tezpur University in consultation with various stakeholders.
2. A separate hostel for international students needs to be constructed on a priority basis.
3. A dedicated counsellor for international students may be appointed for liasioning with the students.
4. Modalities for global promotion and exploring global consultancy by Tezpur University may be framed for reaching out more

D. J. Barua

international students in different countries with special emphasis on South East Asian Countries.

5. It may facilitate more student exchange programmes in collaboration with foreign Universities.
6. A budget estimate along with plan of activities may be prepared by the IO.

INTERACTIONS WITH TUEE

The Entrance examinations of the University is conducted by a Committee of faculty members formed annually. The said committee undertakes round the year activities for smooth conduct of admission activities in the University. The Committee was impressed with the work being done by the TUEE in this respect. The Committee after threadbare interactions recommends the following:

1. For non-Engineering programmes the weightage of Academic performance of previous examinations may be considered for calculating composite score for preparing merit list of students.
2. Negative marking pattern may be revisited with uniform system followed at national level. Negative marking is essential in multiple choice questions to ensure that one is getting the best students.
3. Participation in Consortium of Central University Entrance Examinations may be explored.
4. Thorough analysis of the results of the Entrance Examination on yearly basis may be done and the outcome may be shared in public domain. To evolve policies, it is of particular interest and importance to know the positions of the TUEE candidates who are actually joining Tezpur University. For example are we getting the toppers of TUEE or are they at the mid-level? If they are at the midlevel we need to introspect on steps to be taken.

INTERACTIONS WITH HEALTH CENTRE

The Committee members visited the infrastructural facilities available at the Health Centre for consultations, tests and other medical facilities. The Centre is well-equipped with pathological test facilities, ECG, X-ray, Counselling room for students, etc. However the sonography unit and the ECG machine were non-functional at the time of our visit. After threadbare interactions with the medical official and also input received from the students and research scholars the committee recommended the following:

D. J. Barua

1. The OPD hours for students may be revisited taking into account the time table of classes for the students.
2. Students' health cards need to be introduced on priority basis.
3. The patients' records should be computerized.
4. Mechanism need to be framed for attending grievances of students and research scholar's for healthcare delivery system of the University.
5. A periodic basic health check for employees is a good measure. For women it should include screening for breast and cervical cancer. Early detection of problems is often very helpful. The periodicity should be decided by the health centre given their logistic constraints and medical advice. In reimbursement schemes, many may not avail of it, consisting more to the University on the long run.
6. A Health Advisory committee of the University may be constituted with representation from Teachers, staff, students and doctors.

INTERACTIONS WITH YOGA CENTRE

The Committee interacted with the Professor in-charge and the trainer and appreciated the initiatives taken by the Centre to sensitize the students and the University community to the ancient Indian Yoga traditions for holistic development of personality. The centre at present undertakes two credit yoga course under CBCS programmes. Considering the importance of Yoga globally and also initiative taken by the MHRD and UGC for expanding the horizon of Yoga culture and traditions, the Committee recommended the following:

1. The Committee recommends strengthening of the Yoga facilities in the campus.
2. Regular trainers may be appointed by the University for expanding the activities.
3. The Centre may start certificate/diploma course on Yoga on priority basis for extending the employment opportunities of the participants.
4. The Centre may explore collaboration with other nationally reputed and ethical yoga teachers for ensuring quality of teaching-learning and practice module.
5. A budget estimate and annual plan of action may be chalked out by the Centre.
6. The Centre may undertake outreach activities for community and extension services as part of the University's social responsibilities.

D. J. Anand

INTERACTIONS WITH CENTRE FOR INNOVATION, INCUBATION AND ENTREPRENEURSHIP AND AICTE CELL

The importance of innovation, incubation and entrepreneurship has been given top most priority in quality sustenance efforts in academic institutions. Accordingly Tezpur University has given it a priority in this respect and it has earmarked Rs.50 lakhs as corpus fund for the same. The Committee visited the office of the CIIE and TUNOVATION, a display room of innovated products. On the basis of inputs received from interactions the committee recommended the following:

1. The Centre may prepare a roadmap for its different activities to be undertaken with more emphasis on co-ordination with IPR cell and other concerned units in the University. While preparing the roadmap the Centre may put emphasis on Lab to land-society-market model for wider coverage and impact of particular innovation. In that regard the Centre should involve the department of Management and Commerce.
2. The entrepreneurship programmes to augment employment of students need to be organised in collaboration with other concerned institution like MSME, IIE etc.
3. The Centre may explore collaboration opportunities across institutions and entrepreneurs.
4. The Centre may participate in MHRD's Atal Ranking of Institutions for Innovation Achievements for assessment and ranking.
5. For transfer of technology it may explore potentialities through co-ordinated efforts.
6. The AICTE cell may organise awareness and training programme on the requirement and criteria of affiliation norms.

INTERACTION WITH SOPHISTICATED ANALYTICAL INSTRUMENTATION CENTRE

The University has created excellent facilities with enough space and large number of state of the art sophisticated equipment on payment of charges from the researchers and others at reasonable rates. The revenue generated has been utilised for maintaining the Centre with substantial matching grants from the University. The Centre also undertakes maintenance works of other equipment available at the different departments. However on the basis of interactions with the students and research scholars the committee recommends the following:

D. J. Barling

1. The Centre may undertake a survey for documentation of all available equipment in different departments and prepare a status report.
2. Mechanism needs to be developed to gather inputs from the students and researchers about functional status of different equipment in the departments for uninterrupted research activities.
3. The Centre may organise training programmes at regular intervals.
4. The centre may collaborate with other national laboratories for the benefit for research scholars who may be interested to undertake analysis there.
5. The differential charges may be devised for students, faculty members and outsiders.

INTERACTIONS WITH THE IQA CELL

The Committee members interacted with Director, IQA Cell for understanding the quality assurance and sustenance efforts in the University. The Committee appreciated the efforts undertaken by the IQA Cell in this respect. However after threadbare interactions with the Director the Committee recommends the following:

1. The manpower and infrastructure of the IQA Cell need to be keeping improved keeping in mind the importance and workload of the cell. One permanent technically and administratively competent staff at supervisory level along with a lower level secretarial staff need to be posted for maintaining all data and helping monitor the performance of different Department and Centres.
2. The IQAC Cell should put in place steps for keeping the digitised records of all the faculty members including their publications, patents etc.

INTERACTIONS WITH TEACHING LEARNING CENTRE

The University has been granted MMMNMTT Teaching Learning Centre by the MHRD. From the interaction with the Director and other faculty members it is observed that the Centre has been playing a very important role in capacity building through conducting short- and long-term training programmes and preparing teaching modules uploaded in the web-platforms. However it is understood that the current funding will continue till 2020 and there is an uncertainty in sustaining the efforts. The Committee therefore recommends the following:

D. J. Pawar

1. The University may formulate a perspective plan for strengthening the Centre.
2. Alternative funding opportunities may be explored for sustaining the Centre.
3. The Centre may co-ordinate more vigorously with all the academic centres and departments of the University for further enhancing its activities.

INTERACTIONS WITH COMPUTER CENTRE

The Computer centre of the University has been providing computer laboratory services to the students and research scholars. The centre also undertakes maintenance of website of the University and develops software for different managerial functions of the University. The centre may explore possibilities for earning revenue through different activities like providing the facilities for different online examinations conducted by various agencies.

The web pages of almost all Departments and Centres are out of date. Steps should be taken to ensure that this is not the case.

INTERACTIONS WITH HORTICULTURE SECTION AND VISIT TO BOTANICAL GARDEN

With the grant received from the Ministry of Forests and Environment, the University has undertaken horticulture activities in the University and created a Botanical garden in the University. Along with different traditional plants the garden also undertakes cultivation of important medicinal plants. The horticulture activities led to earnings of some revenue over the years. As part of diversified activities, the horticulture section started producing in house vermi-compost and the surplus is marketed to nearby areas. The committee recommends for preparing a plan of expansion of the activities of the garden along with marketing of different products and vermi-compost through packaging for more revenue generation.

Also the committee recommends for undertaking a Green Audit for the University.

D. J. Anbar

Putting names to all the trees and also pictures and names of commonly found fauna in the campus in carefully selected locations would add to the students' and faculty members' awareness of the environment.

VISIT TO WATER TREATMENT PLANT, SOLAR PLANTS, BIO-WASTE PLANTS AND WASTE TO ENERGY CONSERVATION SYSTEM

The University has created a very good infrastructure for water treatment, solar plant and Bio-waste plants. However considering the capacity of Bio-waste plants it is underutilised. The University may chalk out plan for collecting bio-degradable waste from the Quarter and other residential areas for capacity utilisation vis-à-vis waste management. There is a waste to energy conservation system in one boy's hostel. This effort needs to be expanded for other hostels.

The committee recommends for framing a policy guideline for waste disposal management in the University.

INTERACTIONS WITH ALUMNI CELL

The committee members interacted with the members of Alumni association of the University. The Alumni association is registered and all passed out students are members of the association by default as during admission student pay enrolment fee for the association. There is a accumulated fund of the association to the tune of Rs.55 Lakhs. However the association is having contacts with only one thousand members. After threadbare interactions with the members the committee recommends the following:

1. The activities of the alumni association need to be revamped with wide participation of alumni across the globe.
2. The association may explore possibilities of opening chapters in different places.
3. The association may take necessary initiative for involvement of alumni in the development of the University.
4. The association may co-ordinate with individual departments for tracking alumni.
5. The association may explore the possibilities of identifying co-ordinators for every batch as they are more likely to know each other.
6. As summarized earlier the silver jubilee year may be a good occasion to try to couple the alumni more closely to the University. A few notable alumni could be felicitated on the occasion.

D. J. Anbar

7. Also having an alumni meet at the time of the Convocation is perhaps not a good idea as the focus is on this important event and there is not much opportunity of the alumni interacting with either the students or the faculty.
8. A senior Professor could be appointed as Dean of Alumni Affairs to oversee and give leadership to get the alumni more closely involved with the University and also contribute towards its activities, placements and infrastructure building.
9. The Dean of Alumni Affairs could also set up a gift shop in the campus selling coffee mugs, T-shirts etc. with the Tezpur University motifs which will also hopefully generate revenue, even if in small amounts.

The Committee also met the students, research scholars and the rest separately, faculty members and the administrative and technical staff. The results of these discussions have been folded into the overall recommendations or those of the individual Departments and Centres.

D. J. Barua

Names & Signatures of the Members of the AAA visiting Team with Date:

Sl. No.	Name	Delegates	Signature with date
1	Prof. Dhruba Jyoti Saikia	Chairperson	D. J. Saikia 2018 Nov 01
2	Prof. Debabrata Chakraborty	Member	 01/11/2018
3	Prof. Archana Sharma	Member	Archana Sharma 01/11/2018
4	Prof. Munindra Kakati	Member	Munindra Kakati 11/11/2018
5	Prof. Niranjana Roy	Member	Niranjana Roy 11/11/18

Schedule A

AAA Visit to Tezpur University: Team A, highlighted ones for both A+B

29/10/2018, Day 1, Monday	9:30-11:00 (A+B)			11:00-11:20	11:30-11:50	11:55-12:15	12:25-12:45	01:00-01:30	01:30-02:00	02:15-02:35	02:45-03:05	03:10-03:25	03:30-03:45	03:50-04:05	04:10-04:25	04:35-05:05
	Presentations at Board Room: VC, Deans (4 Schools, SW, R&D)			CHS	MAT	PHY	EVS	MBT	Lunch	MCJ	LAW	CWS	CID	CAS	COC	EDU
30/10/2018, Day 2, Tuesday	9:30-09:50	09:55-10:10	10:15-10:35	10:40-11:00	11:05-11:25	11:30-11:50	11:55-12:15	12:25-01:10	01:10-02:10	02:15-02:35	02:45-03:05	03:10-03:30	03:35-03:55	04:00-04:20	04:25-04:45	04:50-05:10
	EFL	CEL	CUL	HIN	SOC	SOW	DAB Ch		Lunch	ENE	ECE	ELE	CSE	MEE	FET	CIV
31/10/2018, Day 3, Wednesday, (A+B)	09:30-10:30			10:30-12:30						12:40-01:00		01:30-02:30	2:30			
	Campus visit including botanical garden, Vermicomposting Unit			Finalization of report						Meeting with VC		Lunch	Exit meeting			

CAS: Centre for Assamese Studies
 CEL: Centre for Endangered Languages
 CHS: Chemical Sciences
 CID: Centre for Inclusive Development
 CIV: Civil Engineering
 COC: Community College
 CSE: Computer Science and Engineering
 CUL: Cultural Studies
 CWS: Chandraprabha Saikiani Centre for Women's Studies
 ECE: Electronics and Communication Engineering
 EDU: Education
 EFL: English and Foreign Languages
 ELE: Electrical Engineering

ENE: Energy
 EVS: Environmental Science
 FET: Food Engineering and Technology
 HIN: Hindi
 LAW: Law
 MAT: Mathematical Sciences
 MBT: Molecular Biology and Biotechnology
 MCJ: Mass Communication and Journalism
 MEE: Mechanical Engineering
 PHY: Physics
 SOC: Sociology
 SOW: Social Work
 DAB Ch: Dr. Ambedkar Chair, TU

Prof. Dhruba Jyoti Saikia	Team A	All Academic Departments except the Departments under SoM
Prof. Debabrata Chakraborty		
Prof. Archana Sharma	Team B	Facilities, Adminstration, Student Support along with Academic Departments under SoM
Prof. Munindra Kakati		
Prof. Niranjan Roy		
Team A+Team B		All interactions, Campus visit, Meeting with VC, Deans etc

Report writing: 5:30 to 8:30 pm on 29 and 30 October, 2018 in the Conference Room, TU Guest House

ANNEXURE A

AAA Visit to Tezpur University: Team B, highlighted ones for both A+B

29/10/2018, Day 1, Monday	9:30-11:00 (A+B)			11:00-11:30	11:35-12:05	12:10-12:40	12:45-01:00	01:05-01:15	01:30-02:00	02:15-02:25	02:30-02:40	02:45-02:55	03:00-03:10	03:15-03:25	03:35-03:45	03:50-04:00	04:05-04:20	04:30-05:00
	Presentations at Board Room			REG	FIO	COE	ENC	SC-ST, HIC	Lunch	TUE	INT	IQA	DRD	IPR	ALU	YOC	HEL	SPO & CUO
30/10/2018, Day 2, Tuesday	09:30-09:50	09:55-10:15	10:20-10:30	10:50-11:10	11:15-11:25	11:30-11:50	11:55-12:25	12:30-12:40	12:45-12:55	01:00-01:10	01:10-02:10	02:15-02:25	02:30-03:00	03:05-03:15	03:20-03:40	03:45-04:00	04:10-04:30	04:35-04:45
	COM	BUA	CDM	LIB	CCE	SAI	HOR	SPV	BIM	WTP	Lunch	NSS NCC	Hostels	WTE	CIE	AIC	TLC	Meeting with ICC
31/10/2018, Day 3, Wednesday (A+B)	09:30-10:30			10:30-12:30						12:40-01:00		01:30-02:30	2:30					
	Campus visit including botanical garden, Vermicomposting Unit			Finalization of report						Meeting with VC		Lunch	Exit meeting					

AIC: AICTE Cell

ALU: Alumni Cell

BIM: Biowaste management plant

BUA: Business Administration

CCE: Computer Centre

CDM: Centre for Disaster Management

CIE: Centre for Innovation, Incubation and Entrepreneurship

COE: COE

COM: Commerce

CUO: Cultural Office

DRD: Dean, R&D

DSW: Dean, Student's Welfare

ENC: Engineering Cell

FIO: Finance Office

HEL: Health Centre

HIC: Hindi Cell

HOR: Horticulture Section

HOS: Hostels

ICC: Internal Complaint Committee

INT: International Office

IPR: Intellectual Property Rights Cell

IQA: IQA Cell

LIB: Central Library

REG: Registrar Office

SAI: Sophisticated Analytical Instrumentation Centre

SC-ST: SC ST Cell

SPO: Sports Office and facilities

SPV: 1 MW Solar PV Plant

TLC: Teaching Learning Centre

TPC: Training & Placement Cell

TUE: TU Entrance Examination Cell

WTE: Waste to Energy conversion system

WTP: Water treatment plant

YOC: Yoga Centre

	A+B	
Day 1	05:15-05:45	06:00-06:30
	Faculty meeting	Student meeting
Day 2	05:30-06:00	0:600-06:30
	Non teaching staff meeting	PhD students meeting

Prof. Dhruva Jyoti Saikia	Team A	All Academic Departments except the Departments under SoM
Prof. Debabrata Chakraborty		
Prof. Archana Sharma		
Prof. Munindra Kakati	Team B	Facilities, Administration, Student Support along with Academic Departments under SoM
Prof. Niranjan Roy		
Team A+Team B		All interactions, Campus visit, Meeting with VC, Deans etc and Exit Meeting