6.0 INTRODUCTION

The major findings of the study, their Educational implications and suggestions were presented in this sixth chapter. The findings were based not only on the Analysis of the Data collected through the questionnaire and interview schedule presented in the fifth chapter and also on the data collected through the Documentary materials organized and presented in the second chapter: Progress of Higher Education in Sikkim. In the light of Analysis and Interpretation of the Data, the significant findings and their educational implications that emerged from the study were discussed below.

6.1 Findings related to development of Higher Education in Sikkim

1. The development of Higher education in Sikkim started late and also it was surprisingly slow. Earlier there were only monastic educations for the preparation of Monks to priesthood. By the year 1920, Sikkim had 21 schools (6 government schools, 13 Mission Schools & 2 Schools under landlords). In 1920, the Chogyal (King) of Sikkim reorganized the Education Department and placed it under the administration of a full-fledged Director of Education who was assisted by a ‘board’ under the headship of a president. In 1922, the Education Department was placed under the Judicial Secretary. According to census report in 1975, there were two hundred sixty four schools in Sikkim. After the merger of Sikkim with India, the Department of Education took number of steps for the improvement of education. The total number of government schools in the State in 1975-76 was 264 which in 2004-05 stand at 742. As on 31.10.2002 there were 471 private schools in the state of which 231 pre primary, 114 lower primary, 77 primary, 26 junior, 10 high and 5 senior secondary schools. The state also has two Kendriya Vidyalaya, three Navodaya Vidyalaya, fifty monastic schools, twelve Sanskrit pathsalas and one Madrasa.

2. The Sikkim Board of School Education was set up on September 12, 1978 by the Sikkim Assembly. The Board has power to prescribe curricula, text books and other
related materials for schools and to conduct examinations at the school level in the state of Sikkim.

3. According to notification passed by Government of Sikkim, dated 24th May 2004, the Education Department was renamed as Human Resource Development Department.

4. The education speeded its pace in spreading and reaching the unreachable, which is confirmed by the increase in enrolment in 2004 from 1975. Therefore the total enrolment of students from primary school to senior secondary schools was 20,959 in 1975-76 has increased to 1,21156 in 2004-2005.

5. In 2004-2005 the state government on two major sector of education that is general education and technical education were Rs 1354225 thousands and Rs 12370 thousands. Here the general education includes the school and higher academic education. Large amount of expenditure on general education may be due to ever expanding education including the degree level.

6. In 1998 the District Institutes of Education and Training (DIET) was established in the state in accordance with the recommendations of the National Policy on Education, 1986. So far there is only one DIET at Gangtok to cater to the training of elementary teachers of the whole state. However Government of Sikkim, Department of Education, passed notification No.245/Est-1/Edn, dated: 20.1.2004 which notified the establishment of DIET at Namchi, South District, South Sikkim. Establishment of one more DIET in West Sikkim, Soreng was notified by Government of Sikkim Gazette, Human Resource Development Department, in reference no. 269/Est-I/HRDD dated 9.8.2005. Infrastructure for starting these two DIET is ready but has not started due to lack in trained manpower.

7. State Institute of Education is an academic wing of Directorate of Education that was established in 1978-79. The role of the State Institute of Education is that of advisor, innovator, implementer, inspector, and supervisor for all the academic programmes of the
Education Department. Efforts are on to convert the SIE into the State Institute of Educational Research and Training (SIERT) by strengthening it on the lines of the National Council of Educational Research and Training (NCERT), for better and wider academic pursuits, with a Director/Joint Director as its head as quoted by Mahajan, Baldev, Majumdar Srilekha, Agnihotri D.C., in 1995 in the Educational Administration in Sikkim. However the state has not set up the SIERT till date. Perhaps the delay may be due to lack of qualified, professionally trained and experienced academic resource persons, lack of necessary physical infrastructure and lack of fund. The establishment of SIERT is essential for an all round development in the academic standards, to make effective teaching learning and for producing quality textbooks and teachers’ guides.

8. Department of Education has taken giant step toward achieving quality education by launching a massive programme for training for primary and secondary level teachers. The programme aims at clearing the backlog of about 1600 secondary level and 4000 primary level teachers through IGNOU in a phased manner. These prove that the State Government has taken a keen interest in training the school teachers of the different level of school education in the state. So recruitment of pre trained teachers will take away the financial burden of state government of training newly appointed untrained teachers. Thus it will also solve the problem of clearing untrained teachers.

9. Government of Sikkim, Department of Education, passed notification No. 40/Home/95, dated: 10th July 1995 which notified the setting up of a Directorate of Higher Education and a Directorate of Primary and Secondary Education in the Education Department. However the state setup only Directorate of Primary and Secondary Education and till date the Joint Secretary I is given responsibility to look after higher education in particular. It indicates that till date higher education is not given prime importance as in other states of India. Establishment of Directorate of Higher Education is important in the state to give specific attention and development of higher secondary education, college and university education.
10. The Task Force Committee has been constituted in the Education Department, Government of Sikkim, vide notification No. 01/08/212/2002/EST/EDN, dated August 2, 2002 to examine the necessity and prepare a report for establishment of a separate University in the State of Sikkim. The Committee had submitted a complete report on the subject on 24th January, 2003. The Sikkim University Bill, 2003 (Bill No. 4) of 2003 was introduced in Sikkim Legislative Assembly on 28th February, 2003. The Governor of Sikkim had given his assent on the bill. According to notification no. 5/LD/2003, dated: 24.6.2003, the Sikkim University Act 2003 (Act No.2003) was published. The state has decided to establish affiliating university which conducts teaching and undertakes intensive research.

11. In 1975-76 there were only three colleges in the State. After ten years in 1985-86, the colleges/institutes doubled. In 1995-96, the colleges/institutes increased four times than in 1975-76. In 2004-05, the total number of colleges/institutes has reached sixteen.

12. The colleges of state also started 10+2+3 pattern of structure of education. The hotel management also followed 10+2+3 pattern. Other professional education had 10+2+4 system: ten years of schooling, two years of higher secondary education and four years of undergraduate education like law, engineering, physiotherapy and pharmacy. The medical education required five years of undergraduate course after the twelve years of schooling. The entry into teacher education required minimum qualification as graduate pass to any other higher course.

13. In 2003-2004 the amount of expenditure made for higher education was Rs 23411 thousand as compared to Rs 418191 thousand for school education. The amount of expenditure for higher education by the State government was half the amount of expenditure for school education. It clearly highlighted that the higher education in the state needs an immediate attention to produce skilled, educated, gifted youth for the future of the state.
14. Previously when few colleges were established, the Government of Sikkim selected teachers who were qualified like candidates with post graduate degree and above. Later from 1999 Sikkim Public Service Commission started conducting efficiency test for the selection of teachers for the colleges. As per Government of Sikkim, Gazette no.337/Est.I/Edn dated 1.4.2004 accepted the State Level Eligibility Test Commission, Assam (North- East Region) as the State Level Eligibility Test Commission for the state of Sikkim for conducting the State Level Eligibility Test (SLET) for selection of lecturers in the colleges of Sikkim. For the first time in the history of the State, State Level Eligibility Test was conducted on November 2004.

15. The study revealed that out of the sixteen colleges/institutes in the State only eight colleges/institutes were managed by Government whereas eight colleges/institutes are privately managed. This shows that in Sikkim also private higher education colleges/institutes have come up in large numbers. State Government should see to encourage private initiatives in higher education which takes the financial burden of Government but check the commercialization of these private higher education institutions.

16. It is also noticed that majority 13 number of colleges/institutes were located in East district of the State, 2 number of were located in South district and only 1 number of on the West district of the State. There was no institute of Higher Education in the North district of the State perhaps the district is least populated and the students can easily accommodate in the colleges/institutes of the east district. According to Census 2001, the total population in Sikkim was 5,40,851 of which 41030 was from North District.

17. Enrolment in higher education colleges/institutes has increased drastically for the past five years. It was also seen that enrolment in general colleges were high then the enrolment in professional colleges/institutes perhaps may be the reason that the general courses are easy to study and also may be due to the reason that fees are too high in professional colleges/institutes which hinders the majority of students from poor economic background to go for it. It was also surprising to find out that Sikkim
Government College, Gangtok alone had huge student population for the last five years which could be the reason for the three shifts in the college. According to notification no. 44/Est-I/HRD dated 10th August 2004, morning shift was started in Sikkim Government College Gangtok with the help of part time lecturers. Three shifts in a single college will surely deteriorate the quality of education and the objectives of Higher Education will never be fulfilled. It also does not give justice to the students studying in the government general colleges in Sikkim. It shows the necessity of establishing few more colleges somewhere near Gangtok or other parts of Sikkim to distribute the students population presently crammed in a single general college at Gangtok. Nevertheless to provide further higher education to this increasing population of students from these colleges/institutes, the state urgently needs a State’s own university.

18. There has been steady growth in the number of faculty for the last five years. In 1999-2000 the number of faculty in higher education institutes was 176 which reached 390 in 2003-2004. Whereas rate of growth in the number of faculty is not parallel with the rate of growth in the enrolment of students especially in general colleges.

19. The Sikkim Government College, Gangtok has high ratio of pupil per teacher which is 1:42. The higher the ratio between the teacher and pupil, higher the fatigue level of teachers and lower the chances of individual attention in the classroom. The higher student and a teacher ratio could be one of the many reasons for the low pass percentage in the university examination. The Institute of Hotel Management, Himalayan Pharmaceutical Institute, Sikkim Manipal Institute of Technology, Sikkim Manipal Institute of Medical Sciences and Higher Buddhist Studies & Research Centre has below 1:7 teacher-pupil ratios.

20. The following are the existing colleges/institutes of higher learning in the State-

a. RESEARCH INSTITUTE OF TIBETOLOGY

The Research Institute of Tibetology, Gangtok Sikkim, was conceived by His Highness Sir Tashi Namgyal the then Chogyal (ruler) as a library and Cultural Institute for Buddhist Studies, His Holiness the XIVth Dalai Lama laid foundation stone of the
institute on the 10th February, 1957 and the Late Pandit Jawaharlal Nehru, Prime Minister of India inaugurated it on the 1st October, 1958. The Institute as a Centre of excellence for Bhuddist studies attracted many indigenous and foreign scholars, casual visitors and tourists.

b. SIKKIM INSTITUTE OF HIGHER NYINGMA STUDIES

In 1964, Sikkim Institute of Higher Nyingma Studies, for higher education in Buddhism was the first institution of higher learning in Sikkim, it was also named Sheda. It was established by the then Chogyal (king) of Sikkim Sir Palden Thodup Namgyal in association with His Highness Dujom Rimpoche and His Highness Thuljik Rimpoche and other wise people of the society. In 1983, this college was affiliated to Sampurnand University, Varanasi Sanskrit Viswavidalaya and permanent affiliation was granted to the same university in 1995. In 2000 the college was recognized by UGC.

c. SIR THUDOP NAMGYAL COLLEGE

In 1972 Sir Thudop Namgyal College, the first general college was established in Sikkim. The college was affiliated to North Bengal University. After Sikkim became a part of Indian Union, the Sir Thudop Namgyal College evening college was converted into regular general college in 1977 by the new government of Sikkim.

d. SIKKIM GOVERNMENT COLLEGE, GANGTOK

The Sikkim Government College, Gangtok and it was re established on 5th September 1977 and it was affiliated to North Bengal University in the year 1979.

e. SIKKIM GOVERNMENT LAW COLLEGE

In 24th September 1980 the Government Law College was established by the State government. In the same year, college was recognized by the Bar Council of India (BCI). It was affiliated to North Bengal University in the year on 13th December 1993.

f. KARMA SRI NALANDA INSTITUTE FOR HIGHER BUDDHIST STUDIES

The institute was founded by the glorious Sixteenth Karmapa, Rangjung Rikpe Dorje on November 1981. The institute was recognized by the Sikkim Government as the institute of higher learning in Buddhism on 28th February 1984. Sampurnanand Sanskrit Viswavidyalaya, Varanasi gave affiliation to the institute on April 1987 and permanent affiliation by same university was given in 1998.
In the year 1990, the Institute of Hotel Management, Gangtok, Sikkim was established. It was jointly sponsored by Ministry of Tourism, Government of India and Government of Sikkim. This institute was recognized by National Council for Hotel Management and Catering Technology, Ministry of Tourism, Government of India. New Delhi and affiliated to the Indira Gandhi Open University (IGNOU) to offer degree, diploma and certificate programmes in various disciplines of Hospitality Management.

h. HIMALAYAN PHARMACEUTICAL INSTITUTE

In the year 1990 the Himalayan Pharmaceutical Institution was established by the Rhenock Educational Society which was a registered society. The institute was affiliated to North Bengal University in 2002 and approved by All India Council of Technical education (AICTE) and Pharmacy Council of India.

i. LOYOLA COLLEGE OF EDUCATION

In 1994 Loyola College of Education a Catholic, private unaided institute situated at Namchi, the south district of Sikkim was established. In the same year the college was affiliated to the University of North Bengal.

j. DAMBER SINGH COLLEGE

In 1994 Damber Singh College, a self financing college was established by the Rhenock Educational Society which was a registered society. Vide order No. 1326/R-94 (3) dated: December 1, 1994 the college was affiliated to North Bengal University.

k. SIKKIM GOVERNMENT COLLEGE, NAMCHI

18th August 1995 the Sikkim Government College Namchi was established by State Government. The college was affiliated to the University of North Bengal.

l. SIKKIM MANIPAL INSTITUTE OF TECHNOLOGY

Sikkim Manipal Institute of Technology was a constituent college of Sikkim Manipal University. It was established in 1997 and in the same year the institution was recognized by UGC. Initially it was functioning from Tadong (Central Referral Hospital). It shifted to Majitar in 2000 and reminder was shifted in Jan'2001. It was recognized by All India Council of Technical Education.
m. GOVERNMENT SANSKRIT MAHAVIDYALAYA GYALZING
28th August 1997 Government Sanskrit Mahavidyalaya was established by the state government. The college was affiliated to Sampurnanda Sanskrit University, Varanasi on 13th November 2002 vide order No. G.4882/02.

n. ADVANCED TECHNICAL TRAINING CENTRE AND CENTRE FOR COMPUTERS AND COMMUNICATION TECHNOLOGY
The Advanced Technical Training Centre and Centre for Computers and Communication Technology was established by State government on August 1999. These two polytechnics are being setup under the World Bank assistance “Third Technician Project” of the Government of India. The courses offered have been approved by the All India Council for Technical Education (AICTE).

o. SIKKIM MANIPAL INSTITUTE OF MEDICAL SCIENCE
Sikkim Manipal Institute of Medical Science was a constituent college of Sikkim Manipal University. It was established in 2001. It is recognized by Medical Council of India and the Government of India.

p. HARKA MAYA COLLEGE OF EDUCATION
In 2003, Harka Maya College of Education was established in 2003 by the Rhenock Educational Society. The college was affiliated to the University of North Bengal and recognized by NCTE.

q. PAKIM PALATINE COLLEGE
Pakim Palatine College was established by the Pakim Palatine Educational Society in 2004. The college is affiliated to North Bengal University.

r. SIKKIM GOVERNMENT COLLEGE, NAMCHI
Sikkim Government College Rhenock was established in 2005 and it is affiliated to University of North Bengal on 1st September 2005.

6.2 Findings related to General Information
1. The rate of growth of colleges/institutes in the State was slow. From 1977-1980, only two colleges were established they were Sikkim Government College, Gangtok and Sikkim Government Law College. After a long gap of ten year from 1990 the rate of growth of colleges picked up pace. As seen from above it necessarily implied that Higher
Education has remained neglected for a very long period. It requires urgent attention from the Central Government and the State Government so that the young generations are not left only up to school education or bachelor degree level.

2. Affiliation of colleges/institutes

The general colleges government and private, colleges of education, law college and pharmaceutical institute were affiliated to North Bengal University, West Bengal. Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science were the two constituent colleges of Sikkim Manipal University, Gangtok. However only the Hotel Management Institute which offered B.Sc in Hotel Management and Administration was affiliated to Indira Gandhi National Open University (IGNOU), New Delhi. It showed that 70 percent the general and professional colleges/institutes were affiliated to a University which was located in West Bengal due to absence of University in the State itself. Hotel Management Institute was also affiliated to IGNOU for awarding degree which surely wouldn’t have been a problem if there would have been a university in State. Therefore it also stressed the necessity of University in a State.

3. Recognition of colleges/institutes

a. Recognition by UGC

The following 40 percent colleges/institutes such as Sikkim Government College, Gangtok and Sikkim Government Law College, Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science were recognized by UGC. The remaining 60 percent colleges /institutes were in the process of being recognized by UGC.

b. Recognition by State Government

The study revealed that 100 percent colleges/institutes both government and private under study were recognized by the State government of Sikkim.

c. Recognition by Councils

It was found out that all the professional colleges/institutes were recognized by their respective councils such as Sikkim Manipal Institute of Technology were
recognized by All India Council of Technical Education (AICTE). Himalayan Pharmaceutical Institute were recognized by All India Council of Technical Education (AICTE) and Pharmacy Council of India. Sikkim Government Law College was recognized by Bar Council of India (BCI). Institute of hotel management was recognized by National Council for Hotel Management and Catering Technology (NCHMCT). Harka Maya College of Education was recognized by National Council of Teacher Education (NCTE) whereas Loyola College of Education had applied for recognition from NCTE.

4. Assessment

All the ten colleges/ institutes under study were yet to be assessed by National Accreditation and Assessment Council (NAAC) and National Assessment Board (NAB). It is essential for institution of higher education to be assessed by NAAC to attain and sustain the standard set by it for all the colleges/institutes for maintaining quality in higher education.

5. Courses offered

Table No. 148: Courses provided in the college/institutes

<table>
<thead>
<tr>
<th>TYPE</th>
<th>NAME OF THE COLLEGES</th>
<th>MANAGEMENT</th>
<th>COURSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>General</td>
<td>Sikkim Government College, Gangtok</td>
<td>Govt.</td>
<td>BA, BSc, BCom, BA (TM)</td>
</tr>
<tr>
<td></td>
<td>Namchi Government College</td>
<td>Govt.</td>
<td>BA</td>
</tr>
<tr>
<td></td>
<td>Damber Singh College</td>
<td>Private</td>
<td>BA</td>
</tr>
<tr>
<td>College Of</td>
<td>Loyola College of Education</td>
<td>Private</td>
<td>B.Ed</td>
</tr>
<tr>
<td>Education</td>
<td>Harka Maya College of Education</td>
<td>Private</td>
<td>B.Ed</td>
</tr>
<tr>
<td>Law</td>
<td>Sikkim Government Law College</td>
<td>Govt.</td>
<td>LLB, LLM</td>
</tr>
<tr>
<td>Technical</td>
<td>Sikkim Manipal Institute of Technology</td>
<td>Private</td>
<td>B.Tech, BCA, BBA, M.Tech, M.Sc, MCA, MBA, Mphil</td>
</tr>
<tr>
<td></td>
<td>Himalayan Pharmaceutical Institute</td>
<td>Private</td>
<td>D. Pharm, B.Pharm, M.pharm</td>
</tr>
<tr>
<td>Medical</td>
<td>Sikkim Manipal Institute of Medical Science</td>
<td>Private</td>
<td>MBBS, BPT, BMLT, B.Sc (Nursing), M. Sc</td>
</tr>
</tbody>
</table>
The study revealed that majority of general colleges offered bachelor degrees in different disciplines. The government general colleges offered B.A, B.Sc, B.Com, and B.A. (Tourism Management). The private general college and colleges of education offered B.A and B.Ed course respectively. Beside bachelor degree the law college offered LLM, the Sikkim Manipal Institute of Medical Science offered MBBS, BPT, BMLT, B.Sc Nursing, M.Sc in medical science such as Anatomy, Physiology, Biochemistry and Microbiology. The Sikkim Manipal Institute of Technology offered B. Tech in computer engineering, electronics and communication, Electrical & Electronics, Information Technology, Mechanical Engineering, Bachelor in Computer Applications (BCA), MCA, M.Tech in Power Electronics, Information Technology, Communication, M.Sc in electronics, MBA and M Phil in mathematics, physics, chemistry.

6. Programme of Classes
Full day classes were run by 70 percent colleges/institutes under study. Whereas Sikkim Government College, Gangtok carried out three shifts such as morning, day and evening programme of class. Sikkim Government College, Namchi carried out morning and day shift. Damber Singh College carried out only morning shift. The reason for these shifts was due to large enrolment in these general colleges. It implied the urgent need of more colleges to avoid overcrowding of those colleges and proper management of colleges which in turn contributes to the quality education.

7. Recruitment of teachers
The study revealed that teachers in higher education were recruited as per the UGC norms in 70 percent colleges / institutes whereas only 30 percent of colleges /institutes recruited teachers on the basis of interview.

a. Sikkim Public Service Commission conducted State Level Eligibility Test and proficiency test for the selection of teachers of government general college and government law college and the candidates should also fulfill UGC norm (55
percent in master’s degree and NET/SLET qualified). 20 percent teachers of Law College were on deputation from other departments of government of Sikkim.

b. The aspiring teacher candidates having fulfilled UGC norm (55 percent in master’s degree and NET/SLET qualified) were recruited in colleges of education and technical institute that is Himalayan Pharmaceutical Institute.

c. Board of Governor of Institute of Hotel Management recruited teachers though the institute was managed by State Government.

d. Selection Committee constituted by Vice – chancellor of University recruited the teachers of Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science. 17.24 percent teachers of Medical College were transferred from (MAHE) Manipal Institutes of Higher Education of other places like Karnataka and Nepal.

e. Teachers in private general college and colleges of education were recruited by Managing committee constituted by management.

8. Qualification of teachers

Qualification of teachers serving in Higher Education is presented as follows:

• The government general colleges had 58.33 percent teachers with MA degree, 2.38 percent teachers with MA in Tourism Management, 16.66 percent teachers with M.Sc, 8.33 percent teachers had M.Com, 1.19 percent teachers had M.Phil and 11.90 percent teachers had PhD.

• A private general college had 50 percent teachers with MA degree, 16.66 percent teachers were M.Sc degree, 33.33 percent teachers were with M.Phil and 16.66 percent teachers were with PhD degree.

• However Law College also had all teachers with master degree of which 35.71 percent teachers were MA and 50 percent with LLM degree and 14.28 percent teachers were with Ph.D degree.

• In the Institute of Hotel Management 87.5 percent teachers were with only Diploma in Hotel Management and 12.5 percent teachers were with MBA respectively.
• Teachers serving in the colleges of education had all teachers with master degree of which 37.5 percent had MA degree, 25 percent teachers were with M.Sc degree, 62.5 percent teachers were with M. Ed degree, 18.75 percent were with M.Phil degree and 12.5 percent were with PhD degree.

• The medical institute had 47.5 percent teachers were with bachelor degree that is MBBS however 52.49 percent teachers were with master degree of which 8.33 percent teachers were with M.Sc degree, 21.66 percent teachers were with M.S degree and 22.5 percent teachers were with M.D degree.

• There were two technical institutes; they were Sikkim Manipal Institute of Technology and Himalayan Pharmaceutical Institute. So the teachers of Himalayan Pharmaceutical Institute had 33.33 percent teachers had bachelor degree and 66.66 percent had master degree. The teachers of Sikkim Manipal Institute of Technology such as 42 percent had bachelor degree that is B.E, 48 percent teachers were with Master degree of which 7 percent teachers were with MBA degree, 9 percent teachers were with M.Sc degree, 3 percent teachers were with MCA degree, 29 percent teachers were with M.Tech degree and 10 percent were with PhD degree.

Therefore it was found out that in higher education colleges/institutes under study, there were total 7.25% of teachers with PhD degree, 1.61% with M.Phil, 60.72% with master degree, 26.61% with bachelor degree and 1.88% with diploma degree.

9. Teaching experience

With reference to teaching experience the study revealed that

- Teachers of government general colleges had 2-12 and 16-29 years teaching experience in teaching BA, 1-17 years teaching B.Sc and 2-10 years in teaching B.Com.
- In case of private general college, teachers had teaching experience 3-5 years only.
- Teachers of government Law College had 2-5 years, 14-20 years of teaching experience.
- The teaching experiences of teachers of college of education were 2-9 years.
- The teachers of Himalayan Pharmaceutical Institute had 2-3 years and teachers of Sikkim Manipal Institute of Technology had 2-8 years of teaching experience.
- The medical institute had teachers with 2-10 years and 11-25 years teaching experience.
- Teachers of government institute of hotel management had 4-8 years of teaching experience.

10. Student’s Admission

The study revealed that students were given admission based on merit in law college and institute of Hotel Management. Entire student from Sikkim who sought admission, provided they fulfilled the required criteria that was class XII pass were granted admission in government general colleges. Common Admission Test was conducted by the North Bengal University, West Bengal to select students in Colleges of education and 10 percent students of colleges of education were on deputation from various schools of the state. Written test was conducted by the Sikkim Manipal University to select students in Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of medical Sciences. Students in Himalayan pharmaceutical Institute was given admission based on the individual performance in interview and previous examination marks. It showed the need of Common Admission Test (CAT) to be conducted in the State for selection of students based on their capability and previous examination performance which will prevent stagnation and wastage in higher education.

11. Reservation

Government General Colleges had no particular reservation/ quota available as these colleges granted admission to all students. The Law College Education granted ten percent, Hotel Management Institute granted five percent and Medical Institute granted twenty two percent reservation for SC/ST/OBC students. Twenty percent reservations for students of Sikkimese origin were given in the Colleges of Education, Sikkim Manipal Institute of Medical Sciences and Sikkim Manipal Institute of Technology. The Sikkim Manipal Institute of Medical Sciences and Sikkim Manipal Institute of Technology gave twenty percent reservation for students of North East State and three percent for children of Defense personnel serving in the area.
12. Courses opted by students

The study revealed that students opting for different discipline in Higher Education are as follows, private general college (100%) and government general colleges (61.01%) had opted Humanities. Science discipline was opted by students of Sikkim Government College Gangtok (19.49%). 9.74 percent students of Sikkim Government College Gangtok had opted Commerce and Mathematics discipline. 100 percent students of colleges of education, law college, institute of hotel management and Himalayan Pharmaceutical Institute had taken B.Ed, LLB, B.Sc in hotel management and B.Pharm respectively. 88.23 percent students of Sikkim Manipal Institute of Technology had taken Engineering and the students of medical institute: 46.66 percent had opted Medical course, 20 percent had opted Physiotherapy, 20 percent had opted M.Sc in Medical microbiology, Biochemistry and 13.33 had opted nursing.

The study also found out that students from professional colleges/institutes such as 50 percent students of government institute of hotel management, 39.21 percent students of technical institutes, 37.33 percent students of medical institute, 25 percent students of colleges of education, 20 percent students of law college mentioned that it was easy to get job after completing this course. It implied that according the students are aware and felt the need to go through skilled based course for getting employment after the course.

13. Options

The study showed that (51.26%) students of government general colleges mentioned that there were not enough options to choose from subjects provided in colleges. Whereas the students from rest 80 percent colleges mentioned that enough optional subjects were available to choose. It was seen that availability of enough options are important or cafeteria approach which allows the students to choose subjects according to interest and choice.

14. Students organization

The study revealed that only 30 percent colleges under study had student’s organization, the colleges were Sikkim Government College Gangtok, Sikkim
Government College Namchi and Loyola College of education. Rest 70 percent colleges did not have any body of student’s organization. Existence of students’ organization is very important in colleges/institutes to represent the students’ body and to fill the gap between teachers and students. It was also revealed that the functions of students’ organization were not clear to the students of the colleges/institutes. The functions of the organization should be clearly stated so that the organization can carry on their work for the welfare of students.

6.3 Findings related to Infrastructure
1. College/institute building

The study found out that 80 percent colleges/institutes under study had their own college building but the government law college and institute of hotel management did not have their own college building and the classes were run in rented building. The 100 percent teachers of Sikkim Government College Gangtok and 51.26 percent students mentioned that the college building was insufficient. Despite having very less number of government colleges, the infrastructure was in a poor state. Own college building is important for the sake of students.

2. Classroom condition

The study revealed that 100 percent colleges/ institutes under study have well lighted and ventilated classroom but the Sikkim Government College Gangtok mentioned that the classrooms were overcrowded and it was difficult to accommodate large number of students. It indicated the need for improvement in infrastructure of colleges.

3. Furniture

The study found out that 80 percent colleges/institute such as government general colleges, private general college, Law College, institute of hotel management, private technical institutes and medical institute stated that long bench and desk was provided to the students. 20 percent colleges such as Loyola College of Education mentioned that single bench and desk was provided and Harka Maya College of Education mentioned that long desk and plastic chairs were provided.
It was shown that 70.76 percent students of Sikkim Government College Gangtok and 30 percent students of private general college mentioned that the college did not have the sufficient number of furniture. Perhaps this may be due to large enrolment in general colleges.

4. Laboratory

The study revealed that 80% colleges/institutes under study had adequately equipped laboratory/workshops however private general college, law college stated that the laboratory/workshop was not needed in the college.

5. Indoor games

The study showed that 40% colleges/institutes such as Loyola College of education and government general college (Sikkim Government College Namchi) and technical institute (Sikkim Manipal Institute of Technology) had separate room for indoor games. Whereas 60% colleges/institutes such as private general college, law college, institute of hotel management, medical institute, Sikkim Government College Gangtok and technical institute (Himalayan Pharmaceutical institute) did not have separate room for indoor games. Facilities for indoor games are important as it provides a way to channelize the stress and provide entertainment to both teachers and students.

6. Office room

The study revealed that 100 percent colleges/institutes under study had separate room for Principal and Office rooms. The 20% college/institute such as law college and institute of hotel management did not have separate section for various department so separate room for head of the department did not arise. 10% college that is private general college had separate department but there was no provision for separate room for head of the department.

7. Types of room for teachers
a. Teacher’s Single room

The single room for teachers was provided in 10% college that is Loyola College of Education only.
b. Room shared by 2-3 teachers
20% colleges/institutes such as the law college and Himalayan Pharmaceutical Institute provided a room which was shared by 2-3 teachers.

c. Departmental Room
30% colleges/institutes that is Sikkim Government College Gangtok, Sikkim Manipal Institute of Medical Sciences, Sikkim Manipal Institute of Technology provided room in each department which accommodated teachers of respective department.

d. Large Common Room
40% colleges/institutes such as Sikkim Government College Namchi, private general College, institute of hotel management, Harka Maya College of education provided a large common room to accommodate all the teachers teaching in the colleges/institutes.

8. Teachers’ Common Room
The facilities provided in the teachers’ common room are as follows
a. Magazines- teachers (15.38 %) of Sikkim Government College Namchi and teachers (80%) of institute of hotel management stated that magazines were provided in the teacher’s common room.

b. Journals- teachers (60%) of institute of hotel management stated that journals were provided in the teacher’s common room.

c. Newspapers- teachers (15.38%) of government general colleges, teachers (66.66%) of private general college, teachers (50%) of colleges of education, teachers (80%) of government institute of hotel management quoted that newspaper were provided in the teacher’s common room.

d. Lockers- teachers (15.38%) of government general college, teachers (50%) of colleges of education, and teachers (60%) of government institute of hotel management stated that lockers for each lecturer were provided in teacher’s common room.

e. Writing Table- 100% teachers colleges/institutes such as government general colleges, private general college and government institute of hotel management stated that writing table was provided in the teacher’s common room.
9. Auditorium

The study showed that 70% colleges/institutes such as government general colleges, private general college, colleges of education, medical college and technical institute (Sikkim Manipal Institute of Technology) had auditorium hall. Whereas 30% colleges/institutes such as law college and institute of hotel management, Himalayan pharmaceutical institutes did not have auditorium hall.

10. Computer Room

The study indicated that except law college, 90% colleges/institutes under study provided computer room. 100 percent teachers of private general college mentioned that they had to use computer available in the college for computer course. While 100 percent teachers of government general colleges, law college, technical institute (Himalayan Pharmaceutical Institute) pointed that computer facility was not provided to the teachers. The use of Information and Communication Technology is important to face the challenge of globalization for which the availability and access to computer is essential.

11. Internet facility

The study revealed that 30% colleges/institutes such as Loyola College of Education, Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science provided internet facilities for students in the college. While 70% colleges/institutes such as government general colleges, private general college, law college, institute of hotel management, Harka Maya College of Education and Himalayan Pharmaceutical Institute did not provide internet facilities for students.

12. Library Room

The study showed that 90% colleges/institutes under study had separate room for library whereas only law college did not have separate room for library. Library in law college was in the large room in office, where reading table and chairs were provided for students to consult books.

90 percent colleges/institutes under study provided the reading room in college library. The reading room of 20% colleges/institutes under study did not have well
lighted and spacious reading room. Separate well lighted reading room is important to make full use of the available books and also to inculcate reading habits among students.

13. Boys and Girls Common Room

The study indicated that only 20% colleges/institutes such as a government general college (Sikkim Government College Namchi) and technical institute (Sikkim Manipal Institute of Technology) had separate common room for girls and boys. Whereas 80% colleges/institutes such as private general college, law college, institute of hotel management, colleges of education, medical institute, a government general college (Sikkim Government College Gangtok) and technical institute (Himalayan Pharmaceutical Institute) did not have separate girls and boys common room.

14. Gymnasium

The study showed that gymnasium was not available in 100 percent colleges/institutes under study in the state.

15. Playground

The study indicated that only 20% colleges/institutes such as Loyola College of Education and a technical institute (Sikkim Manipal Institute of Technology) had separate playground for different games. Whereas 80% colleges/institutes such as government general colleges, private general college, law college and institute of hotel management, medical institute, Harka Maya College of Education and technical institute (Himalayan Pharmaceutical Institute) did not have separate playground for different games. Separate playground for different games makes the organization of co curricular activities possible.

A private technical institute (Sikkim Manipal Institute of Technology) had separate playground for football. Separate playground for basketball, badminton and volleyball were provided in Loyola College of Education and a technical institute (Sikkim Manipal Institute of Technology).
16. Teaching aids

It has been found out that majority (80%) of colleges/institutes had facility for the use of teaching aids. Whereas 20% colleges such as Law College and Sikkim Government College Namchi did not have the facility of teaching aids.

a. Projected Teaching Aids

The study revealed that 80% colleges/institutes had Over Head Projector (OHP). 30% colleges/institutes such as Loyola College of Education, Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science also had VCR, VCD and Computers as the projected A-V aids. Only 10% college that is Loyola College of Education had television. 20% institute such as medical institute and Sikkim Manipal Institute of Technology had Laser Compact Disc (LCD).

b. Non Projected Teaching Aids

Models as non projected aids were provided in the 60% colleges/institutes. Whereas 10% college that is Loyola College of Education had tape recorder as non projected audio aids. Non projected audio-visual aids were not available in 40 percent colleges/institutes under study.

It implied that majority of colleges/institutes in the state had projected and non projected visual aids. It is essential for all colleges/institutes to provide both audio-visual teaching aids which make the teaching learning process effective.

17. Residential Quarter for teachers

The study revealed that only 30% colleges/institutes such as medical institute, Sikkim Government College, Gangtok and Sikkim Manipal Institute of Technology provided residential quarters for teachers. Whereas 70% colleges/institutes such as Sikkim Government College Namchi, private general college, colleges of education, law college, institute of hotel management and Himalayan Pharmaceutical Institute did not provide residential quarters for teachers. It was also found that teachers had to manage themselves for their accommodation. It indicated that accommodation facilities for teachers of all colleges/institutes are essential which gives a sense of security to teachers.
18. Hostel

It was found out that separate hostel accommodation for boys and girls were provided in 60% colleges/institutes such as colleges of education, medical institute, technical institutes and Sikkim Government College Gangtok. Whereas 40% colleges/institutes such as private general college, law college, institute of hotel management and Sikkim Government College, Namchi did not provide hostel accommodation for boys and girls. Sikkim Government College Gangtok mentioned that hostel accommodation was not adequate. 30 percent students of colleges of education, 3.92 percent students of technical institute and 2.53 percent students of government general colleges mentioned that the hostel was not well furnished and well equipped. It indicated that hostel accommodation is essential in all the colleges/institutes which give the chance for students to come together and learn from each other.

19. Transport facility

The study revealed that 69.23 percent teachers and 70.76 percent students of government general colleges stated that transport facility was provided but it was not sufficient. 100 percent teachers and students of private general college, colleges of education, law college, government institute of hotel management, Sikkim Government College Namchi and Himalayan Pharmaceutical Institute and 72.41 percent teachers of medical institute mentioned that transport facility were not available.

20. Satisfaction

The study found out that 100 percent teachers of law college, private general college, 71.79 percent teachers of government general colleges, 44.82 percent teachers of medical institute, 33.33 percent teachers of colleges of education and 31.42 percent teachers of private technical institutes were not satisfied with the existing infrastructure provided for teachers. It indicated that the need for improvement and maintenance of infrastructure in all the colleges/institutes under study. All these inadequacies implied that if education had to be strengthened and developed so as to make them qualitatively rich.
6.4 Findings related to Finance

1. Aided/unaided
   
   It was also noticed that only the government colleges were fully financed by the State government and all the private colleges and institutes were unaided.

2. Budget
   
   The study revealed that 100% colleges/institutes under study prepared annual budget. Budget for government colleges was prepared by each respective colleges and submitted to the finance section of Human Resource Development Department, Government of Sikkim.

3. Auditing accounts annually
   
   It was found that 100% colleges/institutes under study mentioned that accounts were audited annually.

4. Records of receipts and expenditure
   
   The study revealed that records of receipts and expenditure were maintained properly by 100 percent colleges/institutes under study.

5. Total Income
   
   The study revealed that the State Government was a source for law college, government general colleges and government Institute of Hotel Management. 100 percent income of Law college, 99 percent income of government general colleges and 40 percent income of government Institute of Hotel Management was from the State Government. 0.5 percent income of the government general college was from the Central Government. In the year 2002-2003, 60 percent of the total income was from Industrial Sources in the Institute of Hotel Management during the year 2002-2003. 0.5 percent and 20 percent of the total income was from college’s own fund in the government general college and a college of education respectively. The total income was from tuition fee in a college of education (80%), Sikkim Manipal Institute of Technology (90%) and Himalayan Pharmaceutical Institute (86%). A technical institute had also mentioned that
14 percent of the total income was from other sources during the year 2002-2003. It was also found that no other financial assistant other than regular grants were provided to government colleges as mentioned by Finance Officer of Human Resource Development Department Government of Sikkim.

6. Total Expenditure

It was found that 70% colleges/institutes such as the government general colleges, private general college, colleges of education, law college, and institute of hotel management mentioned that the data were not available. Dean of medical institute mentioned that the institute was facing huge deficit annually due to that reason the data was not provided. Only the technical institutes provided with information about the total expenditure of the institute during the year 2002-2003. The Sikkim Manipal Institute of Technology mentioned that 1305.20 lakhs was the total expenditure of which 159.43 lakhs were spent on materials and services, 208.54 lakhs were spent on salaries of teaching staff, 532.86 lakhs were spent on administrative salaries and 404.37 lakhs on overheads. Himalayan Pharmaceutical Institute mentioned that 35 percent were spent in materials and services, 48 percent were spent on salaries of teaching staff, 12 percent were spent on administrative salaries and 5 percent were spent on various overhead. The Government of Sikkim earmarked grants for government colleges in the last five years are given below:

<table>
<thead>
<tr>
<th>Years</th>
<th>Amount allotted</th>
</tr>
</thead>
<tbody>
<tr>
<td>2000-2001</td>
<td>Rs. 3,944,000</td>
</tr>
<tr>
<td>2001-2002</td>
<td>Rs. 2,517,100</td>
</tr>
<tr>
<td>2002-2003</td>
<td>Rs. 2,857,500</td>
</tr>
<tr>
<td>2003-2004</td>
<td>Rs. 2,901,800</td>
</tr>
<tr>
<td>2004-2005</td>
<td>Rs. 4,516,200</td>
</tr>
</tbody>
</table>
7. Financial Assistance

It was revealed that College building grant was received by 20% colleges/institutes such as law college and institute of hotel management. 100 percent colleges/institutes under study received scholarship grant. 100 percent colleges/institutes under study never received the science laboratory grant, post graduate development grant, library grant and deficit grant-in-aid to pay to the teachers. It was also found that No financial assistant was provided to private colleges/institutes in the state. Financial assistance from higher authorities such as state government, UGC etc are important for development and maintenance of colleges/institutes.

8. Salary for teachers

The State Government was the source of salary for government general colleges and law college. Private colleges/institutes paid teachers salary entirely by management. Only the salary of teaching staff of Institute of Hotel Management was paid partly by government and partly by management.

9. Allowances

The study indicated that 100 % colleges/institutes under study provided House Rent allowance and Dearness Allowance. Only 20 % institutes that are Medical institute and a technical institute that is Sikkim Manipal Institute of Technology provided Medical allowance. 80 % colleges/institutes such as Government general colleges, private general college, law college, technical institutes, medical institute and institute of hotel management provided GPF. A pension facility was provided by 30% colleges such as government general colleges and Law College whereas rest of the college/institutes under
study did not provide pension facilities. Hill Area allowance was provided by 70% colleges/institutes such as government general colleges, law college, medical institute, technical institutes and Harka Maya College of Education.

10. Advance increment

The study revealed that 80% colleges/institutes such as government general colleges, private general college, law college, medical institute, technical institutes and a college of education provided advanced increment for higher qualification. Whereas 20% colleges/institutes such as institute of hotel management and a college of education mentioned that they did not provide advanced increment for higher qualification.

11. Salary

The study revealed that 100 percent teachers of all the colleges/institutes under study stated that they received salary regularly. 100 percent teachers of 60% colleges/institutes such as government general colleges, private general college, colleges of education, law college stated that UGC scale was given if teachers were regular appointee and had fulfilled the UGC criteria. The teachers of government colleges also revealed that adhoc teachers were given consolidated pay scale of 12000 per month. 100 percent teachers of government institute of hotel management mentioned that they were paid State Government Pay Scale. Teachers of technical institutes: 17.14 percent teachers of teachers stated that they were paid UGC scale if teachers were regular appointee and had fulfilled the UGC criteria and 11.42 percent teachers of mentioned that they were paid management scale. 100 percent teachers of medical institute mentioned that they were paid UGC but modified pay scale.

12. Scholarships

The study revealed that stipends to ST/SC/OBC were provided in 100 percent colleges/institutes under study.

Stipends for handicapped students were provided in 20% college under study that is Sikkim Government general colleges which was sponsored by Government of Sikkim. Management sponsored free medical check up as well as hospitalization in 20%
colleges/institutes such as Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology. Respective management provided grants for excursion/field trip in the 40 percent colleges/institutes such as government general colleges, medical institute and a college of education. 100 percent colleges under study did not provide Book Grant while 100 percent student of all the colleges/institutes under study stated that students get merit scholarships from their respective state for higher education.

Financial assistance provided by Government of Sikkim to Sikkimese students pursuing Higher Education outside the state such as:

(i) merit scholarships for those students who secured 70 percent in class XII were given Rs.800 per month for higher education and Rs.1200 per month for those students who pursued honours courses in graduation level in mathematics, Physics, Chemistry, English, Economics, Statistics, B.Sc (Maths/Bio), B.Ed (integrated) and B.Com.

(ii) general scholarships for those student who secured less than 70 percent in class XII were given Rs.800 per month for MBBS, BDS, BE, B.Tech, BHMS, B.Sc(Ag), BHM outside the state, BCA, M.Sc(Ag), M.VSc & AH, M.Sc, MD, MS, M.Tech, MBA, LLM, MCA, MA geography. Rs.1200 per month who pursued honours course in graduate level in mathematics, physics, chemistry, English, statistics, economics, B.Sc(math/bio), B.Ed (integrated) and B.Com pursued by OBC/SC/ST candidate at graduation level. Rs.2000 per month for pursuing post graduate degree courses in mathematics, physics, chemistry, English, economics, statistics, B.Ed, M.Ed and M.Com. Rs.2500 per month for pursuing M.Phil and Ph.D course. Scholarships were also available for diploma courses for which Rs.500 per month for Diploma in Engineering, printing, photography, cinematography, medicine, CCCT, ATTC, three year degree course in Institute of Hotel Management, Catering Technology and Applied Nutrition, Gangtok. Rs. 300 per month was available for diploma course in Institute of Hotel Management, Catering Technology and Applied Nutrition.
In spite of the financial problem (inadequate scholarships) many of the students of all the colleges/institutes under study were not interested to make any move.

13. Free ships

There was no provision for providing free ship to students of higher education in the state.

14. Fees

It was indicated that students of colleges of education (87.5%), students of technical institutes (86.27%), students of medical institute (84%), students of institute of hotel management (70%), students of law college (40%), and students of private general college (35%) mentioned that the fees charged were too high. This showed that majority of students from professional colleges/institutes had complained that fees charged were high.

15. Financial Problem

Only 40% colleges/institutes under study mentioned financial problem. Loyola College of Education mentioned that no aids were provided to colleges and as it was a self financing institution so it was difficult to manage. Medical institute mentioned that increasing need of fund for development and maintenance of institute. In case of technical institute (Sikkim Manipal Institute of Technology) and institute of hotel management needed additional funds for research and development purpose. Amazingly the private general college stated that they did not have any financial problem. Awasthi, J.N., (1981) 38 also reported that the adequate finances were not available for the expansion of buildings and provision of adequate library and laboratory facilities. Jaganmohan, M., (1983) 39 reported that the financial problems could be considered from two angles, namely, the scarcity of funds even to pay salaries and scarcity of funds for development purpose including funds for the construction of buildings, and for meeting library and laboratory expenditure.
6.5 Findings related to Administration

1. Adequate Staff

The responses from the principal of colleges revealed that 100% colleges/institutes under study were provided with adequate office staff to assist in the official work whereas the official staff of government and private general college quoted that there was lack of adequate number of office staff which had resulted over burden to the staff presently working in college office.

2. Governing Body

The study revealed that 30% colleges which were managed by government did not have governing body. However the Institute of Hotel Management which was managed by government had governing body. Whereas 100% private colleges/institutes both general and professional had governing body with varied function. It was revealed that planning the whole one year programme of college, recruitment of teachers, preparing budget of institute or decision on finance, disciplinary matters regarding students and disciplinary matters regarding teachers were the functions of Governing Body of colleges/institutes.

Majority teachers were not the member of governing body whereas 33.33 percent teachers of colleges of education, 11.42 percent teachers of technical institute and 6.89 percent teachers of medical institute were the member of governing body.

3. Self study Report

The study revealed that 40% colleges/institutes such as government general colleges, private general college and government Law College did not prepare Self Study Report. However 60% colleges/institutes under study prepared Self Study Report and it was also revealed that the report was prepared annually. Preparation of self study report helps the colleges/institutes itself to evaluate its own performance and plan for future development.
4. Innovation in management tool

Concerning innovation or changes in the management since 1999, the study revealed that 70% colleges/institutes such as government general colleges, private general college, colleges of education, medical institute and Sikkim Manipal Institute of Technology made innovation or changes in the management tool. However 20% colleges/institutes such as Law College, the institute of hotel management and Himalayan Pharmaceutical institute revealed that there was no any important innovation or changes in management tool.

The study revealed that Sikkim Government College Gangtok, Loyola College of education had introduced programme planning. Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology, colleges of education had introduced programme budgeting. The private general college, medical institute, Sikkim Government College Gangtok, Sikkim Manipal Institute of Technology and colleges of education used computers for record keeping. It implied that these colleges/institutes who had brought innovation in management tool felt the need to move according to advance in technology, management and time which surely added strength to management.

5. Factors which occur in the future of the colleges/ institutes

Though 100% colleges/institutes under study stated that these factor will occur in the future such as increase in enrolments, improving the quality of incoming students, improving the quality of teaching and research staff, changes in curriculum to keep pace with changing condition, changes in structural organization of college to meet changing needs, increasing the volume and sources of financing and expansion of facilities. Except institute of hotel management, the other 90% colleges/institutes felt that there will be need of attracting teaching and research staff in great number. It showed that 100 percent colleges/institutes under study were futuristic which gives clear vision for the future of respective colleges/institutes.

6. Obstacles to desirable changes in the colleges/ institutes

The study found out obstacles to desirable changes in the colleges/institutes which are as follows:
- 30% of colleges (government general colleges and law college) had shortage of NET qualified teachers.
- The government general colleges had lack of big lecture halls, no introduction of new subjects, lack of adequate hostel facilities, lack of adequate staff quarters, and lack of adequate sports facilities.
- The law college had small college campus and lack of playground.
- The institute of hotel management revealed lack of adequate fund for development.
- The Loyola college of Education revealed lack of applications for the lecturers and inadequate fund.
- Inadequate number of books in the library and lack of UGC funds for upgradation of laboratory equipments and library were the two major obstacles for Harka Maya College of Education.
- Private General College revealed poor enrolment.
- The Sikkim Manipal Institute of Medical Science had mentioned that increasing need of fund for updating the college.
- Inadequate transportation, placements of students after completion of course and lack of interaction with industry were the main obstacles as stated by technical institutes such as Sikkim Manipal Institute of Technology and Himalayan Pharmaceutical Institute.

It implied that 100 percent colleges/institutes under study were aware of obstacles to desirable changes in the future which will surely help the colleges/institutes to work towards it so that suitable changes can be brought for the betterment of higher education in the state.

7. Information related to planning and improvement

The study revealed that 100% of colleges/institutes under study maintained information about student/teaching staff ratio. 70% of colleges/institutes under study maintained record of distribution of staff time among teaching, research and other activities. Whereas 100% of colleges/institutes under study did not maintain information about rate of drop out - student wastage, ratio of books available per student and unit costs per graduating students. Information related to wastage of students is essential which will help to analyse the reason for the drop out of students and bring suitable improvement in
curriculum etc. Information related to ratio of books available per student helps to know whether the library is adequately stocked with books and information related to unit costs per graduating student also helps the institutes to keep track of income and expenses.

8. Leave facilities

The study revealed that 100% colleges/institutes under study provided leave facilities. 100% colleges/institutes under study provided casual leave, extra ordinary leave, medical leave and maternity facilities. 60 percent colleges/institutes under study provided earned leave. 50 percent colleges/institutes under study provided half day leave facilities. 70 percent colleges/institutes under study provided study leave facilities. Special leave on principal’s discretion were given only in law college as mentioned by 80 percent teachers. Sabbatical leave was not granted to 100 percent colleges/institutes under study. It implied that the 100% colleges/institutes under study provided leave facilities though it is essential to provide study leave, earned leave and sabbatical leave should be provided in all the colleges/institutes.

100 percent colleges/institutes under study stated that there were written rules and regulations related to service condition.

9. Promotion

The study revealed that teachers serving in 100% colleges/institutes under study mentioned that there was prospect for promotion.

The criteria required for promotion in these colleges are as follows:

- UGC criteria
- Higher qualification
- length of service
- teaching experience
- personal appraisal report

10. Extension activities

The study revealed that 70% colleges/institutes under study conduct extension activities for extension of education to the society in general. Whereas 20%
colleges/institutes such as law college and technical institutes did not conduct extension activities.

The government general colleges carried out Extension activities such as Environment education, National Social Service (N.S.S) and National Cadet Corps (N.C.C). The private general college had Environment education and National Social Service (N.S.S). The Harka Maya College of Education had Environment education and Loyola College of education extended education to children of surrounding the college area through Remedial classes for community children. Sikkim Manipal Institute of Medical Science conducted Community Health Programme and Hotel Management Institute carried out Hygiene and Food Science Education to the people in society. It implied that 70% colleges/institutes were trying to extend the education to society as a whole so also law college and technical institutes being a professional colleges/institutes can contribute to the society otherwise these institutes will remain isolated from the problem and present status of society.

11. Record books

Referring to the maintenance of records in colleges/ institutes the study revealed that

- Staff Confidential register were maintained by 40% colleges/institutes such as percent general colleges, Law College and Institute of Hotel management.
- Transfer and certificate register were maintained by 60% colleges/institutes such as percent general colleges, Law College, Technical institutes and Institute of Hotel management.
- Except the Institute of Hotel management all the rest 90% colleges/institutes under study maintain Staff council proceeding book.
12. Student’s welfare activity

Student welfare activity called Teacher Guardian scheme was provided in 20% institutes such as Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology where students were taken care by each nominated teacher guardian. This Teacher Guardian Scheme is very effective to know the specific problem faced by the students and it is the pioneering effort taken by these institutes in the area of students welfare which can be taken as an example by other 80% colleges/institutes.

Rest 80% colleges/institutes under study mentioned that teachers gave personal advice related to academic area, extra classes when student asked them and remedial classes seeing the need of the students and subject area.

13. Problem regarding administration

It was found out that 30 percent colleges/institutes such as colleges of education and Sikkim Government College Gangtok mentioned that there were problem regarding administration. The colleges of education revealed that undue pressure from university is the problem. Whereas Sikkim Government College Gangtok mentioned that inadequate class IV staff, lack of adequate class rooms, classrooms were small to accommodate large number of students, lack of provision of microphone, lack of library fund leading to inadequate library reading materials and lack of library staff were some problem regarding administration. All the above inadequacies implied that adequate attention for the development of colleges was essential which in turn only the growth of higher education can be possible.

6.6 Findings related to Academic

1. New courses

The study found that 50 percent colleges/institutes under study mentioned that the new courses had been added between 1999 and 2003. Whereas 30 percent colleges/institutes under study mentioned that no new courses had been added and 20 percent college/institute was newly established colleges.

The Sikkim Government College had added three year bachelor degree course in B.Sc Mathematics Honours, BA Economics Honours and BA Sociology pass
course. The Namchi Government College had added three year degree course in humanities like BA English Honours, BA Economics Honours, BA Nepali Honours and BA Education Honours. Institute of Hotel Management added the three year course of B.Sc in Hotel Management and Hospitality, Certificate course in Food Production and PB were already been run in the institute. The Damber Singh College added the Certificate in communicative English and Diploma and certificate course in computer. Loyola College of Education and Himalayan Pharmaceutical Institute did not add any other course beside their usual course such as B.Ed. and B. Pharm and D. Pharm. Only Law College and Technical institute introduced master degree course. It has come to notice that general courses were added more than the professional courses. Thus it is essential to add the skill based course also to meet the demand of employment.

2. Research

The study revealed that only 40 percent colleges/institutes such as Sikkim Government College, law college, medical institute, Gangtok and Sikkim Manipal Institute of Technology had undertaken research studies. Sikkim Government College Gangtok, medical institute, and Sikkim Manipal Institute of Technology had undertaken project. Sikkim Government College Gangtok, medical institute, and Sikkim Manipal Institute of Technology had undertaken doctoral research studies. However individual research studies were undertaken only in Sikkim Government College, Gangtok. However 60 percent colleges/institutes under study had not undertaken any research studies. The study also found that teachers of colleges/institutes were also involved in research. 30.76 percent teachers of government general colleges, 20.68 percent teachers of medical institute, 20 percent teachers of law college and 17.14 percent teachers of technical institutes had undertaken research project. National project was taken by 20.51 percent teachers of government general colleges, 20 percent teachers of law college, 17.14 percent teachers of technical institutes and 6.89 percent teachers of medical institute. Teachers of medical institute 3.44 percent had taken international, State research project and 6.89 percent had taken institutional research project. It implied that research is still neglected in the state as perhaps due to non availablity of state's own university which is the centre of major research and finding solution to problems.
3. Curriculum
(i) The study revealed that the University frames curriculum in 90 percent colleges/institutes under study. Whereas only in case of institute of hotel management the curriculum is framed by University and National Council for Hotel Management and Catering Technology.
(ii) 80 percent colleges/institutes under study were satisfied with the existing curriculum except the government general colleges which stated that the curriculum was theoretical and it was vast. However among the teachers of higher education such as private general college (100%), colleges of education (77.77%), law college (60%), government general colleges (53.84%), medical institute (31.03%) and technical institutes (11.42%) were not satisfied with the existing curriculum. Among students colleges of education (65%), law college (60%), government general colleges (43.46%), private general college (40%), medical institute (40%), institute of hotel management (20%) and technical institutes (15.68%) mentioned that they were not satisfied with the existing curriculum. It implied that majority of teachers and students of 50% colleges/institutes were not satisfied with the existing curriculum which will surely effect the product of these colleges/institutes.
(iii) The study revealed that 100 percent colleges/institutes under study stated that curriculum was revised. It was also found out that 30 percent colleges/institutes under study agreed that the curriculum was revised every 2-4 years. 50 percent colleges/institutes under study quoted that the curriculum was revised every 5-7 years. The revisions of curriculum after duration of 5-7 years were too long which makes the curriculum stagnate with old information and outdated ideas.
(v) With regard to the involvement of students, 70 percent students of colleges of education, 60 percent students of Institute of hotel management, 40 percent students of law college, 36.45 percent students of government general colleges, 13.33 percent students of medical college, 10 percent students of private general college and 9.80 percent students of technical college mentioned that students should be involved in framing the curriculum. When asked the reason for their involvement in framing the curriculum it was revealed that students were the ones who had to study so it’s better to take their views that their needs were also taken into consideration. It implied that
students of these colleges/institutes strongly feel that their need should be considered while framing the curriculum.

4. Method of teaching

With regard to the method of teaching used by teachers it was revealed that
- Lecture method was used by teachers of 100% colleges/institutes under study.
- Discussion method and Questioning method was used by teachers of 90% colleges/institutes under study
- Demonstration method was used by teachers of 80% colleges/institutes under study
- Teachers dictated notes in the classroom in 100% colleges/institutes under study: government institute of hotel management (80%), law college (70%), private general college (66.66%), government general colleges (64.10%), technical institutes (54.28%), colleges of education (22.22%) and medical institute (6.89%).
- Field study and project method was followed by teachers of those colleges/institutes which had science stream such as colleges of education, a government general college, technical institutes and medical institute.

It implied that the majority of teachers used lecture method and dictated notes which are traditional method of teaching. Therefore it showed that the teachers should be trained in the skills of teaching and exposed in the psychological techniques and methods of teaching.

5. Participation of students in teaching learning process

- Majority of teachers (above 50%) of 100% colleges/institutes that they encouraged the students to make queries in class to make them participate in teaching learning process.
- Below 35 percent teachers of 90% colleges/institutes stated that they distributed question among students to make them participate in class.
- Below 55 percent teachers of 80% colleges/institutes stated that they equally distributed work among students to make them participate in class.
- Below 52 percent teachers of 90% colleges/institutes stated that they organized group work among students to make them participate in class.
It showed that majority of teachers encouraged students to make queries but only few stated that they distributed question equally. This shows that the teachers lack the skills of teaching as by equally distributing different order of questions according to capability of students encourage the active participation of students in teaching learning process.

6. Teaching aids

The study revealed that teachers of 90 percent colleges/institutes under study used teaching aids. It was also revealed that majority of professional colleges/institutes under study except law college used teaching aids while less percentage of teachers of general colleges used teaching.

However students stated that majority 60% of medical institute, 58.82% of technical institutes that is Sikkim Manipal Institute of Technology, 40% of institute of hotel management (40%) agreed teacher used Over Head Projector (OHP) to clear important points. Only the students of Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science mentioned that the teachers used computer to clear points, working model and static model while teaching. It implied that even at this time of technology explosion and at the advanced stage of educational technology, the teachers were not practically using teaching aids in the classroom though they have the knowledge about it. Perhaps the teaching aids are not available in the colleges/institutes. It is the prime responsibility of administration and management to provide varied teaching aids so that effective process of teaching and learning can take place.

7. Innovation in teaching

It was found out that out of selected colleges/institutes under study 50% colleges/institutes such as colleges of education, technical institutes and medical institute stated that there was an innovation in teaching such as Computer Assisted Instruction, programmed instruction and had developed team teaching. It was also found out that private and professional colleges/institutes under study had innovation in teaching whereas the government and general colleges/institute lagged behind in innovation in teaching. It implied that the administration of government colleges should
take the interest to bring innovation in teaching so that they do not lag behind other colleges/institutes.

8. Classroom climate

The study revealed that 100 percent colleges/institutes under study had friendly and open classroom climate. Whereas some percentage of students of law college (40%), private general college (35%), government general colleges (34.50%), medical institute (20%) and technical institutes (14.70%) mentioned that the teachers were indifferent towards students need. It showed that majority of students of government colleges stated that the teachers were not sensitive towards their needs. Empathy is one of the characteristics that teacher should possess beside many other qualities.

9. Medium of instruction

Findings showed that 100% colleges/institutes under study were English medium and majority of students of these colleges/institutes stated that teachers used English as medium of instruction. Whereas students of law college (90%), private general college (50%), government general colleges (42.49%), institute of hotel management (20%) mentioned that teachers use mixture of English and state common language. Students of private general college (50%), government general colleges (10.13%), technical institutes (9.80%) and medical institute (6.66%) mentioned that teachers use English and Hindi.

10. Training and orientation of teachers

It was revealed that

- Intensive course for professional development of teachers was organized by 40 percent colleges/institutes such as private general colleges and medical institute, Loyola College of Education and Sikkim Manipal Institute of Technology.

- Orientation course was organized by 40 percent colleges/institutes such as private general college, Loyola College of Education, Sikkim Manipal Institute of Technology and medical institute.

- Only Sikkim Manipal Institute of Technology conducted Refresher course.
100 percent colleges under study did not conduct any certificate course and diploma course for the professional development of teachers. It was also found the percentage of teachers in higher education who had attended course for professional development which are as follows:
- Government general colleges (38.46%), colleges of education (22.22%), law college (20%), government institute of hotel management (20%), medical institute (6.89%), technical institutes (5.71%) had attended Refresher Course.
- Institute of hotel management (40%), government general colleges (35.89%), private general college (33.33%), technical institutes (22.85%), colleges of education (11.11%), law college (10%) and medical institute (6.89%) had attended Orientation Course.
- Technical institutes (17.14%) and law college (10%) had attended Certificate course.
- Whereas diploma course was attended by 6.89 percent teachers of medical college.

It was shown that below 40% colleges/institutes organized intensive courses for the professional development of teachers and below 40 percent teachers had attended the intensive courses like refresher course, orientation course and certificate course. It implies that the colleges/institutes of higher education in the state had to give attention to the teachers' training which brings professionalization of the teachers.

11. Academic programme

It was indicated that the academic programme was organized by 100% colleges/institutes under study. 90 percent colleges/institutes under study organized seminar as an academic programme. 60 percent colleges/institutes under study organized workshop as one of the academic programme. However, only Sikkim Manipal Institute of Technology organized conference. Different types of academic programme are important for arousing interest in the academic activities for both teachers and students.

12. Published work

The study revealed that 28.20 percent teachers of government general colleges, 17.24 percent teachers of medical institute, 10 percent teachers of law college and 5.71 percent teachers of private technical institutes had published monographs/books. It was shown that very few below 30% teachers of 50% colleges/institutes had published books.
13. Involvement in imparting continuing education

With regard to the involvement of teacher in continuing education the study revealed that 34.48 percent teachers of medical institute, 33.33 percent teachers of colleges of education, 12.82 percent teachers of government general colleges and 8.57 percent teachers of technical institutes had been involved in imparting continuing education. Below 30% teachers of 60% colleges/institutes were involved in imparting continuing education which shows that perhaps teachers are not interested or they are not aware of their responsibility beyond the usual teaching.

14. Library

It was found out that 100 percent colleges/institutes provided library facilities. There was a need for updating of library reading material as expressed by majority of teachers of government general colleges (89.74%), law college (80%), private general college (66.66%), technical institutes (60%) and institute of hotel management (60%). Majority of students of law college (90%), institute of hotel management (60%), private general college (52.4%), government general colleges (47.56%) mentioned that library was not properly maintained and updated timely. Thus teachers and students of 70 percent colleges/institutes such as government general colleges, law college, private general college, technical institutes and institute of hotel management stated that library needs updating.

It was also revealed that 70 percent colleges/institutes under study had full time librarian whereas 30 percent colleges/institutes under study mentioned that the college had clerk of the institute who was also in charge of library.

15. Working hour of library

The study revealed that
- 8AM- 4PM was the working hour of library in Sikkim Government College Gangtok whereas 70.76 percent students mentioned that library doesn’t open in time which in turn leads to great hindrance for students for consulting books. It also caused inconvenience for the students of morning and evening shift.
- 10AM- 4PM was the working hour of library in Sikkim Government College, Namchi, law college. Whereas 58% students of Sikkim Government College, Namchi complained that library opens late at around 10.30 AM and closes around 3PM which caused problem for the students of morning shift and majority (100%) students of law college mentioned that college opens late around 11 and the timing was not fixed as the librarian remained busy with the office work.

- 10AM- 4PM was the working hour of library in institute of hotel management.

- 9AM-5PM is the working hour of library in Loyola College of Education, Himalayan Pharmaceutical Institute and private general college. Though majority (100%) students of private general college mentioned that there was no fixed timing of the library as there was no full time librarian.

- 10AM-5PM is the working hour of library in Harka Maya College of Education but 100 percent students mentioned that there was no fixed timing of the library due to lack of full time librarian.

- 10AM- 9PM is the working hour of library in medical institute and 8.30AM- 8PM is the working hour of library in Sikkim Manipal Institute of Technology.

16. Stocks in library
The study revealed that
(i) 100% colleges/institutes under study provided reference books, text books.
(ii) 100% colleges/institutes under study provided encyclopedias. 30% colleges/institutes under study provided three encyclopedias, 50% colleges/institutes under study provided four encyclopedias and 20% colleges/institutes provided six and seven encyclopedias in the college library.

(ii) 100% colleges/institutes under study provided journals. 30% colleges/institutes under study provided three types of journals. 10% institutes (Institute of hotel management) had four types of journals. 10% of colleges/institutes under study had six types of journals. 30% colleges/institutes under study had eight types of journals stocked in college library.
20% colleges/institutes such as Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology had eleven types of journals stocked in the college library.
(iii) 80% colleges/institutes under study provided periodicals.
(iv) 90% colleges/institutes under study provided newspapers except Himalayan Pharmaceutical Institute did not provide newspapers in the library.

17. Internet

The study revealed that only 20% colleges/institutes such as a medical institute and Sikkim Manipal Institute of Technology provided internet facility in the library. Whereas 80 percent colleges/institutes under study did not provide internet facility in the library due to lack of adequate funds. Students can have access to the database and the new information through internet in the library. This implied majority (80%) colleges/institutes need to update their library to create an environment of interest towards studies.

18. Library problem

The study showed that 30% colleges/institutes such as government general colleges, private general colleges pointed that library had very small space to accommodate large number of students and lack of fund had caused the inability to acquire more books. Law college stated that librarian assist office work due to the lack of office staff. Sikkim Manipal Institute of Technology mentioned that sufficient books were not available and books, journals were too costly. Scientific categorization and there was no full time librarian were the problem faced by the colleges of education. Above inadequacies in the library was mainly due to lack of fund and trained full time librarian. Thus the management both government and private should look into these specific library problem to create interest among students towards reading books.

19. Co curricular activities

The study showed that
- 20% colleges/institutes such as law college and institute of hotel management did not organize any co curricular activities.
- The literary activities were organized by 50% colleges/institutes such as government general colleges, private general college, colleges of education.
- 80% colleges/institutes under study conducted cultural activities.
- 40% colleges/institutes under study conducted games and sports and also academic activities.
- National Social Service organized by 30% colleges such as both government and private general colleges. 10% college (Sikkim Government General College, Gangtok) mentioned that NCC was also carried in the college.
- Whereas cultural, games and literary activities were organized during college week in 20 percent institutes (Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology).
- 100 percent colleges/institutes under study did not organize activities such as painting.

The study also found out that only in colleges of education 100% students participated in co-curricular activities because those activities carried internal examination marks. Whereas below 50% students participated in co curricular activities organized in respective colleges/institutes. Even the students of law college and institute of hotel management where co curricular activities were not organized showed the interest to participate in co curricular activities. This implied that co curricular activities an another facet of education did not receive its importance. Co curricular activities helps to built physical efficiency, mental alertness, development of certain qualities like perseverance, team spirit, leadership, obedience to rules, mobilization in victory and victory in defeat.

20. Examination
The study revealed that 80% colleges/institutes under study conducted Annual examination system. Whereas 20% colleges/institutes such as Sikkim Manipal Institute of Medical Science and Sikkim Manipal Institute of Technology conducted semester examination system.

The 70% colleges/institutes which were affiliated to North Bengal University stated that the results delayed number of times.

Preference for type of examination conducted in colleges/institutes.
Table No. 149: Preference for type of examination
Preference for type of examination conducted in colleges/institutes

<table>
<thead>
<tr>
<th></th>
<th>Type of colleges/institutes</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>General</td>
</tr>
<tr>
<td>Govt.</td>
<td>42.30%</td>
</tr>
<tr>
<td>Pvt.</td>
<td>32.5%</td>
</tr>
<tr>
<td>Govt.</td>
<td>30%</td>
</tr>
</tbody>
</table>

It was showed that majority above 55% students of colleges/institutes under study preferred semester type of examination. The study also found out various reasons for preferring Semester type of examination which are as follows:

Students of institute of hotel management (40%), government general colleges (26.12%) and medical institute (20%) mentioned that semester type of examination was easy to study. Students of private general college (67.5%), government general colleges (44.24%), colleges of education (40%), law college (30%) and medical institute (30%) mentioned that semester type of examination was easy to score. Students of colleges of education (40%), government general colleges (30.60%) and law college (10%) mentioned that semester type of examination kept the student in touch with studies. Students of law college (80%), colleges of education (50%) and technical institutes (6.86%) mentioned that semester type of examination gives less burden during examination. Students of technical institutes (88.23%) and medical institute (60%) stated that semester type of examination kept student updated. Whereas students of government general colleges (31.18%) and technical institutes (6.86%) mentioned that they were used to annual examination and they could pass in one time. It was clearly seen from the reason pointed by majority of students of 100% colleges/institutes that they preferred Semester system of examination. Now the colleges/institutes should seriously think of bringing change in examination system as need shown by the students.

It was also found that government general colleges had to send students of B.Sc honours outside the college for examination because as per the North Bengal University norms Honours practical in B.Sc were held outside the home centre. Since Sikkim didn’t have general university the students had to go to West Bengal to appear B.Sc honours practical.
21. Result of bachelor degree

Table No. 150: Pass percentage of the government general and professional colleges/institutes

<table>
<thead>
<tr>
<th>Result of last five years</th>
<th>General</th>
<th>General</th>
<th>Government</th>
<th>Law</th>
<th>Hotel management</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>BA</td>
<td>BA</td>
<td>B.Sc</td>
<td>B.Com</td>
<td>LLB</td>
</tr>
<tr>
<td></td>
<td>34.34%</td>
<td>76.95%</td>
<td>91%</td>
<td>91.66%</td>
<td>92.85%</td>
</tr>
<tr>
<td></td>
<td>49%</td>
<td>70.10%</td>
<td>89.79%</td>
<td>79.54%</td>
<td>100%</td>
</tr>
<tr>
<td></td>
<td>34.69%</td>
<td>56%</td>
<td>66%</td>
<td>55%</td>
<td>94.11%</td>
</tr>
<tr>
<td></td>
<td>72.72%</td>
<td>49%</td>
<td>62%</td>
<td>42%</td>
<td>96.15%</td>
</tr>
<tr>
<td></td>
<td>42.04%</td>
<td>55%</td>
<td>70%</td>
<td>94%</td>
<td>87.87%</td>
</tr>
</tbody>
</table>

The study revealed that pass percentage in all the colleges had fluctuated from 1999 to 2003. It showed that overall pass percentage in BA course was not encouraging and it declined than last five years whereas pass percentage in B.Com had also fluctuated for the last five years. Pass percentage in B.Sc had also declined but overall it had remained above 60%. However pass percentage of professional courses like LLB and B.Sc(HM) has remained above 87% and it reflected that pass percentage in these courses were better than general courses.

Table No.151: Pass percentage result of private professional colleges/institutes

<table>
<thead>
<tr>
<th>Result of last five years</th>
<th>PRIVATE</th>
<th>Colleges of education</th>
<th>Technical</th>
<th>Medical</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>General</td>
<td></td>
<td>DSC</td>
<td>HLE</td>
</tr>
<tr>
<td></td>
<td>BA</td>
<td>B.Ed</td>
<td>B.Ed</td>
<td>B.Ed</td>
</tr>
<tr>
<td></td>
<td>2000</td>
<td>56.2%</td>
<td>86%</td>
<td>-</td>
</tr>
<tr>
<td></td>
<td>2001</td>
<td>100%</td>
<td>90%</td>
<td>-</td>
</tr>
<tr>
<td></td>
<td>2002</td>
<td>80%</td>
<td>95%</td>
<td>-</td>
</tr>
<tr>
<td></td>
<td>2003</td>
<td>88%</td>
<td>96%</td>
<td>-</td>
</tr>
<tr>
<td></td>
<td>2004</td>
<td>-</td>
<td>100%</td>
<td>90.6%</td>
</tr>
</tbody>
</table>

The study revealed that pass percentage of BA course in private general colleges had also fluctuated in the last five years. The pass percentage of B.Ed course in Loyola College of Education showed improvement in the last five years and 90.6% was pass
percentage in the first batch of Harka Maya College. The pass percentage in B.Pharm had fluctuated though it remained above 48%. The Sikkim Manipal Institute of Technology produced the result of B.Tech and M.Sc had remained above 98%. The Sikkim Manipal Institute of Medical Science which was established in 2001 so the first batch of MBBS will complete the course in 2005. 100% was the pass percentage in the first batch of M.Sc in 2004. It showed that the over all pass percentage in Undergraduate course among private colleges (both general and professional) was better than the government general colleges.

22. Result of Post Graduate Degree

It showed that Sikkim Manipal Institute of Technology and Sikkim Manipal Institute of Medical Science were the only first institutes to offer post graduate degree in medical science and technology. In 2004 Law College also started post graduate degree i.e. LLM. The study revealed that pass percentage of M.Sc in technical institute from 2002 to 2004 and M.Sc in medical institute had remained 100 percent. It was revealed that so far no colleges/institutes under study in the State has ever produced student with doctoral degree. It implied that post graduate degree started very recently (2002) in professional course. Therefore to improve higher education in the state the post graduate degree should also be introduced in various subjects. For which establishment of State’s university is the solution.

23. Problem of higher education

Some of the problems of Higher education

- Insufficient number of colleges was one of the problems of higher education.
- Inadequate funds for higher education which was insufficient for development and maintenance of higher education colleges/institutes.
- Absence of good institution for pursuing Higher Education in the state.
- Lack of general University in the State
- Lack of State Higher Education Committee to look after higher education in state.
- Inadequate communication between Human Resource Development department of Sikkim and colleges/institutes of the state.
- Lack of alternative specialized courses provided in colleges and institutes.
- Lack of qualified teachers and insufficient teachers.
- No proper inspection of daily running of the institution
- Non use of existing facilities
- Financial help for very less number of students pursuing higher education
- Guardians/parents were not aware and students were not motivated for further education.
- Mostly people were from rural area so they could not afford higher education.
- People especially minority were economically poor so they could not afford their studies for their children.

Thus it was high time for Sikkim to take serious note of this and concerted efforts should be directed towards improving the higher education in the state.

6.7 Findings related to Problem of teachers
1. Work load

The study revealed that teachers of colleges/institutes under study such as private college (100%), government Law College (80%), institute of hotel management (80%), general government colleges (53.85%), medical institute (31.03%), technical institutes (25.71%) and colleges of education (22.22%) found the work load heavy. Teachers stated problems due to heavy work load which are as follows:
- Teachers of general government colleges (10.25%) stated that teaching and administration caused burden.
- There was no time to involve in other related works as expressed by teachers of Law College (20%) and general government colleges (2.56%).
- It’s too hectic to work two- three shifts a day was expressed by 12.82 percent teachers of general government colleges.
- There was no time for personal reading and research work as expressed by teachers of general government colleges (17.94%), colleges of education (11.11%), Law College (20%), institute of hotel management (20%), technical institute (14.28%) and medical institute (4.44%).
- No time for preparation for many classes a day as expressed by colleges of education (33.33%), law college (60%) and medical institute (3.44%).

This showed that teachers expressed that they had heavy work load which might cause burn out among teachers which will surely harm the quality of education. Therefore administrators and management should see that teachers are not over loaded with work. Establishment of more colleges and recruitment of sufficient teachers will also solve problem especially in government general colleges.

2. Job satisfaction

It was revealed that majority of private colleges/institute were satisfied whereas only small percentage of teachers of government colleges were satisfied with their job.

The study showed reasons for job dissatisfaction which are as follows:
- 10.25 percent teachers of government general colleges and 33.33 percent teachers of private colleges, 10 percent teachers of government law college and 44.82 percent teachers of medical institute marked that the job had low salary.
- 5.12 percent teachers of the government general colleges, 22.22 percent teachers of college of education, 20 percent teachers of government institute of hotel management and 3.44 percent teachers of medical institute respectively showed that their job was associated with low status.
- 35.85 percent teachers of the government general colleges and 30 percent teachers of law college showed that their job had inadequate facilities.

- 43.58 percent teachers of the government general colleges and 10 percent teachers of law college showed that college was too small and congested.

- 11.42 percent teachers of the technical institutes and 34.48 percent teachers of medical institute has expressed that college was located far and had communication problem.

- 10.25 percent of the teachers of the government general colleges, 60 percent teachers of law college, 17.14 percent teachers of technical institutes and 13.79 percent teachers of medical institute respectively showed that there was no place for them to act freely.

- 50 percent teachers of law college and 12.85 percent teachers of government general colleges stated that there was no consultation of teachers in decision making.

- 7.69 percent teachers of the general government colleges stated that they suffered from stagnation in profession.

3. Problem Related to Method of recruitment

The problems related to method of recruitment in colleges/institutes under study are as follows:

- Law college (90%), general government colleges (76.95%), medical institute (62.06%) and technical institutes (8.57%) expressed that there was biasness in the recruitment of teachers.

- Law College (60%) and government general colleges (25.64%) specified that there was political interference in the recruitment of teachers.

- The teachers of government general colleges such as 43.58% specified that there was no proper advertisement of post and 10.25% specified that teachers were not selected based on merit.

This implied that the method of recruitment needed to be improved to recruit the best and able teachers. UGC criteria should be considered rather than biasness and political interference.

4. Service condition

With regard specific problem with reference to service condition it is revealed that

- 38.46 percent teachers of government general colleges mentioned there was no timely promotion and career advancement.
- Teachers of law college such as 50 percent mentioned that there should be end of adhoc system and adhoc contract was given for less duration of only one year, it should be for five year and 40 percent stated that the promotion was delayed.

- Teachers of institute of hotel management such as 60 percent mentioned that there was overburden due to fewer faculties and 40 percent stated there was no proper evaluation of performance of teacher.

**Infrastructural Problem of Teachers**

1. Classroom problem

The study indicated that following classroom problems faced by teachers of colleges/institutes under study.

- Small size of classroom to accommodate large number of students leading to overcrowded classroom as expressed by government general colleges (66.66%) and medical institute (3.44%). Sinha, B.N. (1969) also found out that teachers had little contact with the students due to lack of permanent rooms.

- Classroom was not well lighted as pointed by teachers Law College (50%), medical institute (13.79%), technical institutes (5.71%) and government general colleges (5.12%).

- Insufficient numbers of benches, chairs and need of sound system as specified by medical institute (24.13%), government general colleges (7.69%) and technical institutes (5.71%).

- 20% teachers of technical institutes pointed that black board condition was not good and 24.13 % teachers of medical institute pointed out that audio-visual equipment was not proper.

This showed that teachers of the colleges/institutes were having problem with the classroom condition. Classroom with adequate furniture, light and teaching aids were needed which will surely add to the creation of proper academic atmosphere. The problem of over crowding of classroom could be solved by updating the present infrastructure or establishing another college.
2. Problem related to accommodation facilities for teachers

Findings showed the teachers of 80% colleges/institutes under study stated that they had to manage on their own. Quarters were provided but were not adequate as expressed by 72.41% teachers of Sikkim Manipal Institute of Medical Science and 69.23% teachers of Sikkim Government College Gangtok. This implied that adequate and proper accommodation were not provided for teachers which adds to the tension to the teachers serving in the area. The cost of living is high in the state as it is hill area so living in rent also cost a lot in the area. The administration and management should look seriously into this problem.

Financial Problem of Teachers

The main financial problem as expressed by teachers of colleges/institutes under study was that the salary was not matching with the cost of living and large amount was spent in transport as all the colleges/institutes did not provide adequate transport facilities for teachers. Also 11.42% teachers of technical institute stated that medical reimbursement was not given to teachers.

Administrative problem of Teachers

(i) The study revealed that half pay was commutable only in medical ground as stated by teachers of government general colleges (5.13%). Leave rule was inconsistent which was stated by 24.13% teachers of medical institute. Too less casual leave which forced them to take medical leave and earned leave was mentioned by teachers of colleges of education (22.22%), technical institutes (6.89%) and medical institute (5.7%).

(ii) Teachers of technical institute (6.89%) and medical institute (10.34%) complained that rules were not clear and there was biasness which influenced advancement in rank.

This implied that administrative problem faced by teachers was related to leave and advancement in rank. There should be consistent rule framed about leave sand for advancement of rank that teachers do not feel biased.
Academic problem of teachers

1. Problem related to curriculum
- Teachers of 50% colleges/institutes under study stated that the curriculum was theoretical.
- Teachers of 80% colleges/institutes under study mentioned that the curriculum was too vast.
- Teachers of 60% colleges/institutes under study mentioned that the curriculum was inappropriate for graduate level and it was not relevant to societal needs.

This showed that teachers from majority of colleges/institutes under study were not satisfied with the existing curriculum. Since they are the one to finally implement the curriculum so their ideas and opinions regarding what to be included in curriculum should be seriously taken by curriculum frame worker so that teachers become satisfied and its implementation be proper.

2. Library problem
The study showed the problem related to library faced by teachers of colleges/institutes:
(i) The teachers of government colleges stated the problems such as there was no cataloguing of the books (51.28%), inadequate periodicals/journals on different subjects (25.64%), the library was not up dated according to change in syllabus (20.51%), library was small to accommodate large number of students and teachers (15.38%), no open shelf system for students (10.25%) and lack of books prescribed by the university (5.12%).
(ii) Teachers of law college mentioned that there was no cataloguing of the books (100%), librarian could not give full attention to her work as she had to take care of official work also (90%), there was no any proper library rule was followed for borrowing books (80%), inadequate books in different subjects (80%) and no computer and internet facility in library (80%).
(iii) Teachers of institute of hotel management mentioned that there was insufficient books (60%), the rotation of books were done faster among students due to which they couldn’t use the issued books properly (40%).
(iv) Teachers of private general college stated that there were inadequate books in library (100%), there was no full time librarian which was also the problem to the library user (66.66).

(v) Teachers of Technical Institutes stated that there were inadequate books in library (28.57%), inadequate journals, periodicals (28.57%), less book was available for post graduate degree course like M.Tech (17.14%), less book was available in issuing section (11.42%) and inadequate international journal (8.57%).

(vii) Teachers of Medical Institute stated that there was no supply of heater as library is cold and damp (20.68%), there were inadequate books in library (17.24%), no international journal (13.79%) and the reading cabins lack proper ventilation (10.34%).

(viii) Teachers of colleges of education stated that absence of full time librarian caused problem in the timing of library (75%) and it also lead to irregular timing for library (50%).

3. Problem related to co curricular activities

The study revealed that 14.81 percent teachers of government colleges mentioned the main problems were lack of well maintained ground, 7.40 percent stated that lack of boys and girls common room, students were not forthcoming, lack of discipline and organizing skill among students. 50 percent teachers of college of education mentioned that the lack of plain land was one of main problem in organizing co curricular activities. The co curricular activities such as games and sports could be organized in public ground and the teachers should also take genuine interest in such activities so that learn from them also beside its main objective.

4. Problem related to teaching

Teachers of higher education stated various problems such as

- Government general colleges (7.69%) mentioned that heavy work load prevent thorough teaching.

- Technical institute (28.57%), colleges of education (22.22%), law college (20%) and government general college (2.56) mentioned that students from vernacular medium faced difficulty when taught in English.

- Institute of hotel management (60%) mentioned that there was a lack of practical area.
Medical institute (6.89%) percent mentioned that poor students attendance, (17.24%) stated poor student participation and lack of time to elaborate topics. This showed there were not major problem faced by teachers related to teaching. The administrators and management should avoid over loading teachers with excess work which will solve many problems.

5. Problem related to lack of teaching aids
The study revealed that problem stated by teachers
- government general colleges (15.38%) mentioned that there was lack different types of maps, charts in the college which prevent proper explanation of practical concepts and they used using books and notes in the classroom.
- institute of hotel management (60%), technical institutes(34.28%), government general colleges (30.76%) and law college (20%) mentioned that there was a lack of Audio-visual (A-V) aids so they had to resort back on traditional lecture method.
- technical institute(28.57%) mentioned that since black board was not in good condition it caused difficulty for teacher to write clearly and students to see.
- medical institute (34.48%) mentioned that there was a need to procure multimedia projection system for better A-V demonstration in class and there was no facility for 35mm film processing.

This implied that lack of teaching aids in majority of colleges/institutes under study had forced the teachers to opt for traditional method of teaching. So the administrators and management should seriously look into this problem for the betterment of teaching in the institutes of higher education.

6. Classroom Teaching problem
Regarding the problem related to classroom teaching the study revealed numerous classroom problems of teachers which are as follows;
- Teachers of government general colleges stated that noise from vehicles from continuous traffic from National highway near college disturbed the classroom teaching greatly (100%), classes were overcrowded so they could not give individual attention to students (76.92%), they had to speak aloud as P.A system was not provided (61.53%),
their voice was echoed in a hall which caused disturbance in hearing and insufficient classrooms which hampered running the classes smoothly according to the routine (58.97%), blackboards were not in good condition (56.41%), there was lack of efficiency of students in English (38.46%), the laboratory was not updated, communication gap between teachers and students, attendance consumed time due to large number of students (30.76%), there was no separate class for honours students (25.64%).

- Teachers of government institute of hotel management (20%) stated that there was poor attendance of students.
- Teachers of private general college (66.66%) mentioned that students were not regular in attending classes.
- 11.11 percent teachers of college of education mentioned that students were more interested to take down notes than explanation.
- Teachers of technical institutes stated that there was poor interaction from students (22.85%), limited time period prevents them from explaining elaborately any new concepts in classroom (20%).
- Teachers of medical institute mentioned that time was not sufficient to cover the syllabus (31.03%) and microphone did not work properly (20.68%).
- 13.79% teachers of medical institute mentioned that one hour was too long period to hold attention of students.

This implied that teachers of government general colleges faced more problem than other colleges/institutes so the state government should take steps to solve the classroom teaching problem which will help to improve the standard of general education in the state.

7. Problem related to the examination and evaluation system

It was revealed that classes were overcrowded even during the examination which prevented from conducting fair and strict examination was stated by 7.96% teachers of government general colleges. Teachers of medical institute (58.62%) stated that the patients were not available for clinical examination for medical students in the end students remained with just theoretical knowledge, student gets best out of two examiner evaluation marks instead of average of two test which didn’t give justification to the process of evaluation (34.48%) and there was no proper rule for invigilation of
examination (27.58%). It showed that overcrowding of classroom affected the examination system which could be solved by updating the existing infrastructure or by establishing new college. Lack of patient in medical college will surely produce doctors with mere certificate so the management should seriously look into this problem. The proper invigilation should also be framed so that fair examination are conducted.

8. College atmosphere

The teachers of government general colleges (38.46%) that the college was too near to the national highway and market place this lead to disturbance in the college atmosphere, 33.33% mentioned that the campus was very small and so it was overcrowded with increasing number of students in campus. Above 50% teachers of law college stated that the head of institution was autocratic in nature and which has made closed and unfriendly climate, there was a lack of healthy working atmosphere and there was lack of participative culture as the views of teachers were not taken into consideration. Teachers of medical institute complained that autocratic leadership of higher authorities of institute had lead to closed college atmosphere. It showed that autocratic nature of the head of institution of law college and medical institute had created a closed climate which had encouraged unparticipative culture among teachers. Such climate will affect the self esteem of teachers which in turn affect the work of teachers. Thus there are urgent need for head of institution to under go refresher course or orientation course in management and leadership qualities which will help in bringing the quality higher education.

6.8 Findings related to problem of students

1. Choice of subjects

The study revealed that students of 30% colleges (Sikkim Government College Gangtok and Sikkim Government College Namchi, private general college) mentioned that there was not enough options to choose subjects so they had to study whatever options were provided by the college/institute. This implied that these colleges should provide variety of courses so that students can choose according to their need and interest.
2. Problem due to lack of sufficient furniture

It was found out that lack of sufficient furniture was one of the major problem of students of general colleges both private and government. One long bench was shared by many students as stated by 37.62 percent students of government general colleges and 30 percent students of private general college. 15.59 percent students of government general colleges also expressed that sometimes they don't have anything to sit so they come out of class. The implication of adequate furniture were clearly stated by students thus this problem faced by students needs urgent attention to bring punctuality among students.

3. Problem related to laboratory and workshops equipments

The problem in relation to laboratory and workshops equipments existed as stated by students government general colleges (70.76%), technical institutes (70.58%), medical institute(20%) and colleges of education (10%).

The problem stated was such as i. Equipments were outdated ii. Equipments were not up to date iii. Equipments need repairing. iv. Inadequate equipments. Laboratory/workshop with such equipments as mentioned by students cannot fulfill the sole objective with which the laboratory is established.

4. Lack of playground for various games and sports

The games were played in the front courtyard of the college as the college lack play ground and it was not very convenient also as the floor is tarred as stated by 29.23 percent students of Sikkim Government College Namchi whereas 100 percent students of private general college, law college and institute of hotel management mentioned that games were not organized due to lack of playground. Particular game was played at particular time in one playground as stated by 70.76 percent students of government general colleges and 26.66 percent students of medical institute. This showed that the lack of playground among majority of colleges/institutes under study has affected the organization of co curricular activities such as games and sports.
5. Problem due to lack of transport facility

The study revealed that students of 100 percent colleges/institutes under study used local taxis and Sikkim Nationalized Transport (SNT) bus at their own expense. Students of Sikkim Government College Namchi complained that Sikkim Nationalized Transport (SNT) bus comes down to college in the morning and at the evening but it was not sufficient as public also travel as it was a government bus. It implied that colleges/institutes should provide traveling facility so that transport section of respective college can sustain from the fees collected from students as for now also they are paying to public vehicles for their travel.

6. Problem due to lack of facility in hostel

The study showed that 40% colleges/institutes did not provide hostel facility for students. The problems of students due to hostel facility are as follows:

- Sikkim Government College, Gangtok (10.94%) stated that there was inadequate infrastructure and it was difficult to stay three to four in one room in hostel.
- Harka Maya College of Education (25%) mentioned that it was difficult to study and concentrate in a dormitory of four grown up students in a single room, 30 percent mentioned that the mess facility was not good, 20 percent mentioned that there was no common room in hostel to watch TV or read newspaper and 25.5 percent mentioned that there were lots of restrictions for grownup students. This implied that hostel accommodation should be provided and it should be adequate also. The hostel accommodation should not be cause for distraction for students from their studies.

7. Problem related to fees

- Majority students of Sikkim Manipal Institute of Technology (86.27%), Sikkim Manipal Institute of Medical Science (76%), institute of hotel management (50%), colleges of education(40%), mentioned that fees were high so the students from poor economic background cannot afford it.
- Games fees were being paid but had never seen games being organized in college as complained by students of law college (60%). Library fees were being paid but the
college library did not have adequate books as stated by students of law college (60%) and government general college (17.54%).

- It is difficult to pay such a huge amount of fees in a two installments so the students should be allowed to pay in three to four installments, there was no facility according to the money taken as stated by students of colleges of education (25%).

This showed that fees charged in professional private colleges are high especially for students from poor economic background so there should be provision for paying the fees in small installments so that they can pursue their studies. There should be supervision form the State government in the matter of fees charged in government managed college like law college. The colleges/institutes should be accountable to the fees charged and facilities should be according to amount of fees charged from students.

8. Problem related to college environment

- There was disturbance from vehicles from National Highway way near college stated by students of institute of hotel management (60%) and government general colleges (58.47%). Students of Sikkim Government College, Gangtok such as (35.08%) mentioned that sound from the nearby temple during pujas disturbs the class, 28.07% stated that campus was overcrowded and (20.07 %) stated that foul smell from toilets was disturbing.

- Students of law college (60%) mentioned that there was lots of distractions because the college was too near market place and many people were rented in the college building. It was clearly seen as that student of government managed colleges have problem related to college environment. There is an urgent need to establish new college with proper campus which can provide good academic college environment to students.

9. Problem related to classroom teaching

- Students of government general colleges such as 55.16 mentioned that it was difficult to hear lecture as the class was overcrowded, 39.57 percent stated that some teachers were not regular in taking class, 38.98 percent stated that teachers starts dictating notes as soon as they entered the class they did not bother to explain and 1.94 percent mentioned that teachers did not complete syllabus in time.
- Students of government general colleges (51.26%), institute of hotel management (20%) and private general college (5%) mentioned that lecturing was done too fast so it was difficult to catch up with the speed of lecture.

- Colleges of education (25%) and law college and technical institutes (9.8%) mentioned that most of the teachers were inefficient and could not explain well.

- Students of government general colleges (37.03%) and colleges of education (35%) mentioned that it was difficult to understand the pronunciation as most of the teachers themselves were from vernacular background and were not fluent in English.

From the problem stated by students it implied that there is a need to recruit efficient teachers or the teachers of higher education also have to undergo refresher course and orientation course in teaching skills.

10. Problem related to classroom

i. Students of government general colleges 65.69 percent mentioned that there was insufficient teachers, 64.91 percent stated that there was insufficient desk and benches, 60.62 percent stated that the classes were small and overcrowded, 58.47 percent mentioned that backbenchers could not hear the lecture and 30.60 percent mentioned that there was no sound system, 18.12 percent mentioned that canteen was too close to some classroom which causes lots of disturbance, 11.69 percent mentioned that there was not enough classroom for students studying mathematics.

ii. Students of law college such as 55 percent mentioned that there was no electrical fittings in the classrooms and 15 percent mentioned that there was no separate classroom for LLM students so they had to sit in library and attend class.

iii. Students of private general college (30%) mentioned that sound echoed in the class so it was difficult to hear the lecture clearly.

iv. Student of colleges of education (20%) mentioned that it was difficult to hear the lecture at the last bench and 15% students stated that there was a lack of good blackboard facility.

v. Students of technical institute (88.23%) and Harka Maya College (45%) mentioned that they did not have enough classrooms.
11. Problem related to method of teaching
- Majority students of 100\% colleges/institutes under study expressed that lecturing a monotonous way of teaching so they get bored.
- Students of government general colleges; 49.51\% mentioned that some teachers just dictates notes, explanation was not done so it was difficult to understand, 49.31\% percent mentioned that teacher speaks very fast so difficult to catch up with their speed, 29.82 percent stated that lecturing was not satisfactory.
- Students of law college (10\%) mentioned that teachers did not know how to ask questions sometime they made them nervous and some teachers were not efficient to take post graduate degree class.
- Students of colleges of education 25\% percent mentioned that the teachers were inefficient and 17.5\% percent stated that teachers usually dictate notes.
- 39.21\% percent students of technical institutes mentioned that some teachers were not experienced to teach and some teachers are un approachable.
- 13.33\% percent students of medical institute mentioned that some teachers’ just tries to complete the syllabus but the needs of students were not taken care of.

12. Library problem
Students from different colleges/institutes under study expressed different problems such as
(i) Inadequate books related to the course were available - colleges of education (75\%), private general college (65\%), medical institute (53.33\%) and technical institutes (29.41\%), colleges of education (5\%)
(ii) No Xerox facility - government general colleges (60.81\%), private general college (40\%)
(iii) Only one book was issued at one time - law college (70\%) and government general colleges (19.29\%), colleges of education (27.5\%)
(iv) Old torn books with missing page were available and library is not managed well - government general colleges (37.03 \%), technical institutes (7.84\%)
(v) Inadequate new edition books - medical institute (60\%), technical institutes (35.29\%)
(vi) Less space in library - government general colleges (51.26\%)
(vii) Noise from vehicles from National highway near college doesn’t allow reading silently - government general colleges (38.98 %)
(viii) Inadequate books in mathematics subject - government general colleges (8.77%)
(ix) Library card were issued late - law college (19.49%),
(x) Librarian was busy with office work and remains unapproachable - law college (85%)
(xi) Not allowed to take books during long holidays - law college (40%)
(xii) Books were not issued daily - private general college (25%).
(xiii) No current journals - colleges of education (20%)
(xiv) No heating system was available as it’s too cold in Sikkim during winter - medical institute (20%)

Problems related to library as expressed by students of colleges/institutes under study implied that library is in bad state and it need urgent attention of head of the institution and management to update it quickly.

13. Problem related to curriculum

The study revealed that the students of 100% colleges/institutes under study found that the curriculum was theoretical. The curriculum was too vast as stated by students of 90% colleges/institutes under study. Students of only 30% colleges/institutes under study found that the curriculum did not fulfill the objectives of Higher education. This showed that there is a need of need based curriculum in the state for the various course.

14. Problem related to co curricular activities

The study showed that only students of 10% college (college of education) faced problem regarding the co curricular activities organized in college. 25% expressed that co curricular activities were poorly organized and 20% mentioned that there was no proper guidance from teachers. For proper organization of co curricular activities to fulfill its aims and objective the supervision of teachers are very important which seems to be lacking in the colleges/institutes under study.
15. Problem related to examination and evaluation

The study found out that student of 60% colleges/institutes under study faced problem in connection with examination and evaluation. Students of government general colleges (23.39%) mentioned that marks were not properly awarded in university examination, wrong marks were sent by North Bengal University and had to be sent back for recheck which caused extra tension among students (11.11%). 30% students of law college also mentioned that Annual examination was burdensome and evaluation was not proper according to what was written as the papers were checked in another state in West Bengal. 20% students of institute of hotel management mentioned that there was no proper invigilation which resulted into malpractice in examination hall. 14.66% students of medical institute mentioned that there was lots of partiality in giving marks in examination.

16. Problem related to colleges/institutes

- The problems that students faced in government general colleges revealed that there was non availability of computer facility (53.99%), classroom was overcrowded, common room for boys and girls were not available, transport facility was inadequate, hostel facility was inadequate (50.68%), there was no higher course like MA, M.Sc, so students had to go outside the state (50.29%), there was insufficient teachers (49.70%), campus was very small (49.31%), proper toilets and urinals were not available (46.78%), there was less furniture available in the classroom (45.61%), noise pollution from vehicles which pass near college caused lots of disturbance (43.27%), proper canteen was not available in campus (42.49%), there was not enough space in library (41.91%), option of subjects were not available to choose (41.71%) and timing for the morning shift was difficult for students who stayed far (40.93%), there was inadequate books in the library (38.98%), there was lack of permanent teachers (38.40%), co curricular activities were not well organized (36.06%), classes were not held regularly (34.50%), playground was in bad condition (33.72%), there was no indoor games facility (30.21%), there was no environment to study (30.01%), inefficient lecturers and they taught only from the examination point of view (22.41%), there was no funds available for excursion (20.46%), there was no hostel facilities, teacher did not come to class regularly (19.49%),
laboratory equipments were outdated (17.54%), commerce and science stream were not available in all Sikkim Government College Namchi, there was no playground (17.15%), Geography practical equipment was not adequate (15.59%), there was lack of modern equipments in science laboratory and there was no active student committee (13.64%), there were old and torn books in library (13.45%), science laboratory had old equipments and specimens, there was no teacher quarter (12.47%), student had to go outside the state for practical exam and faced language problems (11.69%) and there was no sound system in the classroom (3.11%).

- The problems that students faced in government professional colleges revealed that there was no college building and there was inadequate books for study and issuing in library (80%), there was no hostel accommodation (70%), there was no campus (30%), computer facility was not provided, authority did not allow any student organization and guest speakers were never invited in the institution (30%), there was no transport facilities, identity card was for a very limited period of six months and there were other people rented in same college building which caused disturbances (20%). Students of government institute of hotel management stated that there was disturbance from the noise of vehicles of highway (80%), there were inadequate books for study and issuing in library and also that there was no campus (40%).

- The problems that students faced in private general and professional colleges revealed that co curricular activities were not organized in college as stated by 30% students of private general college and 10.66% students of medical institute. 35% students of private general college, 20% students of colleges of education and 16% students of medical institute mentioned that transportation facility was not provided. 50% students of private general college and 38.66% students of medical institute mentioned that there were inadequate books in library. Students of private general college such as 40% stated that the computer facility was not provided in college and 25% stated that there was no play ground in the college. 30% students of colleges of education and 20% students of private general college mentioned that there were inefficient teachers in college. Students of colleges of education stated that it was difficult to understand the pronunciation of teachers as some of them were from vernacular medium (30%), teachers just dictated
notes (25%), there was no telephone facility in campus (10%) and the canteen facility was not good (5%). 52.94% students of technical institutes and 20% students of medical institute mentioned that there were insufficient teachers in college. Student of technical institutes (Himalayan Pharmaceutical Institute) stated that college was very far and there was no facility for sport and games (6.86%) and there was no updating of library (4.90%). 17.33 percent students of medical institute and 12.74 percent students of technical institutes (Sikkim Manipal Institute of Technology) mentioned that new edition books were not available in library. 46.66 percent students of medical institute and 38.23 percent students of technical institutes (Sikkim Manipal Institute of Technology) mentioned that teachers kept changing. Students of medical institute stated that there was less patient in the hospital resulted into less practical work (66.66%) and there was no student council so gap between students and administrators (10.66%).

6.9 Feed back from former students

Findings related to infrastructure

1. College building

The study revealed that former students of 100% colleges/institutes under study expressed the importance of own college/institute building instead of rented college/institute building so that the rent that are to be paid could be used for maintenance and development of college/institute.

2. Hostel facility

The study revealed that former students (76%) of colleges/institutes under study showed importance of hostel facility for students from far off places. They also expressed that student who was staying in rented house which did not provide enough security especially to girls students. Moreover it that added extra burden to them as they had to take care of whole house as well as studies.

3. Transport facility

The study showed that transport facility was not available in 80% colleges/institutes under study as expressed by former students. 66.66% former students
of colleges/institutes under study used Sikkim Nationalised Transportation (SNT) bus and local taxi for transportation which was found to be very expensive for students. They stated that Rs. 15-50 per day expense for transportation was very high for students. Need of college bus is one of the main requirement of colleges/institutes which increases regularity and punctuality among students which in turn adds to proper running of classes.

Findings related to Finance
1. Scholarships
The study revealed that former students of only 20% college that was government general colleges mentioned that financial assistance of 1,200 per annum were given to all students of Sikkimese origin. Former students of rest 80% colleges/institutes under study also expressed the need of scholarships for students which will act as reinforcement and for motivating students.

2. Fees
The study revealed that former students of 40% colleges/institutes such as medical institute (66.66%), colleges of education (50%) and technical institute (50%) mentioned that the fee charged in college was too high. They expressed that fees should be allowed to pay in smaller amount in many installments so that even the students from poor economic background can enter the course and complete the course successfully. Whereas 30% former students of government general colleges and law college stated that the fee charged in college was low and they expressed that it should be average so that the funds collected from fees can be used for maintenance of college instead of waiting for government to pay.

Findings related to administration
1. Admission
The study revealed that 100% former students of colleges/institutes under study stated the importance of Common Admission test to select students especially for
professional courses. They expressed that it makes students aware of the course that they are preparing for.

2. Course satisfaction

The study showed that former students of institute of hotel management (100%), medical institute (100%), technical institutes (83.33%), law college (80%), colleges of education (75%), government general colleges (64.70%) and private general college (60%) were satisfied with the course that they opted in the respective colleges. Although majority of them (70%) stressed the need of course which produce skilled manpower in society which in turn will help in getting employed. Need of guidance for students to choose the correct course was also stressed by them.

Findings related to Academic

1. College environment

The study revealed that former students of institute of hotel management (100%), private general college (80%) and government general colleges (52.94%) mentioned that there was disturbance from the noise of vehicles from National Highway. 100% former students of law college mentioned that other people rented in the college building caused distraction so they stressed of having own college campus where proper environment can be provided.

2. Method of teaching

The study revealed that 100% former students of colleges/institutes under study stated that teacher used lecture method. Different methods of teaching like discussion method, demonstration method were used sparingly. 80% former students of colleges/institutes under study stated that teacher usually dictated notes in the class. They emphasized that efficient teachers should be recruited, orientation of new teachers to the different method of teaching and refresher should be made compulsory.
3. Library

The study indicated that 100% students of colleges/institutes under study mentioned that library should be stocked with adequate books, new journals, newspapers. The sitting arrangement should be proper so that students can go through the reading material without being disturbed. Adequate space to accommodate students and open shelf system for students should be given so that many students can avail the facilities of library. The working hour of library should be fixed but not according to the convenience of librarian. The need of full time librarian is stressed by former students of 40% colleges/institutes under study.

4. Curriculum satisfaction

It was revealed that 80% former students of colleges/institutes under study stressed the need of need based curriculum. 50% former student of colleges of education and 17.64% former students of government general colleges mentioned that the curriculum is outdated and expressed the need of thorough revision and updating of curriculum.

5. Co curricular activities

The study indicated that 35.29% former students of colleges/institutes under study expressed the need of conducting co curricular activities in colleges/institutes. The social values like team working, tolerance are developed through these activities.

The former students of government general colleges (35.29%), colleges of education (25%) and technical institute (16.66%) mentioned that the co curricular activities were not well organized and students were not well informed about the co curricular activities organized in college. Therefore they stressed on the proper organization of co curricular activities with the guidance of teacher.

6. Examination and evaluation

It was found out that 100% former student of colleges/institutes under study expressed preference for semester type of examination. Former students of law college (80%), colleges of education (75%), government general college (70.58%) and private
general college (60%) mentioned that there was relatively high failure percentage in university examination, students faced language problem to approach university that is North Bengal University where Bengali language was used and University is outside the state so it was difficult to convey any problems to them. Therefore they had stressed on the establishment of general University in the State itself.

6.10 Findings from interview taken from the officials of Secretariat Level
- All the six officials of secretariat level of Human Resource Development Department were aware and interested for the development of Higher Education in the State. They mentioned that teachers should be recruited based on UGC norms and also felt the need of State Government policy for establishment of colleges/institutes based on UGCs guidelines. They also stressed on the establishment of Sikkim Council of Higher Education (SCHE) for better monitoring and development of Higher education. They also mentioned that State Government provides scholarships to the students pursuing higher studies in different colleges and universities of our country.
- They were aware about the aims and objectives of Higher education which are as follows (i) development of human resource (ii) specialization of education (iii) accelerating the pace of modernization (iv) development of enlightened citizens.
- However all the six officials had not carried any supervision of the colleges or institutes of the State.
- They all were conscious about the problems about Higher Education in the State. Some of the problems mentioned by them are as follows:
  (i) Less college to accommodate increasing number of students (ii) Less number of faculty (iii) Large number of teachers on adhoc basis who leave the job anytime as they get better prospect. (iv) Crunch of financial assistance (v) lack of teaching faculties (vi) lack of infrastructure (vii) lack of teaching/learning environment.
- Some of the suggestions offered by the six officials for the better functioning of educational administrative machinery in Higher Education of Sikkim were as follows(i) more colleges should be established in the Gangtok itself to accommodate the large number of students from Sikkim Government College, Gangtok (ii) Infrastructure should
be developed (iii) teacher should be appointed on regular basis (iv) more funds should be allotted (v) professional courses should be encouraged to develop skilled manpower.

6.11 SUGGESTIONS FOR IMPROVEMENT IN THE FIELD OF HIGHER EDUCATION IN SIKKIM

6.11.1 Administration

(i) Establishment of more colleges is very important to cater to the needs of the students from all the four districts of Sikkim and distribute the students equally. Since enrolment in general education is three times more than in professional colleges, this also avoids over-crowding of the general colleges currently present in the state.

(ii) Sikkim has not yet established any high level board, council or committee to advise and provide expert guidance in matters related to Higher Education. Thus establishment of State Council of Higher Education is very essential for proper coordination and maintenance of higher education in the state.

(iii) The Higher Education in Sikkim is looked after by secretariat. The Joint Secretary I is given responsibility to look after higher education in particular. It may be advisable now to examine the need to establish separate directorate for Higher Education for its effective management.

(iv) The need of an hour is immediate establishment of Sikkim University since Sikkim University Bill was passed by the cabinet and Sikkim University act was formed in 2003.

(v) Leadership style of the head of the institute of higher education should be democratic for the proper functioning of the system and encourage team work. So that good relation is also ensured between Head of the Institute, teachers and students which makes the working environment easy and workable.

(vi) The head of institute should make sure that the administration be transparent, there should be disintegration of power and division of responsibility.

(vii) The Government was to adopt a policy regarding establishment of colleges and sanctioning grants based on the type of college.

(viii) Co-operation and co-ordination between staff member should be maintained by organizing various academic activities.
(ix) Time to time the supervision by the authorities (both government and university) should be carried out though maintaining the autonomy and academic freedom of each colleges/institutes.

(x) The need of the hour is to bring confidence in the ability of the state colleges for providing education relevant to the present context and that too cost effectively.

(xi) Students need opportunities to put classroom learning into practice. Students need service programming so they can volunteer, be exposed to social problems, and have the opportunity to solve those problems.

(xii) Environment for study should be encouraged through various modes and media available.

(xiii) More optional courses should be provided in college so that students can choose the subjects according to their capability and interest.

(xiv) Higher education colleges/institutes should adapt itself to the use of Information and Communication Technology to face the challenge of globalization.

(xv) Morning, day and evening- the three shifts in one college should be removed and only full time day classes should be conducted to provide quality education to the students and for better contribution from the teachers. The three shifts also cause fatigue among teachers and they can not remain accountable to their profession.

(xvi) Student committee should be formed in each colleges/institutes and work for the welfare of students.

(xvii) Fixed dress code like uniform is not required for students of higher education as they are grown up human being.

(xviii) Medical institute should attract more patients for which they have to make their service friendly especially for rural people.

(xix) There is a need to place greater emphasis on enrolment of students from underprivileged backgrounds such as the rural areas, the scheduled castes and tribes and other backward groups, minorities, the disabled and others who have suffered from discrimination which has existed for centuries.

(xx) Guidance and counseling services in Higher Education were missing. There should be effective co ordination between emplying agencies and educational institutions which could help in the placement of students.
Teachers

(xxi) Only qualified, competent, efficient teachers who can compete anywhere in India should be recruited in the colleges/ institutes of higher education.

(xxii) UGC norms like NET/SLET with 55 percent marks in post graduate degree should be must for appointment of teachers.

(xxiii) Permanent teachers should be recruited for giving quality education. Contract for the teachers should be at least 5 years so that teachers stay for five years in each college/institute.

(xxiv) Sufficient number of teachers should be provided and lecturer for each subject should be provided to avoid the burn out of teachers.

(xxv) There should be proper advertisement whenever the post of lecturer is lying vacant so that many candidates can apply and the best can be chosen for disseminating knowledge.

(xxvi) Adhoc and part time teacher should be avoided to bring accountability among teachers of Higher education.

6.11.2. Infrastructure

(i) Campus of Sikkim Government College the oldest college at Gangtok should be enlarged or new college should be established to accommodate large number of students presently studying in that college.

(ii) Classroom should be big enough to accommodate all students.

(iii) Adequate furniture should be provided.

(iv) Sound system in the classroom should be provided so that even the students sitting at the back bench in a large classroom can hear the teacher teach.

(v) Laboratories should be well equipped with modern equipments to disseminate better practical knowledge and give access to students about modern technology especially coming from rural areas.

(vi) Computer facility should be provided to students.

(vii) Sufficient space in library is important to accommodate the increasing number of students.
(viii) Xerox facility should be provided.
(ix)  Common room for boys and girls should be provided.
(x)  Adequate toilet facility should be provided.
(xi)  Indoor games facility should be provided.
(xii) Playground should be improved.
(xiii) Adequate transport facility should be provided.
(xiv) Proper canteen should be provided in campus.
(xv)  Public telephone booth with STD in campus is important in case of colleges/institutes which are located in far off places in rural areas.
(xvi) Adequate hostel facility should be provided to accommodate students from far flung areas.
(xvii) Teacher quarter should be provided.

6.11.3 Finance
(i)  Fund allocation for higher education should be increased.
(ii)  Scholarships for the meritorious student pursuing Higher Education should be provided to motivate them and assist them financially.
(iii)  Financial support for minorities who are good in studies should be provided to encourage them to come forward and join the main stream of society.
(iv)  Up-to-date equipment in the laboratory/workshops should be purchased.
(v)  Enough funds for excursion should be provided especially in government colleges so that even the students from poor students can join the excursion which gives them chance to visit various places and interact with different people, culture and custom of our nation.
(vi)  Institutions of higher education should make efforts to raise their own resources by raising the fee levels, encouraging private donations and by generating revenues through consultancy and other activities. On the other hand Government of Sikkim should monitor that these higher education institutes do not function as profit making industry.
(vii) The Government will have to step up measures for encouraging self-reliance while providing a much more massive investment than hitherto.
6.11.4 Academic

Course
(i) Higher courses like MA, MSc should be provided in the colleges/institutes of state so that deserving students can acquire higher education in the state itself.

(ii) Commerce and science course should also be provided in the Sikkim Government College, Namchi also to cater to the need and demand of the students as that is the only government general college in south district of the State.

(iii) More Honours subject should be provided in general colleges as this is one of the criteria needed for post graduate course. So if more honours subject are provided than the students can have access to higher education.

(iv) More options for method paper should be provided in the colleges of education so that students can master the skills of teaching in their specialized subjects.

(v) Curricular changes should be considered to teach youths the skills and knowledge needed to be participatory citizens.

Library
(i) Adequate books should be available for reading in the library and also for issuing.

(ii) Books that are placed in demand by the college and those books that are actually acquired from supplier should be checked whether exact books are supplied or other books are supplied or books are second hand type.

(iii) New edition books should be provided in the library.

(iv) Students should be allowed to take books during short holidays also as some of the government college do not allow the students to take books during holidays which prevent them from doing their assignment and simple reading also. Most of the students from rural area cannot buy books themselves.

(v) Library should be updated timely.

(vi) Working hour of library should be extended so that students and teachers can do their work little longer.

(vii) Journals and magazines should also be provided which carries lots of new information.

(viii) Computer and Internet access in library for browsing the information is important to keep abreast with the new developments in various fields of education.
Co curricular Activities

Co Curricular Activities should be well organized which has psychological, social, physical and moral value. Ways and means should be found out to attract the maximum number of students to these activities or it might be suggested that co curricular activities be made compulsory.

Examination & evaluation

(i) Entrance examinations for admission should be held to give choose students who are able to undertake further education.

(ii) System of examination should be semester type to reduce burden for students and which also make students study all through the course.

(iii) In Government General College, Gangtok final practical examination should also be held in the college itself. Students have expressed that it causes extra tension, anxiety and they do not understand the language spoken in the colleges where they are sent, usually the colleges which are chosen by university to conduct practical are located in North Bengal where they use Bengali language more than the English and Hindi which causes inconvenience and adjustment problem to our students from the state as a result they cannot do their practical examination well and cannot score well.

6.12 SUGGESTIONS FOR FURTHER RESEARCH

The present study had studied the Higher Education in Sikkim consisting of the development of Higher Education, present status of infrastructure, finance, administration and academic in higher education, problems of college teachers and students and remedial measure for the same. Other domains were also included such as affiliation of colleges/institutes, recognition by UGC, State Government and councils, courses, research studies etc. In the course of study there was a felt need to conduct other researches on other aspects of Higher Education not covered in this work. It would indeed be enrichment to the educational world, if research were carried out in the following areas:

(i) A Study of patterns, procedures, policies and planning of Human Resource Development Department, Government of Sikkim in the matter of Higher Education can be conducted.
(ii) Case study of one Government College and private college can be conducted to know the reason why students’ enrolment is higher in general courses then in professional courses.

(iii) A study of the financial management of colleges/institutes present in the state might also be conducted.


(v) A study may be under taken to locate specific problem faced by colleges which are affiliated to university that is located outside the state (i.e. in West Bengal).

(vi) An Investigation to the existing conditions and developmental problems of Affiliated Colleges in North Bengal University Area can be conducted.

(vii) A comparative study of the performance of degree colleges under different managements in Sikkim can be conducted.

(viii) A comparative study in the relationship between the attitude of teachers and the performance of students can be carried out.

(ix) A comparative study on the development of Higher Education in different states of the North East region might also be conducted.

(x) A study may be conducted on the status of teachers of higher education and their self concept.

(xi) A study may also be conducted on the implication on society due to lack of proper higher education institute like University in the state.

(xii) A study of student services in the colleges in Sikkim.

(xiii) The existing system of examinations in Higher Education and measures for improving upon it can be conducted.

(xiv) A critical study on the effectiveness of the existing curriculum of undergraduate course in Sikkim.

(xv) A study of the classroom climate and methods of teaching adopted by teachers of higher education can be conducted.

(xvi) Wastage and stagnation in collegiate education in Sikkim.