Study on Assessment of computer education at secondary level (School & Madrasah)

Introduction

The Government of Bangladesh has given utmost importance to education for the socio-economic transformation and advancement of the country. To meet up the educational needs of the country and thereby create requisite human resources, the government has taken significant reform measures for the quantitative and qualitative development of education.

The present education system of Bangladesh may be broadly divided into three major stages, viz. primary, secondary and higher education. Primary education is imparted basically by primary level institutions. Secondary education is imparted by junior secondary and higher secondary level institutions. Higher education is imparted by degree pass (3 years), degree honors (4 years), masters (1 & 2 years) and other higher level institutions of equivalent section of other related institutions.

The education system of Bangladesh is being managed and administered by two Ministries in association with the attached Departments and Directorates as well as a number of autonomous bodies. The two streams of education are: Primary education (Grade I-V) and Secondary and Higher Education (Grade VI and above). The Ministry of Primary and Mass Education (MOPME) under a Secretary manages the primary education sector while the other stream i.e. from secondary to higher education is managed by the Ministry of Education (MOE) headed by Secretary of its own. The post-primary stream of education is further classified into four types in terms of curriculum:

- ➢ *General education*
- ➢ *Madrashah education*
- ➢ *Technical-vocational education and*
- ➢ *Professional education.*

Secondary Education System in Bangladesh

Secondary education prepares pupils for employment at entry level and serves as a foundation for those who aspire for advanced studies. In Bangladesh, the steady growth in primary education over the last three decades has resulted in a concomitant expansion in the number of schools, teachers and madrashas. Secondary education is divided into three levels: junior secondary grades 6-8, secondary education grades 9-10 and higher secondary or Intermediates, grades 11-12. Alia madrashas offer education in religious and general subject in primary grades 1-5, junior secondary and secondary grades education in 6-10 (Dhakil), higher secondary grades 11-12 (Alim) and Degree (Fazil) and Masters (Kamil) levels. Currently Bangladesh has 18500 secondary schools recognized by the government. The schools have over 7.6 million students of whom about 53% are girls. The total number of teachers in the secondary schools is about 232929 of whom 46983 are female. The numbers of secondary level madrashas (Dhakil) are 6414 with 2301460 students and 80265 teachers.

Objective of the research study

The research was designed for addressing the following objectives:

➢ To identify the computer facilities of institutions.
➢ To identify the computer subjects teacher & their educational background.
➢ To identify the utility of computer.
➢ To know the sources of supply of computers.

Sample design

A single stage cluster sampling technique was applied in the survey to select the sampling units. Randomly selected the 35 upazilas where at least 15 schools/madrasahs teach the computer subjects.

Sample design as follows:

Division wise Sample design

	No. of Thana	Percent	No. of Thana in the Sample
Barisal	40	7.6	3
Chittagong	107	20.3	7
DHAKA	152	28.8	10
Khulna	64	12.1	4
Rajshahi	61	11.6	4
RANGPUR	67	12.7	4
SYLHET	37	7.0	**3**
Total	**528**	**100.0**	**35**

Survey area

580 institutions of 35 sample upazilas coverage of this research work. 16-17 computer teaching schools/madrasahs from each of the selected 35 upazilas were the survey target area.

Conclusions and Recommendations

Looking at the results derived in the qualitative and quantitative analyses, the following conclusion can be made:

Physical computer facilities of institutions:

The physical state of the computer facilities in the secondary education institutions was reflected to be in-adequate from every perspective.

➢ Firstly, very few institutions were seen to have independent laboratory for computer education,
➢ secondly of those who have independent laboratory for computer education, the condition of the laboratory were not found to be in good state (for example quite a number of institutions have Kacha laboratory).

> the state of electricity supply was repeatedly reported to be a concern, since computer learning is highly dependent on un-interrupted electricity which is currently not a reality in rural Bangladesh.

> Although, there is wide spread attempts by government as well as some private sectors as well for providing enough number of computer for all the secondary education institutes, it is still a long way to go.

Teacher & their educational background:

Both the qualitative and quantitative analyses suggest that the education and trainings of the computer teachers in the secondary education institutes were observed to be up to the requirement. But more involvement of the computer teachers on the computer subject was seen to be sought. Keeping the computer teachers from other administrative or teaching responsibilities may help the situation.

The utility of computer Teacher:

The quantitative studies revealed that computer teaching is done with a maximum of three classes a week. The qualitative study also revealed that the students are rarely allowed to use computer outside class hour. In this perspective, making a comment that the computers are utilized properly does not seem to be practicable.

Main sources of computer:

It is observed that the main sources of computer for the secondary education institutions are Ministry of education and Bangladesh Computer Council. Besides these, Ministry of Science and Technology also provides some of them, some institutions were also observed to buy from their own sources.

Challenges of computer education at secondary level

From both quantitative and qualitative analyses, the main challenges for the computer education at the secondary level were identified as:

1) *Shortage of computers:* This was the commonly uttered problem in the discussions. Almost none of the schools have adequate number of computers to cater their number of students.

2) *Irregular supply of electricity:* This was also a common mentioned point, the supply of electricity in most of the rural area were reported to be paltry.

3) *Unavailability of computer for use outside school:* Use of computer outside school is a integral requirement for better learning of computer, but given the socio-economic background of the majority of the students, access to computer outside school was found to be very rare.

4) *Time spent by teacher and their skills:* Although students were all in praise of their teachers, it apparently came out of some discussion that not all computer teachers were well trained and some of them were unable to spent enough time for computer teaching due to other responsibilities.

5) *Lack of regular maintenance:* High-tech devices like computers usually need regular professional maintenance which ts clearly absent in the secondary education institutes.

Possible remedies of the Challenges

The following recommendation can be made to overcome the above mentioned challenges:

1) Increasing Number of computer in each school for at least one-to-one usage
2) Availability of internet and e-study materials books and exams
3) Supply of UPS/IPS until regular supply of electricity is ensured.
4) Lowering computer prices to bring it to general people's reach
5) make more training program available for teacher
6) Recruitment of teachers with high level of training only for computer teaching
7) Develop in-house maintenance system