

Conclusions and the Way Forward

6.1 Introduction

National Education Research and Evaluation Centre conducted two National Assessments of Learning Outcomes, at grade 4, in 2003 and 2007 respectively. In these assessments, achievement in First language, English language and Mathematics of students completing grade 4 was assessed. According to the findings, in 2007, an improvement in average performance levels in all three subjects at national level was evident. However, English language performance was comparatively low. While an improvement in the achievement of all sub skills was evident in Mathematics performance, achievement in writing skills was low, both in the Sinhala as well as English language performance. In the 2007 study, a modified version of the “TIMSS” was also administered and the Island wide performance was considered “average” (NEREC Report, 2007, p.122)

Although there was a trend improvement over the period of four years in the mean cognitive achievement scores, there were also disparities in achievement among provinces, ethnic groups, by gender and by location. The Eastern, Northern and Uva provinces continued to display low performance. While Tamil medium students’ performance was lower than the Sinhala medium, achievement of female students was better than the males, and the urban schools performed better than rural schools. Higher achievement levels of 1AB schools and the lowest achievement being recorded by the Type 2 schools was also a trend.

In 2009, the National Assessment was repeated with slight modifications to the “TIMSS” and using a different sampling procedure, as discussed in chapter 2. The main purpose of the 2009 National Assessment was to identify the patterns and trends in achievement, in order to find out whether the trends observed in 2007 assessment are sustained.

The purpose of this chapter therefore, is to discuss the main patterns and trends identified through the 2009, National Assessment. As discussed in chapter 1, policy measures have been taken based on the findings of the two previous studies. This chapter has three main objectives.

1. Summarize the findings in relations to the patterns and trends observed
2. Analyze the main trends observed, in the light of the measures already taken to reduce disparity in achievement levels.
3. Identify further measures to provide opportunities to achieve ‘education for all’.

6.2 Patterns and trends Identified in the achievement of learning outcomes -2009

6.2.1 All Island performance and trends

Overall performance

The overall performance in Mathematics and Sinhala is satisfactory, with mean scores of 75.5 and 77.04 respectively.

Compared to the performance in Sinhala as a First language, the achievement in Tamil as a First language is low with a mean value of 63.3. The Island average for English language was 55.9

A positive trend was observed in the achievement of learning outcomes, in all four subjects over the period 2003 -2009.

However, in the performance of Mathematics and Tamil language in 2009, a slight decline from 2007 can be seen.

Sub skills

There is a substantial improvement in the achievement over time (2003 -2009), of writing skills in the two First languages. In the previous studies, writing was considered the weakest. According to the findings of the 2009 study although, writing skill achievement is still the lowest, the magnitude of the increase over time is substantial.

When the performance in writing in the English language is concerned, even though there is a positive trend over time (2003-2009) from 16.3 -21.48, there is a decrease in performance from 2007 -2009 (29.8 -21.49)

All Island trends in the achievement of the three sub skills in Mathematics also show a positive trend over time (2003-2009). The increase over the period 2007 -2009 is also substantial, with mean scores of over 70 in all three sub skills - concepts, problem solving and procedures.

School types

A positive trend in achievement was also observed across all school types, in all subjects.

A significant finding is that the performance in all four subjects has increased substantially in Type 2 schools, even though their performance lags behind other school types.

In the achievement of learning outcomes for the Sinhala language, Type 2 and 3 schools' performance has increased substantially.

On the other hand, when the achievement of Tamil as a First language is considered, Type 2 and 1C Type schools show an increase in achievement. The surprising finding is that 1AB and Type 3 schools show a decrease in performance. As mentioned in chapter 4, this could be due to the fact that 1AB and Type 3 schools have not been adequately represented in the sample. There are no Tamil medium 1AB schools represented in the sample from four provinces - Southern, North Central, Sabaragamuwa and Uva. Further, Type 3 schools from North Western, Southern and Western provinces are not represented in the sample. This aspect would be further discussed in section 6.3.

In the performance of English language, Type 2 schools once again show a substantial improvement over time. The percentage of high achievers (76 -100%) has increased from 6% in 2003 to 13% in 2007 and to 16.7% in 2009. However, 41.8% still fall within the 26-50% range.

In Mathematics performance as well, Type 2 schools' achievement level has increased slightly.

The significance of this slight increase is that in all other school types, Mathematics performance has decreased over 2007-2009.

Thus, it could be concluded that there is a positive trend over time in the increase of learning outcomes in Sinhala language, Tamil language, English language and Mathematics in Type 2 schools.

Location

Although there is still disparity in achievement between the urban and the rural sector in the achievement of learning outcomes, in some of the subjects, the gap appears to be narrowing.

There had been a positive trend over time in the achievement of learning outcomes in Sinhala language and English language.

In the achievement of Sinhala language, even though the mean score for the rural sector is less than for the urban sector, the magnitude of the increase in mean scores over time is more in the rural sector.

In the Tamil language, there has been a decline in the achievement in both the rural and urban sector. However, the decline is greater in the rural sector than in the urban sector.

There is a positive trend in the achievement of learning outcomes in the English language in both the urban as well as the rural sector. However, the magnitude of the increase is higher in the rural sector. Further, there is hardly any improvement (65.1-65.8) in the urban sector achievement from 2007 -2009. On the other hand, in the rural sector, the increase is from 51-53.23. Although there is still disparity in achievement between the urban and the rural sector in the achievement of learning outcomes, in English the gap appears to be narrowing.

Mathematics performance also shows the same pattern, displaying a positive trend in achievement over time (2003 - 2009) in both the urban and the rural sector. As in the performance of English, in Mathematics also the magnitude of the increase is higher in the rural sector. However, from 2007-2009 there is a decrease in achievement which should be taken into consideration by the authorities.

Gender

In all subjects, females have performed better than their male counterparts, even though there is a positive trend over time (2003 -2009) in achievement among both males and females.

However, a significant finding is that, in both Mathematics and Tamil language performance, there is a decrease in achievement among males between 2007 -2009. This declining trend needs to be addressed.

6.2.2 Provincial wise performance and trends

The findings of the present study indicate that while there are variations in provincial wise achievement, the patterns observed in the past are changing.

As mentioned in chapter1, it has been claimed that there is high variation in average learning achievement in the primary education cycle. The 2007 National Assessment findings also confirmed such variations, although a trend was evident in narrowing this gap. According to the 2007 study, based on the composite index Western, North Western and Southern provinces had secured first, second and third places in the rank order (NEREC, 2007, p.120).

However, according to the findings of the 2009 study as indicated in Tables 6.1 and 6.2, the North Western province appears to be the best performing province in over all achievement of learning outcomes. While it is ranked first according to the mean values in the achievement of Sinhala language, Mathematics and TIMSS, it is ranked second in English language and Tamil language achievement. On the other hand, the Western province is ranked first only in the achievement of learning outcomes in the English language. Therefore, there is a shift in achievement patterns from the Western province being considered the best province to the North Western province.

Another significant development is in the achievement of learning outcomes in Mathematics. According to the 2007 findings, Western province showed the highest performance in First language and Mathematics. However, according to the findings of the present study, based on the percentage of students who has scored greater or equal to fifty marks, the Sabaragamuwa province is ranked first in both the achievement in Mathematics as well as in TIMSS. It is ranked second according to the

mean values. Thus, Sabaragamuwa province could be considered as the best performing province in Mathematics.

While the Western province continues to be ranked first in the achievement of learning outcomes in the English language, the Northern province is ranked first in the Tamil language performance.

A new pattern that is emerging is the addition of the Central province to the low achieving group. On the other hand, the trend displayed in the Uva, Eastern and Northern provinces (except in Tamil language achievement) continues.

6.3 What the findings reveal

The findings of the National Assessment, 2009 reveal that the positive trend over time in the achievement of learning outcomes observed in the 2007 study is sustained. Thus, these findings are further evidence for the claim that the quality of primary education in Sri Lanka is improving. Further, education reforms and the ESDFP currently being implemented seem to be working towards achieving equity by reducing disparities.

There are some positive trends identified in the findings that support the claim, that quality of primary education is improving. The magnitude of the improvement in achieving learning outcomes in Type 2 schools and the rural sector, improvement in performance in the English language and Sinhala language and the shift in achievement patterns provincial wise are some of the positives achieved over the last two years.

However, there are also negative trends that the policy makers need to be concerned. The decline in the average performance in Mathematics and the low achievement level in “TIMSS”, low performance in Tamil language and the decline in performance shown by Tamil medium students, declining performance by male students, especially in Mathematics and some provinces continually showing low performance are areas that attention need to be focused. Even in provinces where high average achievement is shown, there are groups of low achievers. These students may need special attention.

Therefore, these findings need to be fed into the policy framework at relevant points to improve quality of education.

6.4 The way forward

It is said that a national assessment usually collects information on demographic and other background factors to compare the achievements of subgroups in the population. Such information, when correlated with student achievement helps to identify the groups that are underserved by the system as well as factors associated with low achievement. This in turn will facilitate the planning of remedial measures (Kellaghan, Greaney and Murray, 2009)

Unfortunately, the present assessment did not collect such information. Therefore, it is recommended that in such future studies information pertaining to factors associated with student achievement as well as provision of resources be collected.

Strengthening divisional level planning and enhancing resources to promote student learning at all levels is one of the strategies identified by the ESDFP, 2006. Thus, there is a need to find out the reasons for the continuous low performance of the four provinces - Uva, Northern, Eastern and the Central. The low performance of these provinces could also be influenced by the low achievement in Tamil medium students as these provinces have a large Tamil speaking community. Further, performance in the Northern and Eastern provinces could also have been affected by the secessionist conflict, and in the Uva and Central province, by the influence of the low achievement of students from the plantation sector. Thus, multiple variables may influence the performance of these provinces and special attention of the policy planners and more public resources should be targeted to these provinces.

Best practices from the Type 2 and rural schools that have shown improvement should be identified. These best practices should be utilized to plan school based intervention programmes in low achieving schools. Such information should help in implementing the ESDFP strategy of “establishing performance profiles for schools and division to monitor learning” (ESDPF, 2006, p.38)

More research into the teaching and learning of English and Mathematics should be implemented. While there has been substantial increase in achievement in English in some of the rural schools in some provinces, in four provinces the achievement is

below the national average. Thus, there is a need to improve the teaching of English in these provinces by adopting the best practices of the better performed schools. Further, one reason for the low achievement could be the lack of teachers. Except in the Western province, in most other provinces there is a deficit of English language teachers to teach in primary grades. Thus, as mentioned in the ESDFP (2006), introducing the divisional level teacher recruitment and deployment to ensure availability of the required teachers to all schools, needs to be exploited.

In the teaching of Mathematics, while student achievement in all three sub skills is satisfactory, achievement in sub skills addressed in “TIMSS” is not satisfactory. Further, there is a declining trend in the performance in Mathematics which could be the result of low performance of boys in Mathematics. Thus, this is an area that needs further research and intervention.

Performance in the Tamil language and the education in the Tamil medium schools are also a priority areas that has to be targeted for improvement. However, as mentioned before it is with caution that claims are made regarding Tamil medium performance as all school types are not well represented in the sample. This may have adversely affected the All Island mean achievement.

Special attention should be paid to the low achievers among the high achievers. Several provinces were identified with a large percent of high achievers and a low percentage of low achievers. The tendency is for the middle level to move to the higher level while the percentage of low achievers remains. Thus, remedial programmes should be targeted at this group at school level.

Finally, it is recommended that as planning and monitoring is done at provincial level with the assistance of the zonal education departments, more research at provincial level should be conducted on the achievement of learning outcomes.