Centre for Mathematics, Science and Technology Education in Africa (CEMASTEA)

A new study shows that about a quarter of the available annual schooling time is used on non-learning activities

The Centre for Mathematics, Science and Technology Education in Africa (CEMASTEA) conducted a study to understand the quantity and quality of teacher- students' interactions in schools. Phase I of this study which focused on the quantity of time teachers and students interacted was conducted in selected primary and secondary schools in three counties: Kisumu, Uasin Gishu and Tharaka Nithi in Term 1 of 2017. The three counties represented an urban-rural spectrum based on the Commission for Revenue Allocation (2011) fact sheet with Kisumu County representing the urban counties, Uasin Gishu representing semi-urban counties and Tharaka Nithi representing rural counties. In total, 40 schools 20 each from the primary and secondary level participated in the study. The schools were distributed as follows: 10 schools 5 each from the primary and secondary level in Kisumu and Tharaka Nithi counties; and 20 schools 10 each from the primary and secondary level in Uasin Gishu County.

The study involved principals and head teachers of the selected schools as well as mathematics and science teachers in those schools. Also, selected were Standard Five and Form Two students from the schools who participated in the study. Data were collected from principals, head teachers, and teachers through questionnaires. Principals and head teachers were interviewed through a one-one semi structured interviews to understand about the school calendars, routines and mechanisms used to cover for any time loses. On the other hand, a focus group discussion was conducted with the students to understand from their point of view the activities in school and the time apportioned to them.

The findings of the study are summarised as follows:

- There is inconsistency between the available time for schooling as guided by the MOE and suggested time for coverage of content in the syllabus. While the MOE guides that schools have 35 weeks of available time for learning, the syllabus (KIE, 2002) as drawn by the Kenya Institute of Curriculum Development (KICD) suggests a time for coverage of the syllabus of as high as 40 weeks.

- Secondary schools that participated in the study spent an average of 29.5% of the school time per year on activities other than coverage of content as prescribed in the syllabus while primary schools utilised 28.6% on average on similar activities. The activities included: opening procedures such as issuing of text books and cleaning the classes and school compound in general; closing procedures such as marking and preparation of report cards, cleaning the classes and school compound in general and examinations. Overall, secondary schools in rural areas were more efficient in the utilisation of time with an average of

24.2% of the official annual school time spent on non-learning activities. On the other hand, secondary schools in urban settings were less efficient with time utilisation with an average of 34.2% of the official annual school time spent on non-learning activities. As for primary schools, those in the semi-urban areas were more efficient in the utilisation of time with an average of 26.6% of the official annual school time spent on non-learning activities. Just like secondary schools in the urban region, primary schools in the urban region were also found to be less efficient with time utilisation with an average of 31.6% of the official annual school time spent on non-learning activities.

- Schools employed a variety of 'coping' strategies to compensate for official school time spent on non-learning activities. Notable were those strategies that encroached on students' right to breaks (i.e., health and lunch breaks) and recreational breaks such as games time. This was done by elongating the recommended teaching time of 35 minutes and 40 minutes for each lesson for primary and secondary schools respectively to as long as one hour per lesson for primary schools and teaching an extra lesson during lunch time for secondary schools.

These findings provide the much-needed empirical data that should provoke debate regarding effective utilisation of available school time by schools. More important is the debate on the attainment of goals of education especially those involving learning for understanding against the backdrop of cognitive overloads that students are likely to experience as a result of learning with limited breaks. The findings call for a harmonisation of guidelines on available time by MOE and suggestions on the time needed to cover the content in the syllabus. It is recommended that MOE develops mechanisms for Monitoring how time is utilised in schools to ensure that students benefit from their time in school in meaningful ways.