[Speaker Presentation]

CONCEPT AND FUNCTION OF QUALITY EDUCATION

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Introduction

During the 1970s and 1980s, most policy makers concerned with education in developing countries limited their attention to school access or enrolments. Over the years however, it became clear that access to school was not sufficient to ensure a decent level of basic learning. While the gains in enrolment had been quite impressive in many parts of the world, including the Sub-Saharan African region, low quality and high dropout rates led to the perception that many of the children left school without having obtained a sustainable level of basic reading, writing and numeracy skills. The rising concern with education quality was strongly reflected in the protocols of the World Conference on Education for All held in Jomtien, Thailand in 1990 and the World Education Forum held in Dakar, Senegal in 2000. It was perceived that ensuring education quality is a necessary complement to educational access and hence quantity and quality had to go hand in hand. This paper focuses on the educational traditions and notions of quality and its concept, and its function of quality education.

Education traditions and notions of quality

Quality education is a relative concept. Educators who seek particular defined outcomes tend to rate it in those terms and will rank educational institutions according to the extent to which their graduates meet those outcomes. The standard of comparison would be in some sense fixed and different from the values, wishes and opinions of the learners themselves. By contrast, there are approaches which emphasise the perceptions, experiences and needs of those involved in the learning experience and should mainly determine its quality. These different emphases have deep roots and are reflected in the major traditions of the development Western educational thought. This section will highlight some of the traditions.

Among the major traditions is the *humanist approach* which is influenced by the educational thought of leading Western philosophers. In their perception, human nature is essentially good and individual behaviour is autonomous. These principles have had some relevance on the educational practice, where learners are expected to be at the centre of the learning process. A type of education which is strongly influenced by the learner's action is judged to be central to developing the potential of the individual child. The acquisition of knowledge and skills requires an active participation of the individual learner (Curtis and Boultwood, 1968; UNESCO, 2004).

Another important tradition is the of the *behaviourist approach* which was based on behaviourist theories of Skinner and Pavlov and advanced by leading curricula specialists like Tyler (1949) and Bloom (1964) who set out educational objectives against which finely tuned instruments could be developed. Behaviourist approach is based on manipulation of behaviour through a specific stimuli. Its basic characteristics are that: learners are not intrinsically motivated or able to construct meaning for themselves; human behaviour can be predicted and controlled through reward and punishment; cognition is based on the shaping of behaviour. Quality in the behaviourist sense is judged through standardized, externally defined and controlled curricula, based on prescribed objectives and defined independently of the learner. (Curtis and Boultwood, 1968; UNESCO, 2004).

The third traditional thought is that of the *critical approach* which encompasses a large array of philosophers,

sociologists as well as the de-schoolers who have critiqued both the humanist and behaviourist approaches. Although the critical approach has embraced a large philosophical thought, they share a common concern that education tends to reproduce the structures of social inequalities of the wider society. For example, they question the belief that universal schooling will result automatically in equal development of learners' potential. They therefore advocate for emancipatory pedagogy which should empower marginalized students by helping them analyse their experience and in that way redress social inequality and injustice.

In less industrialized/developing countries some important efforts have been to articulate alternative development paradigms that are rooted in the realities of their socio-economic and political settings which arise as challenges to the legacies of colonialism and underdevelopment and which apply to the different spheres of development including education. Some leading examples were the development ideas of Mahatma Gandhi and Julius Nyerere. *Ujamaa* or Socialism as was advocated in the *Arusha Declaration* and *Education for Self-Reliance* in Tanzania, for example, set out an *indigenous approach* to education, which placed emphasis on culturally relevant system of education which aimed at preserving and transmitting traditional values, promoting self reliance, fostering cooperation and equality (Nyerere, 1973). (UNESCO, 2004).

The concept of education quality

In studies of quality and equality issues in education in third world countries, it is pointed out that there is as yet no consensus on the definition of the term "quality". More importantly, notions of quality change over time and are tied to societal values. Another important point that has been raised relates to the relative paucity of meaningful data that could provide indicators of quality.

For many people, casual and expert observers, political authorities, parents and communities, teachers and education administrators, "education quality" is defined by national examinations. In their role of measuring quality, they actually specify what it is that they want. The logic of such an orientation is quite straightforward. Education systems set objectives. Those objectives are then operationalised in the curriculum and teachers' guides. The mastery of the curriculum is measured by national examinations. Hence the best indicator of high quality education is a high score on the national examinations. When students perform well on national examinations, then it is reasonable to conclude that they have had a high quality education (Samoff, 2007). In this regard, when families see that the poor quality of schooling will not provide their children with the skills or diplomas they are sent to acquire, they stop sending their children to school. However, the focus on examination results especially in developing countries can be detrimental to the quality of teaching and learning as teachers tend to rely on rote teaching and learning to prepare children for the tests (O'Sullivan, 2006).

Many studies continue to show that efforts to engage with quality are fraught with difficulties, not least of which is a consideration of what quality is. Equally problematic are efforts to effectively achieve, improve and measure quality. Consequently, as much as a lot is written about quality, a reading of the literature can be quite confusing as numerous and conflicting definitions of quality are presented, depending on how the term is conceptualized. The normative nature of the concept provides some explanation for this particular situation. As Motola (2001) points out "debates in the international literature faces the difficulty in finding a definition of quality that would apply to all situations." There are for example, educators whose conceptulisation of quality is grounded in a competency approach, where quality is the effectiveness of the degree to which objectives are met or described levels of competence are achieved (Adams, 1993).

There are also some educators who argue that the concept of quality is elusive because its content depends upon how we choose to define our preferred outcomes of schooling. It is however, noted that common to all education systems is the objective of improving the cognitive achievement of pupils. Furthermore, all nations also wish to help

create, through education, better citizens, namely; people who can support and help strengthen the values that the particular society holds dear. The former objective is universal in form and content. The latter objective is not, which means that cross-national comparison of the quality of education is only partly possible. Such an endeavour has historically focused upon comparing the performance of school leavers in national or international tests of cognitive achievement. By implication those school systems with leavers who consistently score highly on such tests are taken to be of a higher quality than those having leavers who typically do less well. There are for example factors which are ignored in the selection, such as whether the socioeconomic background of students in different schools is similar or the income levels of the localities chosen are comparable. These and related factors have considerable influence if cognitive outcome differences which are attributed to school-level variables (Colclough, 2005).

In addition, there are educators who define quality within a contextual setting. A contextual definition/ conceptualization of quality education can address the problems associated with the normative nature of the concept. In this regard, quality is grounded in the cultural traditions, social relations and economic and political life of the people. Quality education, in this context is unique to each nation and culture. A notable Minister of Higher Education, Training and Employment Creation in Namibia is quoted to have aptly described that the notion of "quality and standards should be measured in relation to the context and environment in which education is located." (O'Sullivan, 2006). ty.

The literature on the definition of education quality is quite massive and hold different and contradictory positions, which is not possible to summarise it here. What seems however, clear is that while it has become increasingly popular in the discourse of education, especially in the less industrialized countries, there is little consensus on what it means and a universal valid way of measuring it (Lowe and Instance, 1989; Smith, 1997). As already discussed, there are scholars who have described the quality of education in terms of the extent to which, and the manner in which aims and functions of education are achieved. Aims are the anticipated effects of learning and functions refer to what schools are expected to accomplish Vedder, 1994). The notion of quality is therefore relative. It changes over time and differs geographically due to variations of aims, functions and the means to realize them. In this regard, the quality of education is linked to people and how they perceive education (Rissom, 1992).

As a multi-faceted concept, most definitions highlight the different elements of the basic input-process-output model that commonly underpins education research and policy analysis (UNESCO, 2002). Here quality is associated with the view that efficiency in the school system refers to a ratio between inputs and outputs. In this regard, a more efficient system obtains more output for a given set of resource inputs, or achieves comparable levels of output for fewer inputs, other things being equal. The output of education refers to that portion of student growth or development that can be reasonably attributed to specific educational experiences (Lockheed and Hanushek, 1988; Stephens, 1997). Each of these aspects is turn made up of a number of variable elements.

In the analysis of indicators of educational quality, there are a number of internationally recognised indicators of quality that are highlighted in the substantial body of literature which attempts to determine the appropriate school quality *inputs* required to boost student achievement. For example, Torres (2003) highlighted the World Bank's reliance on nine indicators of quality in primary education. In her review priority indicators, according to the World Bank were in the following order: (1) libraries; (2) instructional time; (3) homework; (4) textbooks; (5) teacher subject knowledge; (6) teacher experience; (7) laboratories; (8) teacher salaries; and (9) class size. It is generally perceived that school improvement focused on *input* and *process* quality measures, especially on the learning end is likely in principle to have the effect of improving output quality, namely; student achievement since students are able to better master the curricular content that is mandated for each grade (N'tchougan-Sonou, 2001).

The World Bank tends to equate quality with efficiency in attaining school outputs. It utilises school achievement (cognitive achievement of pupils or efficiency of output compared to inputs to measure quality (Psacharopoulos, 1981;

Heynemann and Loxley, 1983). Its position on the strong relationship between students' cognitive achievement and the provision of inputs features highly in its sponsored study by Lockheed and Verspoor, *Improving Primary Education in Developing Countries*, in which it is stressed that "the achieving of the correct mix of inputs will bring about the desired outputs" (Lockheed and Verspoor, 1991). It identified five major in-school areas for improving the quality of education. These included: improving curriculum, increasing learning materials; increasing instructional time; improving teaching; and increasing the capacity of students. In general terms research on inputs has focused on materials such as textbooks, desks, blackboards as well as teachers and students.

The outputs include proxies of achievement (promotion and completion rates) as well as measures of actual achievement which include the kinds and quantity of facts and skills learned. The *output* characteristics of quality education is therefore the quality of student achievement and it is the amount and degree or perfection of learning according to the various levels of intellectual achievement, from recall to application and creative innovation. A minimum level of quality is a full functional literacy and a good mastery of basic mathematical operations including the capacity to apply them to simple everyday problems (Bergmann, 1996). In the World Bank's study on *Education in Sub-Saharan Africa* (World Bank 1988), it is noted that when an attempt is made to measure output as a direct indicator of quality, the most common approach is to concentrate on the scores of cognitive achievement. It is emphasized that such an approach makes sense to the extent that enhancing cognitive achievement is prominent among educational goals and contributes centrally to a student's ultimate productivity. Citing results of tests carried out by the International Association for the Evaluation of Educational Achievement (IEA), it was concluded that the quality of education in Sub-Saharan Africa is well below world standards. One explanation for this low quality was that expenditure per student, a highly aggregated proxy for educational inputs, was very low by world standards. Per student expenditure in African education was not only low but was declining. The combination of essentially constant budgets since 1980 and rapidly expanding enrolments had made the financing of education's recurrent costs ever more difficult (World Bank 1988).

In the *process factors*, emphasis is placed upon the experience and the complex process that interact in the daily delivery of education. The extent to which inputs can improve quality is directly related to the extent to which teachers effectively use them to improve the teaching and learning process. The process quality is therefore, the quality of the teacher-pupil interaction in the teaching-learning process. It means the use of teaching approaches suited to the given situation such that pupils' opportunities to learn are optimized. Normally, if classroom conditions permit, it means pupil-centred methods of instruction, a full mastery of the lesson content by the teacher, a calm and 'orderly' learning environment, and availability of the basic materials needed for pupil activities and exercises. It also means error-free and relevant teaching content as much as the absence of fear among pupils. The quality of the teaching and learning process depends on the quality of the curriculum, of its contents, methods and manner of implementation. The quality of curriculum implementation depends in turn on the teaching and learning materials, the working conditions, and the pedagogical skills of the teachers, the total instructional time, and on the importance assigned to quality by the key stakeholders. These factors depend, to a large extent on the control exercised by the school and the parents themselves (Bergmann, 1996).

In terms of *input-process-output* measures of quality, it is generally believed that intervening at the school and classroom levels as being crucial in raising the quality of primary education in Sub-Saharan Africa as ultimately educational quality is obtained through pedagogical processes in the classroom where knowledge, skills, dispositions are acquired (Anderson, 2002; Verspoor, 2003). Therefore, managing the quality of classroom interaction is seen as the single most important factor in improving the quality of teaching and learning, particularly in contexts where learning resources and teacher training are limited. (Anderson, 2002; O'Sullivan, 2004).

In addition, sex differences in school enrolment often emerge during teenage years, suggesting that school quality,

particularly those aspects affecting retention, may also have a gender dimension. In which case, it is not only critical to identify what school factors affect enrolment and retention more generally, it is also important to determine which ones matter more for girls and which ones matter more for boys. This is because boys and girls may have different experiences in the same school as a result of differences in curricular opportunities within the school; differences in treatment by individual teachers; and differences in rules, regulations and administrative practices. Furthermore, even if the school environment is the same for both boys and girls, gender differences in school outcomes could occur if particular aspects of that environment have a differential impact on the retention of boys and girls (Lloyd et al. 2000).

The function of good quality education

Although the concept of quality education is still contentious, it is clear from a lot of research that good quality education facilitates the acquisition of knowledge, skills and attitudes that have intrinsic value and also help addressing important human goals. Evidence is now clear-cut on the links between good education and a wide range of economic and social development benefits. Better school outcomes as reflected in student scores are related to higher income in later life. Empirical work has also demonstrated that high quality schooling improves national economic potential. There are also strong and significant social benefits. It is now believed that the acquisition of literacy and numeracy, especially by women, has an impact upon fertility. More recently, it has become clear that cognitive skills required to make choices about HIV and AIDS risk and behaviour are strongly related to levels of education. Among the identified key functions include the following, among others.

Part of the returns to school quality come through continuation in school. Consequently, students who do better in school, as evidenced by either examination grades or scores on standardized achievement tests tend to go further in school or university. In this regard, higher student achievement keeps students in school longer, which leads, among other things, to higher completion rates at all levels of schooling.

Using simple measures of basic cognitive skills, the studies show that such skills are separately important in determining earnings, apart from the effect of schooling attained. Although there is still data paucity, which suggests the need for caution in interpreting the results due to other extraneous factors, there is some strong evidence associated with increase in test scores suggesting a substantial return to higher levels of cognitive skills and the probability of higher levels of school quality (Glewwe, 2002).

Quality education is perceived to have a strong impact on a country's development goals. It is generally believed that formal schooling is one of the key contributors to individual skills as well as human capital. Although there are other factors which play a similar role, schools have a special place, not only because education and skill creation are among their prime explicit objectives, but also because they are the factors most directly affected by public policies. It is also well established that the distribution of personal incomes in society is strongly related to the amount of education people have had. In general terms, more schooling means higher lifetime incomes. These outcomes emerge over a long term. It is not people's income while at school that is affected, nor their income in their first job, but their income over the course of their working life (UNESCO, 2004).

Quality education is also perceived to have an impact on a country's economic growth. The relationship between measured labour force quality and economic growth is said to even a much stronger influence than the impact of human capital and school quality on individual productivity and incomes. Economic growth determines how much improvement can occur in the overall standard of living of a society. More specifically, a more educated society may translate into higher rates of innovation, higher overall productivity through firms' ability to introduce new and better production methods, and a faster introduction of new technologies.

Summary conclusions

Quality education is a relative concept. Educators who seek particular defined outcomes tend to rate it in those terms and will rank educational institutions according to the extent to which their graduates meet those outcomes. These different emphases have deep roots and are reflected in the major traditions of the development Western educational thought. In studies of quality and equality issues in education in third world countries, it is pointed out that there is as yet no consensus on the definition of the term "quality". More importantly, notions of quality change over time and are tied to societal values. Another important point that has been raised relates to the relative paucity of meaningful data that could provide indicators of quality.

Although the concept of quality education is still contentious, it is clear from a lot of research that good quality education facilitates the acquisition of knowledge, skills and attitudes that have intrinsic value and also help addressing important human goals. Evidence is now clear-cut on the links between good education and a wide range of economic and social development benefits. Better school outcomes as reflected in student scores are related to higher income in later life. Empirical work has also demonstrated that high quality schooling improves national economic potential. There are also strong and significant social benefits. It is now believed that the acquisition of literacy and numeracy, especially by women, has an impact upon fertility. More recently, it has become clear that cognitive skills required to make choices about HIV and AIDS risk and behaviour are strongly related to levels of education. Among the identified key functions include the following, among others.

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