UNIT 1: CONCEPTIONS OF CURRICULUM

Meaning and Scope

The organization of schooling and further education has long been associated with the idea of a curriculum. But what actually is curriculum, and how might it be conceptualized?

The term curriculum has been defined in many different ways. Some people see curriculum as:

1. A set of things which children and youth must do and experience by ways of developing abilities to do things and make up affairs of adult life; and to be in all respect of what adults should be (Bobbit, 1918).
2. It has been used to describe
   - All the experiences a child has under the guidance of a school.
   - All the courses or subjects which the school offers.
   - The systematic arrangement of subject matter activities within a course offered by a school (integrated science and/or social studies for example). (Oliver, 1960):
3. All the means of instruction used by the school to provide opportunities for students learning experience leading to desired learning outcome (Krug, 1957).
4. A plan for learning … (Taba, 1962).
5. All learning opportunities provided by the school (Saylor & Alexander, 1966).
   - A series of intended learning outcomes, the things that the curriculum prescribes, the results of instruction but does not prescribe the means to be used to achieve the result (Johnson, 1967).
   - Is a programme of the school with
     i. Attention to the elements of programme of studies
     ii. Programme of experiences
     iii. Programme of services
     iv. Hidden curriculum (Oliver, 1977)
   - That reconstruction of knowledge and experience systematically developed under the auspices of the school to enable the learner to increase his/her control of knowledge and experience (Tanner & Tanner, 1980).
   - All the teaching-learning experiences guided and directed by the school (Harnack, 1968).
   - The formal and informal content and process by which learners gain knowledge and understanding, develop skills, and alter attitudes, appreciation and values under the auspices of the school (Doll, 1978).

- All the experiences that individual learners have in the process of the education whose purpose is to achieve broad goals and related specific objectives which is planned in terms of a framework of theory and research or past and present professional practice (Hass, 1980).
- It is a plan or programme for all experiences, which the learner encounters under the direction of the school (Oliva, 1982).

Curriculum includes activities which are academic and non-academic, vocational, emotional and recreational. A complete description of curriculum has at least three components:

- What is studied (content or subject matter)
- How the study and teaching are done (method)
- When the various subjects are presented: the order of instruction (Oliver, 1960).

The above definitions can be classified into four conceptions of the curriculum:
That is, the curriculum as:

- A Product
- A Programme
- Intended learning
- Experiences of the learners.

Curriculum as a product

The curriculum as product conception is heavily dependent on the setting of behavioural objectives. The rationale for defining curriculum as a product has to do with the consideration of a document/booklet/brochure available in the school that may be shown to a visitor as a document that embodies what the students have to learn at that situation. Such a document may include a list of courses, syllabus for various courses, a list of skills and objectives, titles of textbooks and other materials. With this conception of the curriculum, education is most often perceived as a technical exercise where objectives are set, a plan drawn up, then applied, and the outcomes (products) measured. A familiar, and more restricted, example of this approach can be found in many training programmes, where particular tasks or jobs have been analyzed - broken down into their component elements - and lists of competencies drawn up. In other words, the curriculum was not to be the result of 'armchair speculation' but the product of systematic study.

Advantages of curriculum as a product

- It allows us to think at that term in concrete and definite way.
- It provides the direction for curriculum planning and development by specifying the purposes of the school curriculum
- It tries to simplify the term ‘curriculum' and makes it easy for the layman to understand.

Disadvantages of curriculum as a product

- It limits the idea of curriculum to specific courses of study as prescribed in a document.
- Teachers teach students according to the pattern of examination questions.
- It presumes that the document can describe all the possible course of events in the school.

Curriculum as a programme

Curriculum as a programme, implies that the course of events in schools should be used as means in the school to carry out the purposes of the school. This definition has two perspectives, the narrow and the broader perspective.

The narrow perspective considers the curriculum as a programme which comprises courses of study offered by the school including both core and elective. Those who define the curriculum in this way might also refer to individual students' curriculum, which means the courses being taken by that individual student. The broader meaning refers to all aspects of the school in which learning takes place. This includes learning taking place during societies and clubs activities, sporting activities and activities in the halls of residence. Curriculum as a programme could therefore be perceived to be "contextual".

Advantages

- The curriculum can easily be described in concrete terms (the narrow perspective)
- It is recognized that learning takes place in many different settings in the school. This latter idea may also lead to a careful analysis of what students learn in different settings other than courses of study.

Disadvantages

- It limits the scope of curriculum to specific programmes of study as prescribed in the document (i.e the narrow conception).

- It implies that what is contained in the curriculum plan for the various school programmes describes what students actually learn, but we have no reason to believe that this is really so. Students don't really learn the entire syllabus.

Curriculum as intended learning

The schools of thought, that define curriculum this way, are thinking about what is to be learnt. The supporters of this definition claim that what is to be learnt should be considered separately from how it is to be learnt. They suggested that the curriculum does not include the consideration of why something is to be learnt. Also, they think that when educational planning occurs the curriculum always precedes how it is to be learnt. According to this definition curriculum refers to content or knowledge, skills, attitudes, and behaviour that students are supposed to learn in school. The conception actually refers to a plan for action in school.

Advantages

- Here curriculum becomes a concept or idea rather than a product. It is flexible.
- It puts curriculum into a more manageable focus by limiting its scope.

Disadvantage

One major disadvantage is, its insistence that the "what" and "how" of learning can and ought to be separated. This view may lead to fragmented planning and may further lead to incomprehensive view of learning.

Curriculum as the experiences of the learner (process)

The rationale of the definition stems from the notion that what is planned is not always what actually happens. In this sense the course of actual events or the curriculum can only be found in the learning that students take away from various experiences. Those who support this definition would argue that the three definitions discussed are in fact curriculum plans. They presume that any description of curriculum would require an after - the - fact analysis of students' learning experiences. In this sense curriculum is not a physical thing, but rather the interaction of teachers, students and knowledge. In other words, curriculum is what actually happens in the classroom and what people do to prepare and evaluate. What we have in this model is a number of elements in constant interaction. the two major things that set this apart from the model for informal education are first, the context in which the process occurs

('particular schooling situations'); and second, the fact that teachers enter the classroom or any other formal educational setting with a more fully worked-through idea of what is about to happen.

Advantages

- It is learner centered.
- It focuses on all the experiences of the learner both planned and unplanned.

Disadvantages

- This definition makes curriculum abstract and complex
- It makes the curriculum of the school so comprehensive that it cannot be easily described in simple terms.

The definitions range from school centered to learner centered i.e, curriculum as a product to curriculum as the experiences of the learner.

Characteristics of a good definition of curriculum

There are so many conceptions of the curriculum because different professionals offer different definitions of the term, depending on the context within which they operate. It is important to note however that, a good definition of curriculum should help us identify the key characteristics of curriculum. Some of these characteristics include the following:

1. The curriculum comprises the educational experiences of schools i.e. a school-based phenomenon
2. The curriculum is a plan for action
3. The curriculum provides guidance to learners in their educational endeavours
4. The curriculum permits individual learners to engage in self-instruction
5. The curriculum is carried out both inside and outside the school
6. Within the school setup, the curriculum largely takes place in groups
7. It is formal or informal; written or not written.
8. It is not solely teacher determined. The teacher is not the sole source of information
9. It includes other unplanned activities which are educative

Curriculum perspectives

Curriculum perspectives may be perceived as theories of knowledge which are an important source of curriculum decisions. They are the philosophical underpinnings of the school curriculum. It is generally believed that what goes into the curriculum depends heavily on these perspectives (Zewii as cited in Gatawa, 1990). There are a number of curriculum perspectives. Four of these perspectives that have been considered in our discussion are as follows:

Rationalism

The rationalist has the following views about knowledge:

- that true knowledge is achieved by the mind and
- that knowledge is a series of revelations

Empiricism

The empiricist also believes that:

- true knowledge is derived from evidence
- authentic knowledge comes through the senses

Pragmatism

The pragmatist believes that:

- knowledge is hypothetical and changing constantly
- knowledge is experienced
- knowledge cannot be imposed on the learner
- knowledge is a personal activity
- knowledge is socially constructed

Existentialism

The existentialist or phenomenologist believes that:

- knowledge is personal and subjective
- knowledge is one's own unique perception of one's world
- education should be less formal
- curricula should be diverse, not common for all.

These perspectives have their own perceptions of the learner, the teacher, methodology and the school curriculum in general. Such perceptions have been summarized as follows:

Perspective	*Learner*	**Teacher**	*Method*	*Curriculum*
Rationalist	Recipient of information	Source of ideas, facts and information	Drilling lecturing subject based	Subject matter of symbol and idea
Empiricist	Recipient of information	Demonstrator of process	Lecturing Teacher-centred	Subject matter of physical world
Pragmatist	Experiences knowledge	Researcher project director	Inquiry participatory Problem-based	Problem-solving hypothetical subject to change problems projects
Existentialist	Ultimate chooser, search for personal identity	Facilitator of choices	Inquiry Discovery	Subject matter of choices Not rigid

Types of curriculum

In an attempt to help clarify the concept curriculum, certain terminologies have gained currency -the following:

I. The Hidden Curriculum

According to Kelly (1989), the hidden curriculum includes those activities that pupils undergo either consciously or unconsciously. They include those things which pupils learn at school because of the way in which the work of the school is planned and organized but which are not in themselves overtly included in the planning or even in the consciousness of those responsible for the school arrangements. The hidden curriculum consists of the subtle, often unintended things that are learned by pupils as they go about life in the schools.

II. The Official Curriculum

The official curriculum usually takes the form of national public statements of goals and intents, the legal and administrative framework of the school system, official calendars and time allocations, the syllabus and related descriptions of prescribed content, official list of

recommended books, the content and style of final and intermediate examinations. We may also under this term, consider official policies concerning building, furniture and equipment of schools, contents of national radio and television, educational programmes and the official syllabuses for teacher training. In essence, the prescribed programme of studies and other aspects of school life, which are usually documented. According to Goodlad (1984) it is the subject matter, skills and values that policy makers expect to be taught. It also represents the publicly announced expectations the school or training institutions has for its learners.

III. The Actual Curriculum

The actual curriculum, according to Hawes (1979), describes what actually takes place in class by way of learning experiences of the pupils/students because of the real circumstances on the ground. In other words, the actual curriculum refers to practical or real learning in the school which is produced as a result of the official curriculum, mediated by practical conditions in the particular environment of a specific classroom. For example, a teacher who has great difficulty with his/her mathematics may decide to repeat lessons in the few topics he/she has mastered all the year round and keep intimidating the bright students who dare to ask provoking or challenging questions in class.

IV. **Formal Curriculum**:

The formal curriculum has to do with activities for which the time-table of the school allocates specific periods of teaching time, or which as in the case of the primary schools, are included in the programme of work to be covered in normal school hours (Kelly, 1989).

V. The Informal Curriculum

The informal curriculum concerns those activities that go on, usually on voluntary basis, more often than not, after school hours, on weekends and or during holidays. This may take the form of sports, clubs and society meetings, school journeys, dinning sections and the like (Kelly, 1989). In the view of Adentwi (2005) when such activities are perceived as additions to the academic curricula or course work, they are termed extra curricula. On the other hand, when they are viewed as having important contributions to make to the personalities of learners by themselves and not merely as extra, they are termed co-curricula

VI. Supported Curriculum

This refers to the school curriculum as reflected in and shaped by resources allocated to support and deliver it. Examples of resources to support the curriculum include:

- time allocated to a subject (classroom time, time for practical activities)
- personnel allocations
- teaching and learning resources, etc.

Question: What is your view on the argument that the JSS/JHS curriculum was/is not supported?

VII. Test Curriculum

This is the set of learnings that is assessed in teacher – made classroom tests and national examinations. We may also consider it as that aspect of the school curriculum that is examined. It is important to note here that usually, not everything that is stated in the written curriculum ends up being examined by either the teacher or external examination bodies. The problem however is over time teachers end up teaching only those aspects of the curriculum that are frequently examined.

VIII. Compensatory curriculum

This is the type of curriculum designed to help solve a defect of an educational programme or process. E.g. PGDE Sandwich programmes, top up for Cert A teachers, Evening classes for adults, etc.

Elements of the school curriculum

The school curriculum has four key elements that are in constant interaction. These elements are:

1. Purpose
2. Content or subject matter
3. Methods or learning experiences
4. Evaluation

Purpose

The purpose of a curriculum:

- Is based on the social aspirations of society
- Outlines the goals and aims of the programme and
- Is expressed as goals and objectives

There are three categories of goals and objectives:

- Cognitive, referring to intellectual tasks
- Psychomotor, referring to muscular skills and
- Affective, referring to feeling and emotions

Content or Subject Matter

The content of the curriculum:

- Is divided into bodies of knowledge, for example, economics, mathematics, geography, etc
- Outlines the desired attitudes and values
- Includes cherished skills
- Is determined by prevailing theories of knowledge and considerations

NB: the curriculum content must be applicable to the solution of the problems affecting the society which uses it

Methods or Learning Experiences

The methods outlined in a curriculum

- deal with teaching and learning experiences and
- involve organizational strategies

NB: Teacher flexibility in the use of a variety of methods of teaching facilitates learning on the part of students.

Evaluation

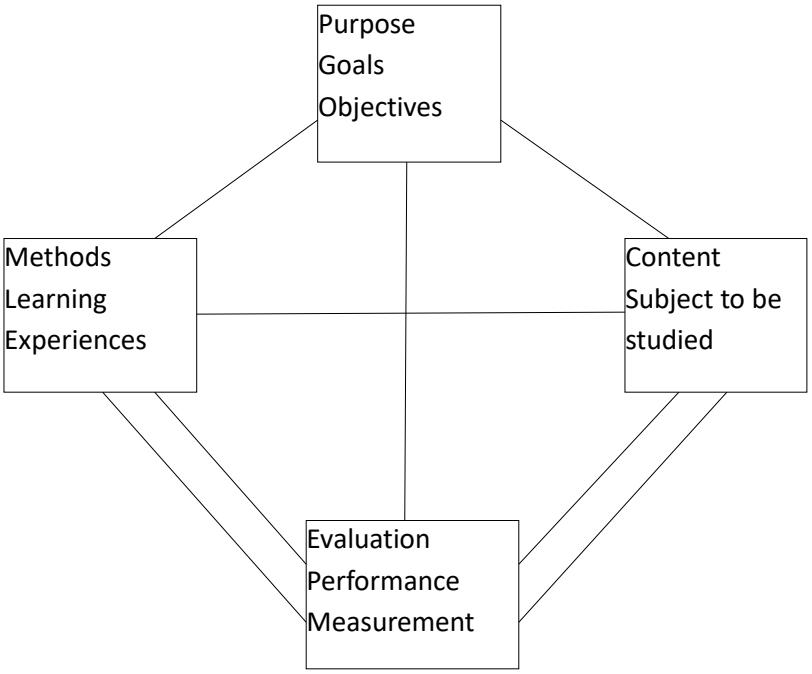
Evaluation is used to:

- select appropriate content based on the aims and objectives of the curriculum;
- select appropriate methods to address the content and purpose;
- check the effectiveness of methods and learning experiences used;

- check on the suitability and appropriateness of the curriculum in answering social needs;
- give feedback to planners, learners, teachers, industry and society; and
- provide a rationale for making changes

NB: In the evaluation process, judgment must be made regarding: inputs, means, content, outputs and outcomes of the whole learning process.

The elements of the curriculum may be summarized in a diagram as follows:



It is the interaction of these elements in the social, political, economic, technological and environmental context that constitutes a curriculum.

UNIT 2: MODELS OF THE RELATIONSHIP BETWEEN CURRICULUM AND INSTRUCTION

The attempt to clarify the meaning of curriculum also calls for the need to distinguish between curriculum and instruction and their relationship to each other. This is one of the controversial issues in the curriculum field, which have yet not been completely resolved. Different writers have different perspectives about the relationship between curriculum and instruction. For Tanner and Tanner (1980), **the distinction between curriculum and instruction is artificial and mechanistic and only serves to destroy the natural synthesis that exists in the curriculum and instruction process.** They argue that the attempt to separate curriculum from instruction only serves to introduce an "ends-means dualism" into a process, which must necessarily be regarded as continuous. In other words those who distinguish between curriculum and instruction tend to view curriculum simplistically as the production of plans into operation. The curriculum then becomes "what is to be taught, i.e., the means by which the educational ends would be achieved.

In the view of Dewey and also Tanner and Tanner, this distinction is unfortunate. According to Dewey, ‘end controls the process of thinking'. If this is so, then any thinking about the processes of the curriculum must be controlled by whatever ends are established. Consequently, end and means must be established. Consequently, end and means must be regarded as a continuous and inseparable process. As Tanner and Tanner (1980) put it, **‘To conceive of ends and means as separate or discontinuous is to separate artificially functions that are organically interdependent. There is no point in shooting without a target to shoot at, nor is there any sense in devising targets without conceiving of the act of hitting the targets'.**

On the other hand, other writers (Johnson, 1967; Oliva 1992) maintain that for conceptual clarity, curriculum and instruction need to be separately defined. **Johnson restricts the meaning of curriculum to the targets, ends, or outcomes of the educational process. Thus he defines curriculum as ‘a structured series of intended learning outcomes'** implying thereby that since the curriculum constitutes a guide for instruction, it anticipates the results of instruction. On the other hand, he maintains that instruction refers to all the other activities, materials or even the instructional content and methods that are used to achieve the ends or outcomes of the educational process.

Zais (1976) observes that Johnson's views about the distinction between curriculum and instruction raises both theoretical and practical difficulties. He is of the opinion that it is simply

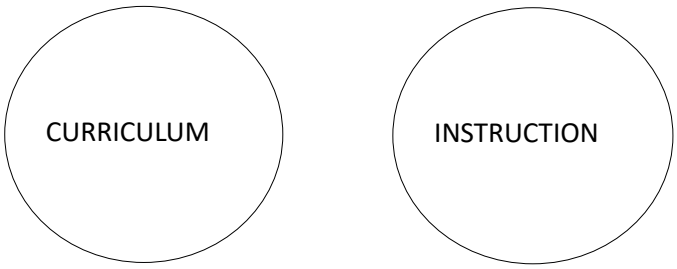
not possible to divorce outcomes from the means used to achieve them' and that if curriculum specialists limit themselves only to the formulation of structured lists of intended learning outcomes, they will be neglecting the most important processes that have traditionally been included in curriculum work (for example, the selection of learning experiences and content and devising strategies to evaluate instructional outcomes).

Oliver (1992) on his part distinguishes between curriculum and instruction by explaining that in the course of planning for curriculum and instruction, two different kinds of decisions are made. He maintains that decisions about the curriculum relate to plans or programs and thus are programmatic. On the other hand, decisions about instruction (and thereby implementation) are methodological.

Oliver indeed, views both curriculum and instruction as subsystems of the educational or schooling process and explains that they are mutually interdependent. He explains the complex relationships that exist between curriculum and instruction by sketching out the following diagrams. They represent different viewpoints about how curriculum is related to instruction.

Dualistic model

Those who view the curriculum and instruction relationship in dualistic terms treat them as separate or independent processes that never meet anywhere. In this case what the actual and enacted curriculum is differs significantly from the official or prescribed curriculum. Curriculum planners do not consult nor involve teachers in curriculum decision making. On the other hand, teachers do not see the need to be bound by any curriculum plans or frameworks which they had no hand in producing. Discussions and decisions on the curriculum do not take cognizance of implications for classroom practice. Thus a lot of problems of implementation are created in the process. Change taking place in the curriculum are not based on data gathered through observations of actual classroom practice (s). The dualistic model is as follows:

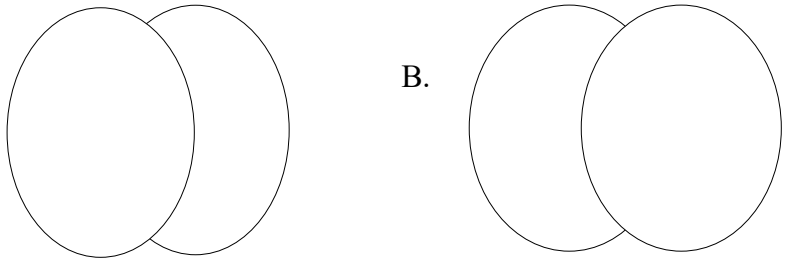


(The Dualistic Model)

Interlocking model

Unlike the dualistic model, the interlocking model visualizes curriculum and instruction as two subsystems, though there is a common ground of intersection between them, representing the area of mutual co-operation. There are two versions of this model as depicted below. No particular significance is given to the position of curriculum or instruction in either of the versions. The important thing is that both curriculum designers and instructors or teachers recognize the inter-relatedness of the two processes, which form the basis of co-operation between them.

A. B.

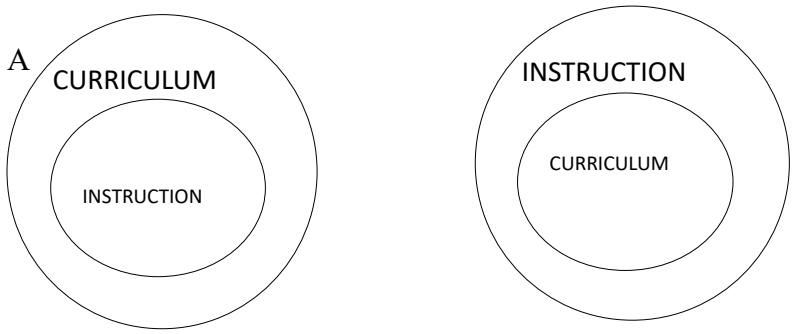


Curriculum Instruction Instruction Curriculum

(The Interlocking Model)

Concentric model

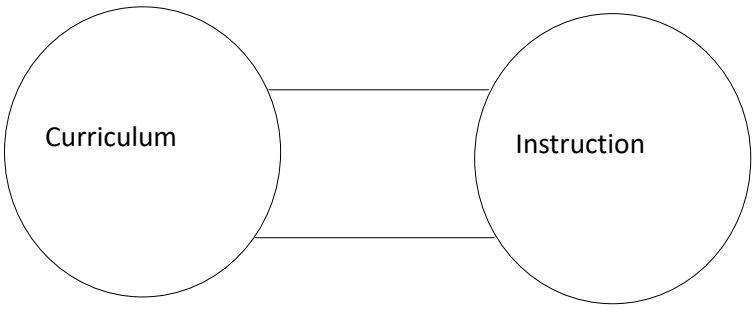
The concentric model of curriculum and instruction depicts mutual interdependence between the two processes. There is recognition that curriculum and instruction deal with different activities which are essential for realizing educational objectives. The problem, however, is that it is difficult to determine which of the two processes is primary or predominant. Curriculum designers tend to view their work as more important than instruction and therefore predominant to it. On the other hand, instructors also see teaching as the more important activity since there can be no effective learning without teaching. This thinking gives rise to two separate versions of the concentric model as depicted in the diagram below. In diagram "A", instruction is subordinated to curriculum. On the other hand, in diagram "B" the opposite situation is implied. A clear hierarchical relationship comes through in both versions of the model, which might mean that the two actors - curriculum designers and instructors may be locked up in antagonism and conflict with disastrous consequences for learners.



(Concentric Model)

Circular model

The circular model of curriculum and instruction relationship stresses the fact that curriculum and instruction are two separate subsystems that are linked up by constant use of feedback and feed forward mechanisms. This model implies that instructional decisions are made after curricula decisions, which in turn are modified after instructional decisions have been implemented and evaluated. The use of feedback and feed forward mechanisms thus ensures continuous adaptations and improvements of both entities. Again, the circular nature of the model stresses the need for co-operation and openness between curriculum experts and instructors for the sake of effective implementation. The circular model is depicted as follows:



(The Circular Model)

Clearly, distinctions can be made concerning activities/processes that can be referred to as curricular and other activities that are instructional. Also, curriculum and instruction may be conceptualized as a contiguous and naturally synthesized process. However, as tools for planning educational experiences and activities, the present writer supports the view advanced by Oliva (1992) that curriculum should be viewed as dealing with programmatic decisions whereas instruction restricted to methodological decisions. This is because such an approach will make for conceptual clarity and practical effectiveness. Notwithstanding, it is also important to recognize the problems that a dualistic conception of curriculum and instruction

will pose for effective practice in terms of cooperation between curriculum designers and classroom teachers.

It is the view of some writers, including Oliva (1992) Eisner (1994) and Marsh and Willis (1995) that since curriculum and instruction both have the common purpose of ensuring effective teaching and learning, the distinctions between them should not be stressed.

UNIT 3: PATTERNS OF CURRICULUM ORGANISATION

The patterns of curriculum organization may be explained as the manner in which the key components of the school curriculum such as the educational aims, content, learning experiences, methods of instruction, spaces, teaching and learning resources and available instructional time are put together in order to emphasize and achieve various sets of educational ends. It is imperative for every teacher to be familiar with the pattern of design of the curriculum he/she would be working with. This is because it helps to identify

- the subject matter to be used,
- learning experiences to be set up,
- classroom procedures to be employed,
- assessment and evaluation procedures to be utilized etc.

Again, issues such as the scope, breadth, depth and sequence of content and learning experiences under a given curriculum can be dealt with more effectively if one is clear about the basic pattern of organization or design of a given curriculum. For the purpose of our discussion, we shall discuss the subject curriculum, the experience curriculum, the integrated curriculum and the core curriculum.

The Subject Curriculum

This is the oldest and probably still the most widely used form of curriculum organization. Historically, this pattern of curriculum organization takes its root from the seven liberal arts of the Greco-Roman period. These were made up of two parts; the *trivium*, and the *quadrivium*. The trivium comprised language-related subjects - grammar, rhetoric and dialectic (logic). The quadrivium also consisted of arithmetic, geometry, astronomy and music. It was indeed this simple arrangement of subjects meant for the education of nobles, which eventually became compartmentalized into the many different subjects of today. This pattern of curriculum organization is based on the notion that knowledge is useful for its own sake and that the first duty of the school is to provide a standard programme of intellectual training in the fundamental disciplines. The content and skills to be mastered are divided up into distinct areas called subjects. Each subject has its own logical order, and teaching and learning takes place according to a definite sequence decided on by content specialists.

Even within a subject, sub-divisions usually appear and the result is excessive compartmentalization and atomization of knowledge. While these sub-divisions might be

justified at university level, at the secondary level they are likely to confuse and hinder rather than assist students in their attempts to learn.

The role of the teacher under this pattern of curriculum is to act as a storehouse of essential and well processed information leading his/her students to gain deep insights into various subjects to be taught. The teacher is thus perceived by all other stakeholders of education to be an erudite scholar to whom all questions on the particular subject should be referred for answers. Learners are perceived to be tabula rasa. The most often employed methods of instruction are the expository methods such as the lecture, drills, rhymes and recitation.

Advantages

1. It gives room for experts and specialists to be developed and therefore brings about innovation.
2. The specialization that goes with subject-based teaching enhances the career development opportunities of both teachers and learners.
3. The teachers are able to express themselves better before students. This builds the confidence of students in the teacher and encourages them to learn better.
4. It helps in providing learners (the younger generation) with the essentials of cultural heritage.
5. Evaluation under the subject curriculum is more easy and understandable.

Disadvantages

1. It leads to over compartmentalization and artificialisation of knowledge. (Knowledge is not natural.
2. Where subjects are taught without reference to other subject, the teacher hardly gets the total picture of what is happening exactly in his own field. This could lead to narrow mindedness both on the part of teachers and learners
3. It neglects the needs, interest, purposes and activities of learners.
4. The learning that is provided under the subject design often turns out to be very theoretical and learners are not equipped to intelligently manage the practical problems of everyday living.
5. It leads to rote memorization of facts and information without proper understanding
6. It violates the psychological criteria of organizing and presenting content by placing undue emphasis on the logical presentation of subject matter.

The Experience/ Activity Curriculum

According to Tanner and Tanner (2007), "the impetus for the activity curriculum grew out of the new knowledge concerning child growth and development in recognition that children require active engagement and socialization for effective learning" (p. 267). This pattern of curriculum organization, unlike the subject curriculum, places premium on child-centered learning. It traces its beginnings back to the "influence of humanistic thinkers such as Jean Jacques Rousseau, Friedrich Froebel, Johann Pestalozzi and Maria Montessori". Its recent development has also been greatly influenced by "the ideas of Abraham Maslow, Carl Rogers and John Dewey" (Krause et al, 2003, p.171).

The theoretical underpinnings of the activity curriculum are directly in line with humanism, which "recognizes the uniqueness of human beings and the qualities of life that contribute to our humanity, in art, literature, music and all aspects of daily living" (Krause et al 2003, p. 172). Humanist ideas such as Maslow's theory of human motivation and the hierarchy of needs, and Carl Rogers' model of client-centered therapy and the concept of "freedom to learn", have constituted the very fabric of activity curriculum. Taba (1962), in support of the activity curriculum, asserts that:

> People learn only what they experience. Only that learning which is related to active purposes and is rooted in experiences translates itself into behaviour changes. Children learn best those things that are attached to solving actual problems that help them in meeting real needs or that connect with some active interest. Learning in its true sense is an active transaction (p. 401).

The following are some of the features of activity curriculum:

- the interests and purposes of children determine the educational programme. The content of the curriculum is centered on activities that are based on the "felt interests and felt needs of children" and not on "adult conceptions of what children should be interested in or what children need" (Smith et al, 1957 p. 271). Children are always engaged in some activities, hence it is the duty of the teacher to identify the persistent and most worthwhile interests, "that offer the most value to individual and social life and those that are pregnant with possibilities of leading to the development and growth of further interests" (ibid). The subject matter in this curriculum is a means of fulfilling the purposes and aspirations of the individual. There is no way individual interests are

stifled to make way for group interests. Every individual's interest must be catered for by the curriculum.

- common learnings result from the pursuance of common interests". The only way there could be common education is for learners to have similar interests. This is because the interests of the learner determine the content and structure of the curriculum. The absence of common interest makes it impossible to have common learning. On account of this "the activity curriculum may or may not have a common learning program" (Smith et al, 1957, p. 273). The other patterns of curriculum organization (i.e. the subject and the core curriculum) usually advocate for common learning; and the learner is forced to learn what has been designed for them as a group and not what each individual learner wishes to learn.

- there is preparation-but not strict planning in advance. Unlike the subject and the core curriculum in which everything is planned in advance, an activity curriculum cannot be pre-planned since child interests provide the starting point. "To predetermine the activities would be to assume that all groups of children would find these activities most in keeping with their interests". What can be done in advance is preparation, especially on the part of the teacher with regard to materials to be used as well as "keen insight into child growth and development and into group structures and dynamics". The preparations however, are not prescriptions of what the teacher and children must do, but possibilities that have been unearthed through investigations of areas in which children at certain ages may find fundamental interests.

Advantages of experience curriculum

1. it makes learners active participants in the learning process and therefore stimulates the development of critical thinking skills
2. learners develop interest in what they learn in school
3. learners are well equipped to deal with problem-solving skills through the use of the problem solving approach

Disadvantages of experience curriculum

1. It makes it difficult to impart certain knowledge, concepts and generalization (wisdom of the generations) to learners
2. Sometimes, it may not provide adequate opportunity for continuity in learning

3. Such a curriculum may not provide adequate preparation for effective participation in society in future.
4. It consumes more instructional time
5. It increases pressure on scarce educational resources
6. This approach makes too much demand on the expertise of the teacher in the classroom
7. It makes it difficult to employ standard evaluation procedures in school.

Integrated curriculum

Integration in the general sense has been defined by Microsoft Encarta (2007) as a combination of parts or objects that work together well. A thorough perusal of literature on curriculum integration gives a clear indication that there are many different ideas about what constitutes curriculum integration. This makes it very difficult to come up with a clear cut definition of the term. Besides, there are various forms of curriculum integration and as such, care must be taken in order not to describe a particular type in attempting to define the term. As Oliva (1992) puts it, subject matter could be organized into disciplines or integrated "either on a school-wide basis (as with the core curriculum) or on the classroom level (as with certain types of unit plans) without regard for disciplines" (p. 517). To him, "by integration, we mean the blending, fusion or unification of disciplines". Shoemaker (1989) also defines an integrated curriculum as

> ...education that is organized in such a way that it cuts across subject-matter lines, bringing together various aspects of the curriculum into meaningful association to focus upon broad areas of study. It views learning and teaching in a holistic way and reflects the real world, which is interactive (p. 5).

The theoretical underpinnings of integration in the school curriculum can be traced to the works of "three German Psychologists - Max Weithimer, Kurt Koffka and Wolfgang Kohler" (Chauhan, 1996, p. 168).These three men, according to Chauhan, being dissatisfied with the "atomistic" and "molecular" approach to the study of human behaviour, (which was predominant in the early parts of the 20th century), developed gestalt psychology, which was another approach to behaviour. This approach "vehemently criticized the bahaviouristic view that everything we see or think is put together of tiny pieces like those of a jigsaw puzzle, instead they advocated that we perceive and think of wholes" (Chauhan, 1976, p. 168). This is because human beings "learn, not by associating bits of experiences but by forming new Gestalts", through the perception of "new patterns" which are organized "into a meaningful whole in the total situation" (Chauhan, 1996 p. 169). This means that when we are faced with

a problem, the solution may come to us all of a sudden, through the utilization of bits and pieces of information which are brought together to form one meaningful whole.

According to Adentwi (2005), the essence of integration is that by interlinking similar or related content and learning experiences from different disciplines in explaining issues, describing phenomena and solving problems, the individual learner is exposed to a wider range of ideas and concepts that help to broaden his/her perspectives and outlook on issues. He further asserts that, through effective scheduling of subject matter from various disciplines and other methods, similar content and learning experiences are brought into close association with each other. Integration could occur within one subject (vertical integration) or across disciplines (horizontal integration).

Types of integrated curriculum

There are three main types of curriculum integration. These are multidisciplinary integration, interdisciplinary integration and transdisciplinary integration.

Multidisciplinary integration: with this kind of integration, original subjects of study retain their original identity, but are placed side by side to enhance teaching and learning in the classroom. Thus two or more subjects are brought into relationship with each other in an attempt to enhance the learner's understanding of issues, though the constituent subjects retain their identity and logical structure, and continue to be distinguishable. This approach may be referred to as "correlation of subjects" or "coordination of subjects". Here, subject matter is aligned such that what is learned in one discipline buttresses that which is learned in other disciplines. For example, the time table of the school could be organized such that history could be aligned with economics to teach students certain economic policies instituted by Ghana over time to help students understand the Ghanaian economy.

***Interdisciplinary integration*:** under interdisciplinary integration, disciplines do not retain their original identity, but are submerged in a new and broader field of study. This new field of study then becomes a distinct discourse with a new structural relationship and appropriate terminology as well as a distinct method of enquiry. It is an assemblage of ideas, concepts and thought systems derived from separate disciplines. The essence of an interdisciplinary curriculum is that it seeks to solve a problem or to find answers to issues in the world of practical application by resorting to knowledge derived from more than one discipline.

Features

- This approach to integration requires a team of teachers to effectively render it
- It is based on themes or topics, which serve as "integrating threads" linking various parts together
- It uses the unique contributions of the individual subjects to help learners to better understand the phenomenon being studied.
- It provides for self-instructional readings and the use of the project method of teaching
- It has a much more flexible time table arrangements and open space classrooms.

Transdisciplinary integration

According to Adentwi (2005), those who advocate for this approach to integration are of the view that the curriculum should be built upon broad learning experiences or pervasive social problems. On account of this, there are two forms of transdisciplinary integration:

- experience-centred
- problem-centred

Advantages of integrated curriculum

1. Learners have the opportunity to see knowledge as integrated whole; not compartmentalized pieces of artificial ideas having no connection with reality. This helps the learner to broaden his or her perspective.
2. This approach to curriculum does not encourage rote learning but emphasizes understanding.
3. It allows problems to be tackled holistically and therefore ensures a more comprehensive and complete solution of problems
4. It provides a collaborative mechanism for dealing with knotty problems that defy solution within the boundaries of the traditional subjects

Disadvantages of integrated curriculum

1. It compromises depth for breadth. Detailed and perspective knowledge about issues is usually sacrificed for generalizations that may offer little opportunity for active inquiry and learning. This could make learners shallow-minded
2. Resource constraint

3. It puts a more demanding role on teachers and school administrators

The Common Core Curriculum

According to Adentwi (2005), this type of curriculum organization provides a compulsory set of subjects for everybody, while at the same time allowing individual students to select subjects from elective areas. The compulsory subjects considered are made up of required knowledge and skills, which are considered to be so basic to the culture and civilization that they must necessarily be exposed all learners. Thus all learners are expected to reach some basic level of competence in such courses or subjects for effective participation in society. They are therefore sometimes considered as general education for all.

Under this pattern, makes separate arrangements for different categories of learners to meet their needs. Thus, those learners desiring to major in any of the common core courses are presented with the detailed knowledge in those courses they require as foundation for further studies in them. This creates the opportunity for specialists in various fields to be developed for the nation. However, those students who do not have a desire to pursue further studies in the core courses, or who are found to be weak in them are given a watered down version of the course to meet their needs and for them to be able to cope with those courses.

Advantages of common core curriculum

1. It provides a means for society to initiate its young ones into the culture by equipping them with the basic knowledge, skills, values and attitudes for effective participation in the culture.
2. It makes room for the development of special attitudes and talents
3. It ensures that those students who are not very much endowed to pursue pure academic studies at higher levels of education do not end up as frustrated drop outs of the school system.
4. In cases where common core courses are organized around real life problems, it makes it possible to discuss real life issues in the classroom. This equips learners to handle everyday life problems with a high level of intelligence.

Disadvantages of common core curriculum

1. In situations where there are too many core subjects, which are loaded heavily with topics, learners have very little time to devote more attention to their optional courses for a detailed study

2. Sometimes, students may neglect the study of the core subjects as much as they should because of the belief that core courses are less important relative to their elective courses

UNIT 4: MAJOR DETERMINANTS OF THE ECONOMICS CURRICULUM

The school curriculum does not operate in a vacuum. It operates in a social environment which tends to exert influence on its development and implementation. For that matter, it is argued that one could not import the curriculum of a different country and implement it "hook line and sinker" in another country. A few of the factors which influence the development and implementation of the economics curriculum may be listed as follows:

1. **The Nature of learners** – consider learners' attitude, aptitude, maturity, etc. as determinants of the curriculum
2. **Social determinants** - these include all societal considerations that influence the school curriculum. Such determinants include: philosophy of education, government policy, examination bodies, etc. (here give opportunity to students to come out with other social determinants that influence the development of the curriculum)
3. **Nature of Economics** – consider the key concepts in the subject, principles and generalisations. What is the nature of content? Does it require mathematical calculation, reading or laboratory work? All these considerations influence the curriculum

NB: You are to have an in-depth discussion with students on how these determinants influence the development of the senior high school economics curriculum

UNIT 5: CURRICULUM DEVELOPMENT

Curriculum development may also refer to the process of making modifications in the curriculum to make it better. The extent of modifications that take place in the curriculum determines what the change process will be called. Where the modifications are slight, in terms of changes in certain aspects of the curriculum, we call it an **innovation**. However, when the modifications are so radical that major portions of the programme are altered to best solve current challenges in education, we call it **curriculum reform**. The term curriculum development is also used to refer to the kind of development that occurs as the curriculum is implemented in the classroom.

Curriculum development has therefore been defined by Marsh and Willis (1995) as a collective and intentional process or activity directed at beneficial curriculum changes. For the purpose of our discussion, we can think of curriculum development as a continuous process, which is relevant to the situation where it takes place, and flexible, so that it can be adapted over time. Thus curriculum development describes all the ways in which a training or teaching organization plans and guides learning. This learning can take place in groups or with individual learners. It can take place inside or outside a classroom. It can take place in an institutional setting like a school, college or training centre, or in a village or a field. It is an activity which is central to the teaching and learning process (Rogers & Taylor 1998). From this description, it becomes obvious that curriculum development can take place in many settings, and may involve many people. Typically, curriculum development involves four main elements:

1. Identifying what learning is needed and deciding on the type of training you need to provide to meet these learning needs.
2. Planning the training carefully, so that learning is most likely to take place.
3. Delivering the training so that learning does take place.
4. Evaluating the training so that there is evidence that learning has taken place.

Approaches to Curriculum Development

In organizing these elements in the curriculum development process, experts employ four main approaches. These are the:

1. **procedural (technical productions)** approach, which focuses on the specific steps to employ in developing the curriculum;

2. **descriptive approach** which focuses on the actual activities curriculum developers engage in while developing the curriculum;
3. **conceptual approach**, which focuses on the elements of curriculum planning and their relationship; and
4. **critical approach**, which focuses on how the curriculum development process incorporates or omits the views of the marginalized or minority in society.

Curriculum Planning

Curriculum planning is a key part of the curriculum development process. Curriculum planning is a process in which participants at many level make decisions about what the purposes of learning ought to be, how those purposes might be carried out through Teaching-Learning situations and whether the purposes and means are both appropriate and effective. Curriculum Planning is undertaken at Various Levels, that is;

1. International Level
2. National Level
3. State/Regional Level
4. District Level
5. School Level
6. Teacher-team Level
7. Individual Teacher Level
8. Cooperative planning by Teacher and Students.

Curriculum Planning at the International level

At this level, curriculum development is generally inclined to be indirect because the aims of the curriculum cut across nations which also have their own general purposes of education. The curriculum programme becomes effective only when it is tailored to suit the purposes of education of the countries involved. For instance, international level of curriculum planning may occur through the United Nations Educational, Scientific and Cultural Organization (UNESCO). This international body provides opportunity for curriculum study, research, teaching and technical assistance to educators from the member states of the United Nations Organization (UNO). The UNESCO occasionally comes out with conventions which member countries are supposed to comply with and also provide funds for research into educational problems, which are geared towards providing quality education for all.

Curriculum at National Level

This level of curriculum planning occurs under the centralized system of curriculum development where curriculum development is undertaken by legally constituted agencies of the central government. Such agencies, like the Curriculum Research and Development Division (CRDD) in Ghana, plan the curriculum guidelines and frameworks and also produce the curriculum packages in the form of resources such as textbooks, syllabuses, teachers' handbooks, etc., which are disseminated throughout the entire school system for large scale use in the classrooms. Imagine that scholars from universities around the country all from some particular subject area such as economics are dissatisfied with the nature of secondary education in their subject area and want to do something about it. They come together and decide to develop and disseminate a recommended set of plans for teaching that particular subject. Some of the agencies that are likely to be co-opted in a typical development of curriculum in Ghana may include: the West African Examination Council (WAEC), the Ghana National Association of Teachers, subject specialists and curriculum experts from the universities, the National Accreditation board, the National Teacher Training Council, etc.

How a curriculum planning committee works may be spelt out as follows:

- They identify what they consider to be important subject matter; that is, they identify facts, concepts, principles and understandings which they believe ought to be taught.
- They decide on a sequence in which the subject matter ought to be taught. The sequence might be from specific to general or easy to difficult.
- They make recommendation for activities through which student might first learn the subject matter including experiments, discussions, and lectures. These are what we normally called learning experience.
- Besides, they list what they believe to be the best materials by studying their subject.
- Finally, they provide some possible tests that learners might take to check their progress. All of these are then put together in a set of Teaching-Learning Materials (TLMs) which are tested by a group of teachers and then disseminated to schools throughout the country. In this situation the groups of scholars have considered what should be taught in a particular subject area and have identified related activities, materials and measuring devices. This is one form of curriculum planning. In this case it is done at the national level.

Curriculum Planning at the State/Regional Level

This involves a group of educationists comprising teachers, principals, Headmasters, curriculum officers and others. They come together as a committee from a regional or state education department to recommend what ought to constitute the overall programme of elementary schools across the region or state. A series of meetings of the group over the course of a period of time culminate in the production of a booklet. This booklet is sent to all school districts as the recommended model for their elementary school curriculum. The booklet is a reflection of the deliberation of the group. For example, in such a booklet members of the committee may recommend that the elementary school should include three subgroups of learners, namely:

- Early childhood
- Middle childhood
- Late childhood

Each group is then described in terms of specific development, physical, social and cognitive characteristics. From each group a review is provided of how each of the region-wide goals for education ought to be approached. Included in the review are:

- What children should have already learnt in relation to each goal
- Varieties of activities that could be used to further develop the pupils toward the goals at each level.

In Ghana, there is not much curriculum development activity at the regional level because we practice a centralized educational system where most of the major decisions concerning our education are taken at the national level. Most attempts at influencing the national curriculum from the regional levels are channeled through subject associations such as the Ghana Association of Science Teachers (GAST), Ghana Association of Teachers of English (GATE), etc. Curriculum planning at this level is however very common in the USA and Canada where there are states and provinces.

Curriculum Planning at the District level

Curriculum planning at the district level in Ghana, usually takes the form of In-service Education Training (INSET) programmes organized to brief teachers about changes taking place in the curriculum and how best to handle such changes in classroom lessons. Subject association branches at the district level come together to identify certain specific challenges incipient in the curriculum in terms of content, methodology, teaching and learning resources,

etc., and draw the attention of regional and national level representatives to address these challenges with the national agency for curriculum development. The district level also serves as a point for the translocation of centrally planned curriculum materials received from the regional offices for dissemination into individual schools.

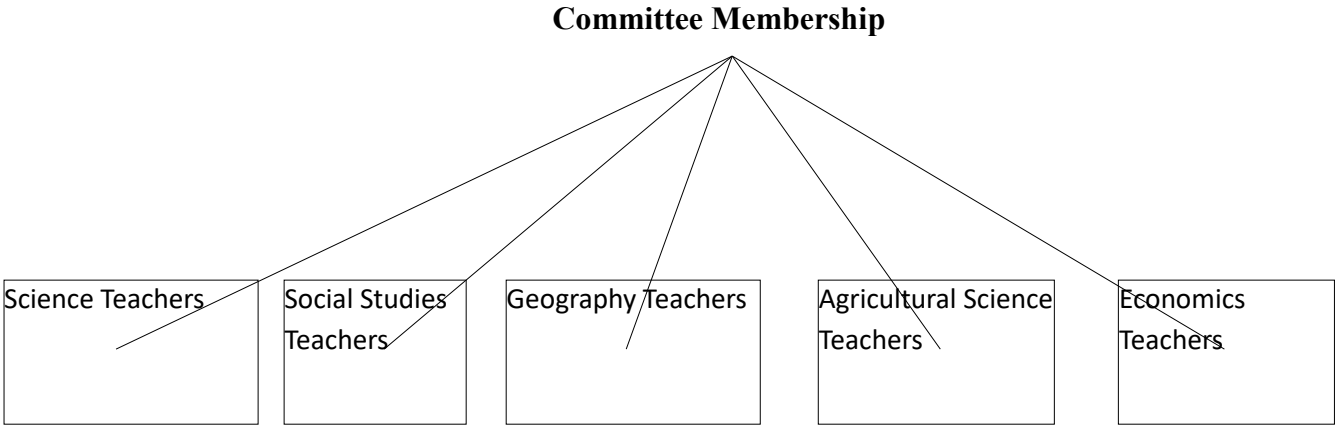
Curriculum planning at the School level

Traditionally, the role of the school in curriculum planning in Ghana is at the implementation level, where curriculum implementation is influenced by the internal and external characteristics of the school. Each school has its own philosophies and ideology, which more often than not, influence how curriculum resources are allocated in the school. Usually, the school head is responsible for ensuring that the activities of teachers and other administrative staff align with school ethos and structures, and more importantly, with the general purposes of the centrally planned curriculum. The school head conducts this kind of school-based supervision of the curriculum with the help of circuit supervisors and the heads of the various departments in the school. Again certain schools, in enacting the national curriculum, may introduce new ideas and ways of doing things, which may eventually become an integral part of their curriculum within its own jurisdiction. For example, in order to enforce religious and moral education among students, as stipulated by the national curriculum, certain schools may institute activities such as morning mass, public fora, etc. to ensure that the purpose of education is achieved. Such activities are planned by the school head, in collaboration with other teachers and the school administration and made compulsory for all students in the school.

Curriculum planning at the Teacher Team-Level

This level of planning concerns a group of teachers who come together to discuss the possibilities of carrying out a unit on e.g. population and family life that will involve all SHS students. Each of these teachers will represent a different subject area and all of them will agree to participate in the development and implementation of the unit. Before the meeting they have to think about how their area might contribute and share their thinking with the group. As a result of the discussion they will list areas and contributions to be developed.

(Population and family life)



Teachers team up and handle just one subject. They decide the activities the students should engage in. They also share ideas from their respective disciplines to facilitate teaching and learning. The approach could be interdisciplinary, multidisciplinary or trans-disciplinary.

Curriculum Planning by the Individual Teacher

This is the most little recognized in the practice of curriculum planning. It has to do with lesson planning at the individual teacher level, using the available syllabi and other curriculum materials as a guide. It involves the teacher sitting alone and thinking about possible learning activities that may be learnt during a few days or weeks. In this case the teacher is trying to make a decision about learning objectives, i.e., what he/she will like a group of students to learn. In terms of subject matter or content the teacher will have to make decisions about what important facts, principles, concepts and understanding to emphasize. The teacher must also learn to plan different activities and resources and how to measure how well learners have accomplished various objectives. At some time, the teacher has to search through journals looking for ideas about activities, gathering background information, updating his or her knowledge or consulting with other teachers. At the end, the teacher decides on long and short term objectives as well as the timing of various activities. The teacher must then develop a set of plans for use on a daily, weekly and longer basis. In designing this kind of plan, a number of items must be considered such as the characteristics of the learners, the sequencing of activities, the appropriateness of various learning materials and the availability of resources.

Co-operative Curriculum Planning at the Classroom Level

This is sometimes referred to as teacher-student planning. It involves the teacher and the students coming together to deal with how to handle a particular unit of instruction. For example, a teacher may initiate the discussion by informing the students that they will be studying how to set up a business enterprise. The students and the teacher will then decide on the type of activities to do. For instance; they may decide the activities to go through when setting up a business may involve:

- Gathering information about setting up a company
- Registering the company
- Deciding on the product, thus

i) The type of raw materials required
ii) Accessibility of raw material
iii) Financial outlay
iv) Advertising
v) Pricing and
vi) Distribution

Advantages of this style of planning

a. Students feel part of it (lesson planning) and become enthusiastic do more work than the teacher imposing on them.
b. There is practical learning since students suggest the activities to be learnt.
c. It takes cognizance of low achievers as their interests are likely to be catered for in the plan

Principles of Curriculum Planning

1. ***The first principle*** is that in the curriculum development process, there *are several different levels of different groups* involved in curriculum planning. Nowadays, most educationists agree that curriculum planning is not the sole responsibility or privilege of any group. In its broader sense, curriculum connotes a complex set of activities involving the cross fertilization of ideas from the curriculum field and other disciplines. However, the ultimate purpose of curriculum planning is concerned with the experiences of learners.

2. ***The second principle*** is that, curriculum development involves decision about both content and process. From the scenarios described one can also note that the various curriculum committees were not only concerned with what students ought to learn but also how they would learn it. Curriculum plans that define concepts or ideas without considering action are incomplete since learning must eventually involve doing. In the same way, plans that merely describe action without considering purposes are also incomplete, since learning activities run the risk of being aimless. This interrelationship of content and process increase the need to consider curriculum and instruction not as distinct entities but rather interdependent concepts in the planning process.
3. ***The third principle*** is that curriculum development is a comprehensive process which involves decisions about a variety of issues and topics that may be subject to curriculum planning. Such areas might include identifying broad purposes for a programme, identifying curriculum approaches that might be used in carrying out a programme, evaluation or deciding on the need for new programme (Oliver, 1960). In addition, curriculum planning focuses on the various approaches of teaching and learning. Curriculum planning focuses on the various components of teaching-learning including the selection and organization of themes and the identification of objectives, content activities, resources and measuring devices for teaching-learning situation. Moreover curriculum decisions about both regular programmes of the school and the hidden curriculum i.e. the institutional features of the school from which the students learn a great deal about themselves and their relationship with others.
4. ***The fourth principle*** is that curriculum development is a constantly on-going activity. Therefore curriculum development is a continuous process. Since society is dynamic, there must constantly be modifications in the curriculum to meet up with current trends so that it would be responsive to needs of society.

Models of Curriculum Development

A curriculum model is basically:

- a **description** of ideas or actions commonly used in the process of curriculum planning.
- a **prescription** of what ought to be in curriculum planning.

In the view of Oliva (1992), a model may be a tested or untested scheme. It may be a proposed solution to a piece of problem; an attempt at a solution to a specific problem; or a miniature version of a plan proposed for replication on a larger scale. The purpose of a model is to improve the quality of curriculum work by simplifying what actually happens in the real world to guide curriculum planning and development. There are a number of models in curriculum planning and development. For the purpose of our discussion, we shall look at four models of curriculum development, namely: Tyler's model, Wheeler's model, Skillbeck's model and Kerr's model.

Tyler's Model of Curriculum Development

The foundation of the curriculum theory development hinges on the work of Tyler (1949) who formulated a rationale for curriculum evaluation planning. According to him, the curriculum development process seeks to find answers to four key questions. These questions are:

- What educational purposes should the school seek to attain?
- What educational experiences can be provided that is likely to attain these purposes?
- How can these educational experiences be effectively organized?
- How can we determine whether these purposes are being attained?

According to Tyler (1949), answers to these questions, which are the basis of his framework for curriculum development, can be provided systematically, and that for one to be even more effective, the questions should be posed and answered in the sequence in which they appear. This is because answers to later questions logically presume answers to all prior questions. On account of this, his model is also known as "rational-linear".

The model may be summed up into a simple four-step process as follows:

STEP 1: SELECTION OF OBJECTIVES

Sources:

a. The learner
b. Contemporary life
c. Subject matter from specialists in psychology philosophy

Philosophical and psychological screens

STEP 2: SELECTION OF LEARNING EXPERIENCES
STEP 3: ORGANIZATION OF LEARNING EXPERIENCES
STEP 4: EVALUATION

Notable points on Tyler's model

- curriculum developers should be eclectic in their selection of objectives
- selected objectives should be filtered through philosophical and psychological screens to eliminate inconsistencies
- objectives should be very specific and devoid of vagueness
- learning experiences are all the interaction between the learner and the external conditions in his/her environment to which he/she can react (i.e. both theory and practice)
- learning experience should the effectively organized
- diverse criteria should be employed to evaluate to determine whether the desired learning outcomes have been realized on the part of the learners.
- Evaluation should be formative as well as summative

Tyler's rationale has probably been the most influential of the collection of curriculum planning theories. Other scholars such as Eisner and Herbert Kliebard acknowledge Tyler's contribution but criticize the rationale mainly for being too simplest and too limited.

Another scholar called J Schwaf pointed out that in describing the process of curriculum work, a model usually appears to involve a series of steps to be followed in a linear or sequential way e.g. in the case of Tyler's four questions, one might think that the questions have to be answered in the order in which they are written. However, in reality curriculum planning involves a complex set of ideas and elements that are so inter-related that decisions about one element influence the other and are derived from the others. Besides, curriculum planning could begin with a design of either the content to be mastered or activities relating to the particular course

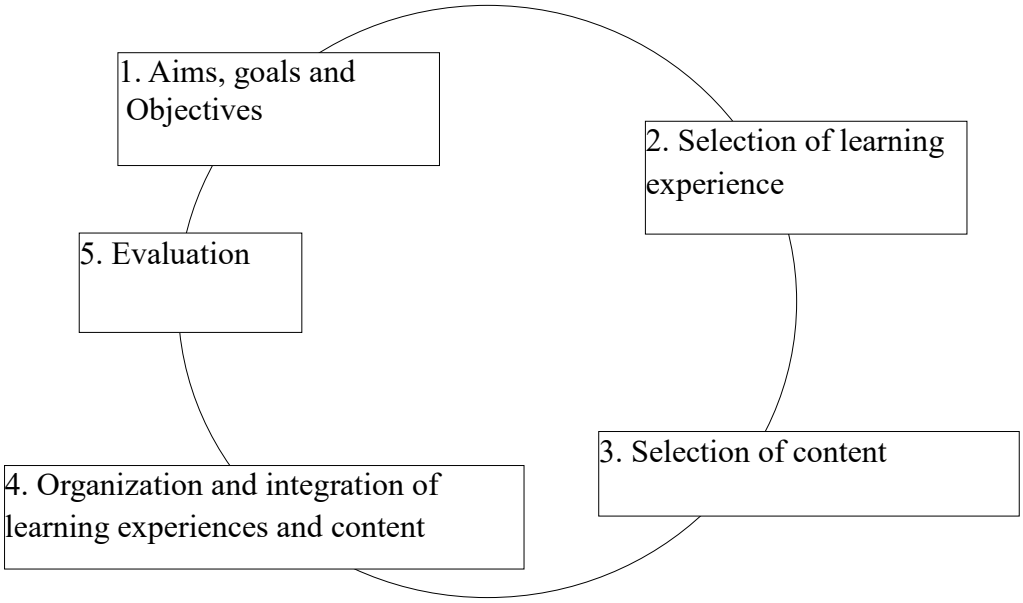
or unit under consideration. Therefore, it is unrealistic to propose a linear model proceeding from purpose to activities.

Criticism of Tyler's Model

1. It is too simplistic and mechanistic in that it represents the curriculum development process as a straightforward linear activity that begins with objectives and ends with evaluation,
2. It makes curriculum development static in that it leaves evaluation till the last stage. It has been convincingly argued by some scholars such as Kerr that evaluations should take place at every stage (at all times) because curriculum development is a continuous process (continuous).
3. Tyler treats content as an aspect of learning experience and thereby downplays its role
4. The model is based on an end-means approach for ensuring instructional efficiency and effectiveness. It therefore focuses more on the product, rather than on a flexible process that actively involves learners' instructional planning.
5. Tyler does not indicate adequately the interaction and inter-relatedness of the elements in that each element is considered in isolation except for the one succession or linkage.

Wheeler's Cyclic Model

Wheeler's model of curriculum development is an attempt to provide answers to the questions raised about Tyler's model. The basic assumptions upon "which this model rests is that the end of education is to change behaviour" and that education is everywhere the same. He therefore stresses the specification of behaviour by breaking down educational aims into specific objectives at the classroom level. The model from the foregoing is classified among the objective models because it starts with the selection of aims, goals and objectives. It consists of five phases which include: the selection of aims, goals and objectives; the selection of learning experiences; the selection of content; the organization and integration of learning experiences and content; and evaluation. According to Wheeler (1980) even though these phases may be discussed separately and considered sequentially with respect to time and operations involved, they are "related and inter dependent and combine to form a cyclical process so that over time the final phase affects the initial one" (p. 30). Pictorially, the model may be presented as follows:



Wheeler's model consists of five phases as follows:

Phase I: FORMULATION OF AIMS, GOALS & OBJECTIVES

On the issue of aims, goals and objectives, Wheeler identifies "ultimate goals", "mediate goals" and "proximate goals" from which specific objectives can be planned at the classroom level. According to Wheeler (1980), "ultimate goals are the expected end-products of education carried out overtime" (p. 32). From ultimate goals, mediate goals, which are the patterns of expected behaviour at given stages over the educational period, are carved out. Goals at this level are more in line with institutional goals. Out of the mediate goals, proximate goals are developed. Proximate goals are more in line with programme goals. Much more specific objectives can be designed from proximate goals at the classroom level. Thus:

- Ultimate goals - National goals
- Mediate goals - Institutional goals
- Proximate goals - course or programme goals

Phase II: SELECTION OF LEARNING EXPERIENCES

There should be selection of learning experiences and activities to determine the centres or focal point to be used for organizing the experiences so as to assist in the attainment of the objectives. This must take into account the nature of the learners and principles of learning. Wheeler explains learning experiences as the means of instilling or changing behaviour. In

order to achieve the goals set up in the first Phase of the model. Learning experiences should be selected based on the hierarchical nature of educational goals. The kind of learning experiences required to attain the ultimate goals may be different from that required for the realization of mediate as well as proximate goals. Wheeler also takes cognizance of the fact that, based on the different categories of Taxonomy of Educational Objectives, learning experiences come in different forms because "a ‘physical' experience is different from a ‘mental' one, and both differ from an ‘emotional' one, though all three may occur in the same person in rapid succession" (Wheeler 1980, p. 34). This buttresses the proposition that "certain behavours are produced by means of certain learning experiences".

Phase III: THE SELECTION OF CONTENT

This he perceives as a matter of "deciding what knowledge, concepts, principles, generalizations, theories, techniques and procedures in a particular subject" (Wheeler 1980, p. 38). He posits that the selection of content is "the principal concern of many curriculum-makers" and one very important thing to consider in selecting content is that, "it cannot be directly related to the general aims of education". Content is therefore "important only in so far as it helps to bring about intended outcomes". It should be used to facilitate the experiences of learners, especially, if its selection is "approached by way of behavioural objectives and experiences suitable to achieving them". This way of selecting content according to Wheeler, facilitates the recognition of important concepts such as "sequence, continuity and integration" in relation to learning experiences as well as to subject matter (ibid.). Finally, Wheeler (1980, p. 42) makes it clear that "content must be related to learning experiences and to organization and that all three must be carefully considered in relation to goals".

Phase IV: ORGANIZATION AND INTEGRATION OF LEARNING EXPERIENCES AND CONTENT

Wheeler believes that the selected learning experience and content should be organized in a sequential manner in order to "produce certain behaviours within the general areas of understandings, sensitivities, feelings, attitudes, values and skills" of the learner (Wheeler, 1980, p. 42). He further acknowledges the fact that the form of organization is dependent on the pattern of curriculum organization. That is, either subject, activity or core curriculum. He however believes that, "in the actual practice of schools, the only type of organization which is really pure is the subject curriculum", because the activity and core curricula do not lend themselves to complete organizational procedure over the entire school life. He also advocates

for the use of different organizational categories at the same time or at different stages of education. This phase of the model leads directly into the teaching-learning situation, hence it is based on such principles as proceeding from simple to complex and from part to whole. The use of these principles ensures that the organization and integration of learning experiences and content takes into consideration the nature of the learner.

Phase V: EVALUATION

The final phase of Wheeler's model is the evaluation phase. He explains evaluation as a process of arriving at conclusions about the success or failure of the educational enterprise by means of some measurement or assessment of change in behaviour. At this stage, the stated objectives of education as well as the means of attaining these objectives are all evaluated to ascertain their effectiveness. This helps to modify and restate existing objectives as well as to effect changes at the various phases of the curriculum process. Evaluation can therefore, eventually affect all the stages of the curriculum development process because Wheeler's model is cyclical.

Notable Points about Wheeler's model

1. It has five phases instead of four as in Tyler's
2. It has partially answered the criticism on the interaction and inter-relatedness of curriculum elements.
3. The cyclic character of Wheeler's model suggests that curriculum development is a continuous process. Each phase is a logical development from the preceding one and work in one phase cannot be attempted until work has been attempted in the preceding phase.
4. The model suggests that one could begin the curriculum development process at any point in the circle.
5. Wheeler requires the curriculum developer to work through a system of different levels of aims from the general to the specific
6. Wheeler differentiates between content and learning experiences
7. The first step on which all hinges is the statement of aims, goals and objectives.
8. Wheeler's model is still a linear model.

Wheeler's model is similar to Tyler's model in that they all begin the selection of aims, goals and objectives. Thus they are called objective models.

Merits of Wheeler's model

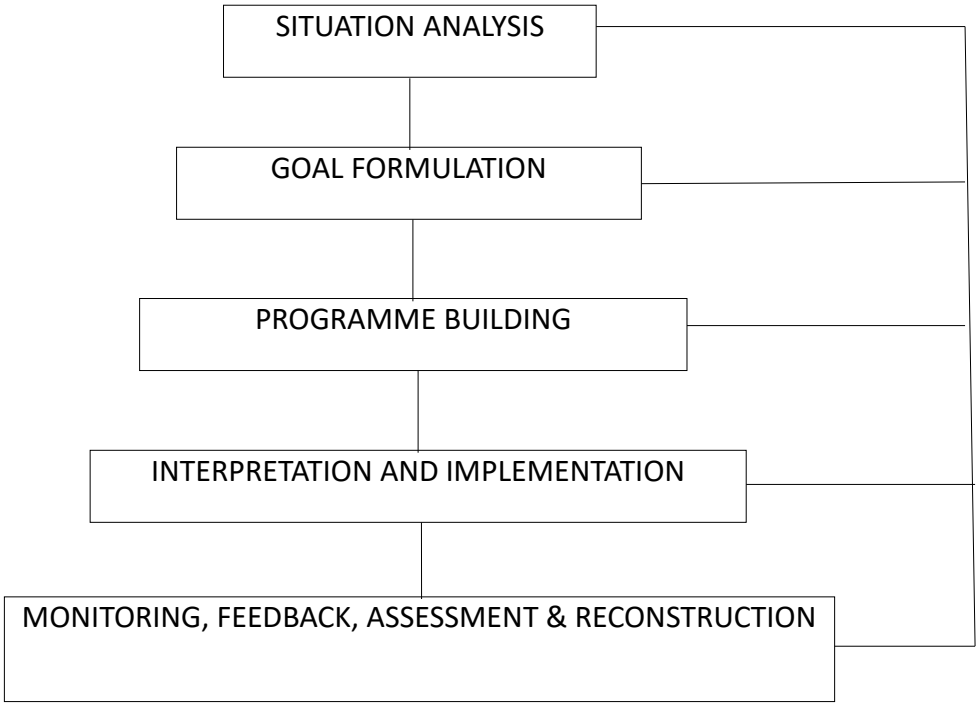
1. Unlike Tyler's model, which has been described as being too simplistic, Wheeler's model, to a very large extent allows for some degree of flexibility because of its cyclic nature.
2. Wheeler's model breaks down educational aims into specific classroom level objectives. Tyler's model only specified the sources from which objectives could be obtained as the learner, contemporary life outside the school and subject specialists.
3. Wheeler's model does not only draw a distinction between learning experiences and content, but also advocates for the organization and integration of learning experiences and content.
4. The pre-specification of objectives helps to select appropriate content, learning experiences and evaluation techniques.

Criticisms against Wheeler's model

1. It fails to recognize the role of needs assessment in the curriculum development process
2. The model is criticized for sticking to the ends - means orientation. The selection of aims, goals and objectives as a first step implies that teachers cannot take advantage of instructional opportunities unexpectedly occurring in the classroom
3. even though Wheeler tried to introduce some level of flexibility in his model by providing a cyclical arrangement of the curriculum phases, the elements are still arranged sequencially. Until one phase has been dealt with completely, we cannot move to the next phase. Smith and Lovat (2003, p. 117) have pointed out that "simply because an approach is provided in a cycle" does not transform it from "being linear and unidirectional: a circle is simply a line with the ends joined together"

Skilbeck's Model

This model introduces a Concept Called Situation Analysis. The model is made up of five phases namely: situation analysis; goal formulation; programme building; interpretation and implementation; and monitoring feedback, assessment and reconstruction.



Skilbeck begins with a situation analysis. This involves finding out the context in which the curriculum development process is to take place and the feasibility of its being successful. During situation analysis basic information is collected about:

- The educational system
- The learners
- The teachers

Goal formulation

This involves a statement of goals and embraces teachers and pupil's actions and the kinds of learning outcomes, which are anticipated. These goals imply preferences, values, judgment, priorities and emphasis.

Programme Building

This is where decisions are taken about programme design and implementations decisions. It involves:

1. The design of teaching-learning activities, which include content structure and methods.
2. Scope and sequence.

3. The design of appropriate instructional setting i.e. laboratories, workshops, fieldwork etc.
4. Personnel employment, deployment and role definition.
5. The timetable (when to adopt, implement etc).

Interpretation and Implementation

This is the stage where possible or anticipated challenges to effective implementation are identified and dealt with, e.g. clashes between the old and the new, resistance to change confusion etc.

Monitoring, Feedback, Assessment and Reconstruction

This is the stage of putting in place quality assurance to ensure the realization of programme goals.

1. This involves the design of monitoring programmes
2. Preparation and use of assessment instrument
3. Problems of continuous assessment, e.g. how many assessments should teachers undertake?
4. Reconstruction: this has to do with ensuring continuity in the process.

Differences between Skillbeck's and Other Models

Skillbeck's model differs from the other models of the curriculum development process model in two main ways:

1. It identifies learning situation and encourages curriculum developers to think educationally about the situation that is to be changed and not about how to implement a predesigned model of techniques of change.
2. It encourages curriculum developers to enter the model at whatever stage they see fit.
3. The model considers implementation as a key element in the curriculum development process. (i.e. it does not separate curriculum development from implementation)

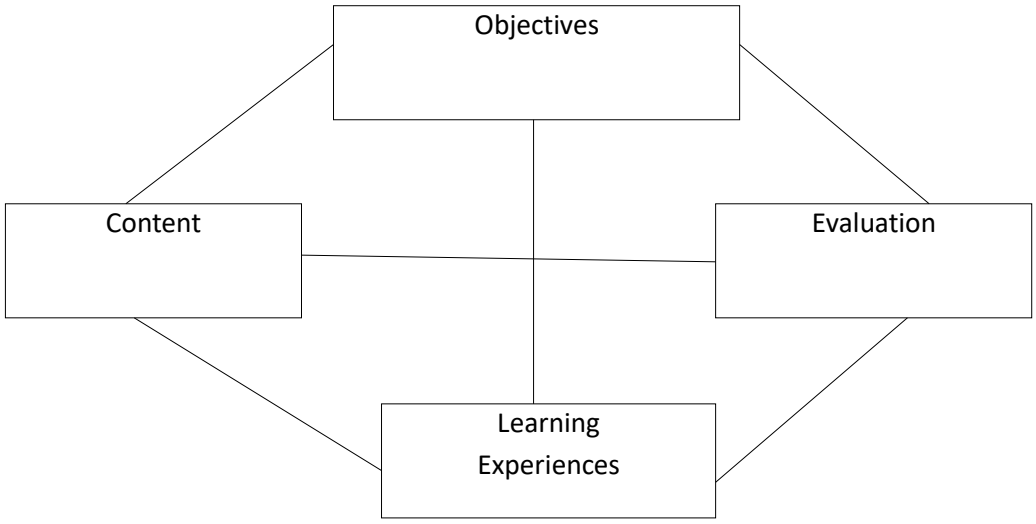
THE KERR'S MODEL

Kerr's model is similar to wheeler's model. In fact, the elements of wheeler's model have been compressed into four:

1. Objective
2. Content

3. Learning Experiences and
4. Evaluation

The model is presented diagrammatically as follows:



Also each element interacts with 3 other elements in the model i.e. every element is related to and influences every other elements. Kerr explains that: the practical experience of most teachers suggest that every one of these four elements is constantly modified by others and thus the whole weakness of curriculum development must be seen as one of constant interaction between elements. It is therefore a dynamic process.

In this model double-headed arrows have been used to suggest that not only can curriculum development proceed at any point in the circle, it can also proceed in any of the three directions. Evaluation is done not only on the objective but also on all the other elements. Kerr's model is based on and reflects what he thinks the curriculum is. According to him curriculum is: all the learning, which is planned and guided by the school whether it is carried out in groups or individuals or inside or outside the school. Kerr's model is a more realistic representation of the complex nature of the curriculum development process.

Modification of the Tylerian model now points to the fact that curriculum development is a cyclic process. What this means is that we now view events, phenomena and relationships in curriculum development as being dynamic, ongoing, ever changing and continuous without a beginning or end. It also means that an event or phenomenon is one point of the process.

Key points about Kerr's

- Curriculum objectives are derived from different sources - students, society and discipline/subject matter

- Curriculum objectives should cover all the domains - cognitive, affective and psychomotor
- Content should be selected and well organized - integrated, sequenced and reiterated
- Learning experiences should be comprehensive - should include societal opportunities, school community, pupil/teacher relationships, teaching methods, lesson content readiness, etc.

Criticisms of Kerr's Model

Tanner & Tanner criticize Kerr's model on the grounds that it does not show the basis from which decisions in each element are made although it shows that the elements are inter-related and interdependent. They argue that decisions on the selection of educational objectives, selection and organization of subject matter, organization of instructional methods and learning experiences and the utilization of systematic evaluation procedures should be philosophically based. According to Tanner and Tanner, philosophy not only serves to criticize aims and values but also serves as a source for developing aims and values.

UNIT 6: THE CURRICULUM DEVELOPMENT PROCESS

There are various approaches and various stages to the description of the curriculum development process. For the purpose of out discussion, we synthesize the four models of curriculum development to come out with six stages in the curriculum development process. These stages are:

1. Situation analysis (needs assessment)
2. Selections of aims, goals and objectives
3. Selections of learning experiences
4. Selections of content
5. Integration of learning experiences and content
6. Evaluation.

A. Situational Analysis

The first factor to consider in the curriculum development process is situational analysis. According to Salia-Bao (1987, p.88) "for any curriculum to be functional, it must be rooted in the culture and needs of the people concerned". This is because education does not occur in a

vacuum, but among people with different backgrounds. "Curriculum design", in the opinion of Bishop (1985, p. 132), "should begin, not with an abstract list of objectives, but with a realistic appraisal and analysis of the situation as it exists". Situational analysis or needs assessment (as it is called in other books) has been defined as "a critical study or examination of the society for which an educational proposal is being designed in order to identify the problems, needs and aspirations, resources available, and feasible solutions" (Adentwi, 2005, p.133). It is the process by which educational needs are defined and priorities set for further curriculum work. McNeil (1996, p.122) has defined need in curriculum as "a condition in which a discrepancy exists between an acceptable state of a learner achievement or attitude and an observed learner state". By identifying those needs not being met by the curriculum, the curriculum worker is provided with the "basis for revising the curriculum in such a way as to fulfill as many unmet needs as possible". Situation analysis is not a single one-time operation but a continuing and periodic activity (Oliva, 1992). This stems from the fact that curriculum planning is a process and situational analysis serves as a form of diagnostic evaluative procedure for improving educational practice.

According to Richardson (2008), "when you conduct a situational analysis, you will always find that there are more situations that need attention than you can possibly address within the constraints of the time available, money, and other resources". This is because many factors come into play when conducting a meaningful situational analysis. Bishop (1985) has adopted skillbeck's classification of these factors into internal factors and external factors. Some of the internal factors are the learner, the teacher, the existing curriculum and the institutional context. The external factors to be considered are the educational system, government policy, societal considerations, philosophy of education, psychology of learning and financial resources. A critical look at these factors would reveal that they fall under the major sources which Tyler (1949) designated as the sources of educational objectives. That is the learner, subject matter and contemporary society.

The Learner

The nature of the learners for whom the curriculum is being developed has a major impact on the kind of curriculum plan we end up producing. In conducting situational analysis, it is imperative to identify the needs and interests of the learners, their aptitudes, abilities, attitudes and values, as well as any factors that would have a deleterious effect on the curriculum, if left unattended to. For example, in selecting content, it is necessary to ascertain the previous

knowledge of the learner in order to select appropriate content and learning experiences. According to Ausubel (1968, p. 6), "the most important single factor influencing learning is what the learner already knows. Ascertain this and teach him accordingly". Besides this, many background variables (of the learner) affect the design or effectiveness of a curriculum. They include the intellectual, emotional and socio-cultural development of the learner, anxiety level, health status, aspirations, career plans and a host of other factors (Pratt, 1980).

The Nature of the Subject Matter

To begin with, "subject matter is the content of the curriculum, and choices about what subject matter to include within the curriculum are also choices about what to leave out" (Marsh & Willis, 2003 p.23). What would be studied in the school (subject matter) is a very important factor that should be carefully considered during the situational analysis stage of the curriculum planning process. One of the problems that necessitated the need for the educational reform in 1972 was that, "the curriculum of the old educational system was found to be too bookish" (Adentwi, 2005, p.135). Technical and vocational education had been so much neglected with the result that there was widespread unemployment among school leavers. Such information was very useful and thus necessitated the introduction of vocational and technical subjects in the new JSS / SSS programmes in 1987 implementation of the 1972 reform. The changing nature of society requires that subject matter be modified from time to time to meet the challenges of contemporary society. The subject matter must be considered with regard to its external characteristics. That is, "how accurately and how broadly the chosen subject matter represents the reality of the world beyond the student's immediate experience" (Marsh & Willis, 2003 p. 23). To them, "good subject matter should be rooted, in, and should accurately transmit, this greater reality" (Ibid). The choice of a good subject matter can only be made possible through a thorough situational analysis to identify strength and weaknesses of existing content of the curriculum. Apart from the external characteristics of the subject matter, the internal characteristics of the subject matter must also be considered. This has to do with the "logic inherent in how the chosen subject matter is arranged" (Ibid). The arrangement of a particular subject matter could influence the design of the curriculum, with regard to the choice of instructional methods as well as the system of accountability and evaluation to adopt. For example, the curriculum of technical subjects such as mathematics and physics is planned differently from reading subjects such as English and Social Studies.

The Teacher

The role of the teacher in curriculum planning and development cannot be over emphasized. According to Eisner (1994) it is "the teacher" who "will have a general guide of topics in a subject field, a sequence among topics, a general set of aims, textbooks, and other instructional resources", to effectively organize and plan the curriculum to suit that level and background of the learner in the classroom. He further posits, "a teacher might try to develop a calendar of topics and activities that extend throughout the year or the teacher might plan a week-to-week basis, without making any attempt to follow a specified timetable" (p.126-127). This kind of freedom in planning a school curriculum, allowed the teacher, could lead to the "null curriculum", that is, those things the school fails to teach. It is therefore very important to obtain a true assessment of the teacher during situational analysis. It is also important to find out whether there are enough trained teachers in the schools to carry out educational programmes. The failure of most educational programmes in Ghana has been attributed partly, to the dearth of trained teachers, especially, in the primary schools.

Importance of Situational Analysis

Situational analysis is important for the following reasons:

1. It ensures the placement of the school curriculum within the context of the society for which the educational programme is being designed. It takes cognizance of the fact that education does not take place in a vacuum. It occurs among people with all the psychological and social characteristics who live in societies, which are not the same. For education to prove useful therefore the special needs, interest and purposes of the people and the condition in the specific society in which they live must be thorough studied and the appropriate action taken to address them.
2. Situation analysis helps to formulate realistic educational, objectives, policies and programmes. It also helps to select, organize and integrate appropriate learning experiences and content as a means for realizing the objectives that have been formulated.
3. Situation analysis is necessary for effective evaluation of the curriculum. In this regard, the findings on a particular society which lead to the development of a particular educational programme can be compared with the outcomes of the educational

programme to determine whether the problems are being solved for needed correction or adjustment to be made.

4. Situation analysis ensures continuity in the curriculum development process. it serves as a formative evaluation tool for identifying weaknesses in an existing curriculum for improvement.

B. Determination and Formulation of Aims, Goals and Objectives

Curricular purposes or ends of education may be specified at different levels depending on the level of curriculum planning. Aims are the very broad or general statements of intent which are supposed to give direction to education in an entire country. Goals may refer to institutional level or general intents of a particular level of education, while objectives may be used to describe the ends of an instructional unit. The difference among the three terms is dependent on the level of specificity of educational purposes. Wheeler classified them into ultimate, mediate and proximate goals.

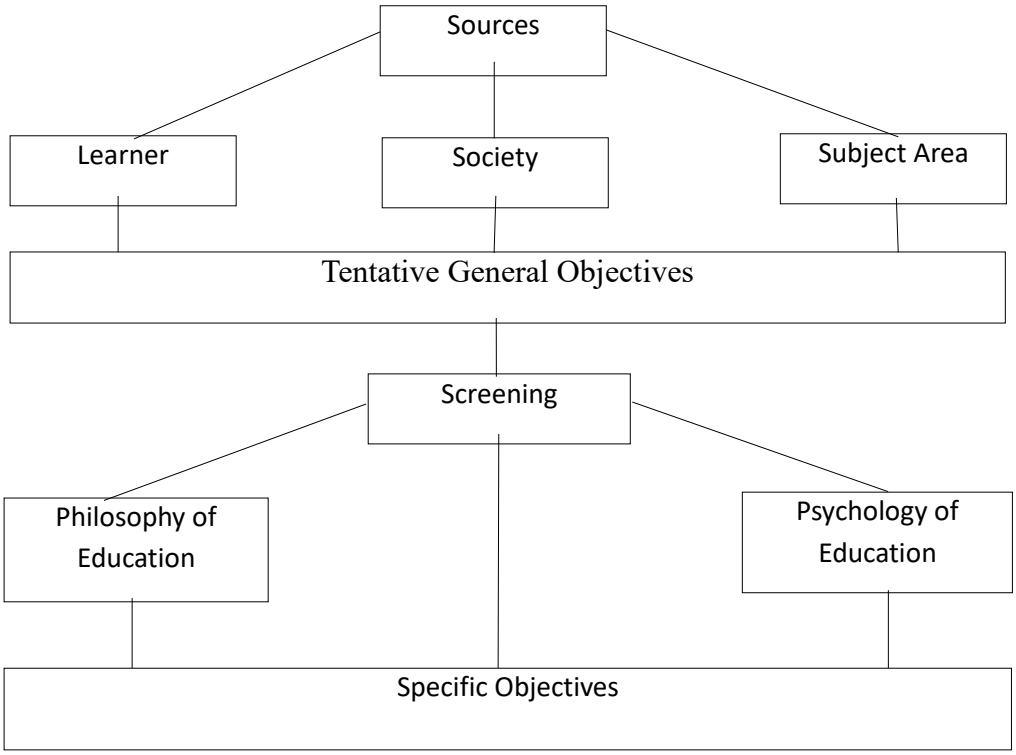
Functions of Educational Objectives

Educational objectives play a number of roles the curriculum development process. Key among these roles may include the following:

1. Objectives determine the direction that it is desired growth should take place in learners
2. Objectives provide the basis for the selection of content and learning experiences
3. Objectives influence the organization of content and learning experiences
4. Objectives provide a basis evaluation of the effectiveness of instruction and the progress of the other aspects of school life

Selection of Objectives

Tyler (1949) identified three main sources of educational objectives, namely; the learner, society and the subject area. His model of selection of educational objectives may be presented in the diagram as follows:



The Learner (Things to Consider)

- Needs of the learner/ of society
- Aspirations of the learner / of society
- Aptitudes of the learner
- Attitudes of the learner
- Entry behaviour of the learner (previous knowledge)
- Educational gap of the leaner.

Society (Things to Consider)

- Needs e.g. of the specific subject area.
- Aspirations e.g. economic growth, achieving income growth.
- Contemporary problems e.g. AIDs, corruption, insecurity etc.

Subject Area

Subject specialists determine what is supposed to be studied at a particular point in time, thus the specific content of the subject and the unique method of enquiry of that subject.

Screens: a process by which we separate the desirable from those that are not desirable. Two screening are philosophy and psychology of education. Through the philosophy we learn about the philosophy of the society for whom the curriculum is meant. We match the tentative objectives against the philosophy of the educational sector or the philosophy of the people.
Using the philosophy as a screen, what we get is still tentative objectives; therefore psychology of education will be used to further refine the objectives. This gives the specific objectives for the classroom.

Ways of Stating Instructional Objectives

Instructional objectives may be stated in *behavioural terms* and also as *expressive outcomes.* There is even a third variation which may be referred to as *problem-solving objectives.*

Behavioural objectives identify both the kind of behaviour to be developed in the learner and the content area of life in which this behaviour is to operate. They specify exactly what is expected of the learner. Every good behavioural objective may possess the following attributes:

1. It should mention the terminal behaviour expected of the learner,
2. It should indicate the conditions under which the behaviour is to occur
3. It should define the acceptable standard of performance

Based on these criteria for judging a good behavioural objective, it is expected that they must be SMART. Thus, Specific, measurable, achievable, realistic/result oriented, time framed.

Expressive Outcomes stem from the idea that teachers and curriculum developers should plan activities that have no explicit or precise objectives, but allow learners to explore, experiment and manipulate objects in their learning environment and to learn whatever can be learned in that experience. The main point of expressive outcomes is for the teacher to be sufficiently imaginative in the design of educational programmes so that a wide range of productive and educationally valuable outcomes will occur. The attributes of expressive outcomes may include the following:

1. It does not specify the final or terminal behaviour of the learner in an educational experience
2. It states a situation in which learners are to work
3. It states a problem, which the learners are to grapple with
4. It desists from specifying how the problem is to be resolved
5. It makes both teachers and learners discoverers of knowledge
6. It places emphasis on reflection, originality and meaning of outcomes

7. It generates outcomes, which are new to both the teacher and the learners.
8. It encourages divergent thinking
9. It does not require any fixed standard of evaluation

Examples of expressive outcomes;

- To critique the lecture method of teaching
- To take a trip to parliament house and give a vivid account of what they observed there
- To prepare lunch using rice, pepper, tomatoes and other vegetables.

The table below indicates scholars in education who are in favour of specificity of objectives and those who are not:

Specificity of Objective	**Against Specificity of Objective**
Pro-objective School	Contra objective School
Tyler	Stenhouse
Taba Hilda	Hirst Paul
Popham	Macdonald-Ross
Gronlund	Eisner
Mager	Peters

Eisner expresses his feeling against the use of specificity of objective and praises expressive outcome. Eisner thought that expressive outcome encourages creativity, reflective thinking and initiative. He explained that specificity of objectives stifles initiative, discourages creativity and makes human beings automaton.

C. Selection of Learning Experiences

According to Tyler, the learning experience is the interaction between the learner and the external conditions in the environment to which he/she can react. The external conditions here refer to anything that has the capacity to result in learning on the part of the learner. It include the teacher, classmates, textbook, teaching-learning materials, a physical environment, the psychological environment, and the social milieu. Learning experience is usually an activity that the learner undertakes, mostly, overtly. It is also mostly undertaken by the learner, though it may be carried out together with the teacher. It is also important to note that learning

experiences are goal directed (i.e. they are activities that are carried out in order to realize certain objectives)

Tyler has identified five principles that need to be considered when selecting learning experience. These principles are as follows:

1. For a given objective to be attained, it is essential that learning experiences (LE) are set up which give the opportunities for the learner to practice the type of behaviour implied by the objective. E.g. if the objective of the curriculum is to produce people who cook palatable dishes, then the learners should be provided the opportunities to practice the skills of cooking.
2. Learning experiences must be set up in such a way that the learner derives some satisfaction from carrying out the kind of behaviour implied by the objective. If the experiences are unsatisfactory or distasteful, the desired learning is not likely to take place.
3. The reactions on the part of the learner which are desired on the learning experiences should be within the range of possibilities or ability of the learner who is supposed to carry it out.
4. Learning experiences should be planned in such a way that many different experiences attain the same educational objective. This ensures that the teacher has many ways of planning and implementing a particular theme of work.
5. Learning experiences should be planned in such a way that a single learning experience can be used to realize several objectives.

Criteria for Selecting Learning Experience

1. **Validity**: A valid learning experience is one that is relevant to the attainment of the objective which it is set up to achieve. A valid learning experience is supposed to be closely connected to the educational goal or the expected behavioural change implied by the objective. A learning experience must therefore contribute towards the intended outcome by making direct provision for it. The relationship between the experience and the desired outcome is thus the central issue as far as the validity of the educational experience is concerned. Thus, for example, if responsible decision-making is what is being aimed at as an outcome of instructional process then, there should be ample opportunity for the learners to exercise their initiative in making decision and abide by

the result. The criterion of validity underscores the essential feature of learning experience as a goal directed phenomenon.

2. **Comprehensiveness**: This requires that every objective that is stated in the curriculum or a lesson plan should have a corresponding learning experience to help realize it. It also means that learning experience should be provided to cater for all the domains of learning in an instructional situation. Thus, it must cater for the cognitive, affective and psychomotor domains of learning. In this regard, general statement of aims should be worded in such a way that, they provide the platform for translating or operationalising them into more discrete and achievable learning outcomes which permit specific learning experiences to be set up. Comprehensive learning experience provides for the development of increasingly more effective ways of thinking, desirable habits and attitudinal values and interests.

3. **Variety**: Children learn at different rates and through different methods and strategies. Therefore the more varied the learning experiences presented, the more likely that the children will find satisfying activities which will motivate them to put in their best efforts. A wide variety of learning experiences enable learners of varying backgrounds to satisfy their needs, interests and purposes. It also provides learners with the opportunity to broaden their horizon. As a matter of fact, giving all manner of people enriching experiences should be one of the major tasks of the school.

4. **Suitability**: Learning experiences should be appropriate to the general level of development of the group and to the particular circumstance of the individual learners within the group. This means that the learning experience must take the needs, interest, purposes and capacities of individual learners into consideration. Also, learning experiences need to be selected according to principle of psychology of human learning and instruction. Teachers must have comprehensive knowledge of the background history of learners placed under their care so that they will be able to determine the appropriate learning experiences to present to them.

5. **Multiple learning**: Where feasible learning experience should be selected in such a way that one learning experience could be used to attain several objectives at the same

time. This criterion ensures that education is provided to learners in more economical way.

6. **Balance**: This means that equal weight should be placed on all sides on an issue with respect to curriculum decision making so that one aspect is not overemphasized at the expense of the other. There must be effective balance in providing experiences that are supposed to cater for the welfare and progress of society and those which are supposed to meet the growth and development needs of individual learners. Also, activities that relate to cognitive, affective and psychomotor domains.

7. **Continuity:** This refers to the fact that as learning is a continuous process and the learner is a functional organism, learning experiences must be presented in such a way that they may link up to or build upon previous learning experiences. Continuity ensures that the learner moves smoothly from one level of attainment to another in the lesson, subject area and in the entire curriculum. Course content and accompanying learning experiences must be structured in such a way that initial experiences at lower stages of education will serve as a foundation for further experiences. Again, since development is affected by all experiences and not only those that occur in the classroom, the curriculum must provide for continuity between what is taught in school and the work outside school.

8. **Relevance to life:** Learning experiences need to be organized and presented in such a way that learners realize their relevance to their everyday life circumstances and life after school.

D. Selection of Content

Content refers to the subject matter that learners should learn. Selecting content involves deciding what knowledge; concepts, principles, generalization, theories, techniques and procedures in a particular subject shall be used. In countries where there are well-established systems of external examinations, the selection of content by examination bodies outside the school determines what the learner does in school. The process of selection is guided almost invariably by importance, difficulty, and relevance with the organization or the field of study.

Criteria that Govern the Selection of Content

1. **Validity:** Content is said to be valid if it promotes the outcome it is intended to promote. If your objective is to produce teachers, your products should end up by being teachers. The validity of content demands that:
    i. There should be correlation between the content and the goals of the curriculum.
    ii. Content must be authentic. Authenticity of content refers to the extent to which subject matter is true. Facts may become obsolete, concepts and theories, which underlie organization and interpretation of the facts, may also become obsolete.

2. **Significance:** This relates to the importance of the material chosen. Content is said to be significant if it is widely, applicable and powerful in the sense that it provides the opportunity for the organization of discrete facts and helps to explain them, taking account of inter-relationships and can be used for prediction and the discovery of new knowledge. Significant content is that subject matter which is thought to be essential to the mastery of the discipline or field of study concerned.

3. **Utility:** With respect to the three categories of the behaviourial outcome ultimate, mediate and proximate. Utility ought to be considered in connection with general aims. Other things being equal, the subject matter selected must be most useful to the leaner in solving the problem now and in the future. A more general application of this criterion of utility is evident, especially, in vocational education. Certain vocation and training institutions require understanding and certain skills in connection with certain subject matter. Obviously, the selection of content for students hoping to proceed to these institutions or vocations is already determined. This therefore, should involve the use of enough items from a given subject to enable the student perform initially at a minimally acceptable level of competence.

4. **Learnability:** Learnability and difficulty are two sides of the same coin. They differ however. Difficulty is usually expressed in statistical terms by saying an item of content is suitable for say a nine year old child in basic four meaning that a certain proportion of the sample if tested can learn the item in a given time. From the teacher's point of view, learnability or difficulty is another individual matter. It is important to take into

consideration whether the target population, for whom the content is intended, can learn the content selected. Care must be taken so that the learner does not find the content too difficult or too easy. In either case motivation would be stifled.

5. **Relevance:** this implies that the content must be based on the everyday life experiences of the learner. A worthwhile or relevant content must arouse curiosity, strengthen initiative and set up desires and purposes that are sufficiently intense to motivate the learner to learn more. It must be linked to the everyday life of the learner.

6. **Sequence:** this refers to ordering or arranging content such that previous knowledge serves as a background to the new knowledge and the new knowledge builds upon the old one. Sequence ensures continuity in learning

7. **Scope:** content should be selected in such a way that learners have ample opportunity to use their mental powers and other faculties. It also means that the content should aid the learner to develop skills, attitudes and values that are considered desirable. It does not only refer to the variety of content area covered but also the depth to which each subject is to be taught.

8. **Feasibility:** this has to do with considering the relevant constraints and opportunities that may influence the implementation of the selected content. Some of the possible factors that influence feasibility of content may include, time, resource availability (i.e. both human resources and material resources), social-cultural milieu, etc.

E. Organization of content and learning experiences

Organization of content and learning experiences plays a critical role in the curriculum development process. The purpose of organizing learning experiences and content is to maximize their cumulative effect in helping the student attain the curriculum objectives. If each lesson or unit of instruction has little relation to those that went before or those that follow, what is learned is relatively superficial. Furthermore, the student needs to perceive the relation of what he or she is learning in one subject to his or her leaning in other subjects and to the situation outside the classroom, so that he or she can draw upon learning in the various subjects wherever they are appropriate rather than being restricted to narrow compartmentalization of his or her knowledge, skills and dispositions.

Organization involves identifying the basic concepts, skills, and values that can be arranged like threads throughout the fabric of the learning activities. These, according to Tyler (1949) are the organizing elements of the curriculum. For example, the fundamental concepts in economics are the concepts of scarcity, choice and opportunity cost, therefore, the content and learning experiences of the senior high school economics syllabus are organized around these key concepts to enable the student to meaningfully understand what he or she is taught in the classroom. Taba (1962) has identified three main criteria to guide the organization of content and learning experiences. These are establishing sequence, providing for cumulative learning and providing for integration.

Establishing Sequence

Sequence establishment in curriculum development involves putting the content and materials into some sort of order of succession. Three key questions that define the issue of sequencing are:

1. What should determine the order of succession of materials of instruction?
2. What follows what and why? and
3. What is the most propitious time to acquire certain learning? (Leonard, 1950).

Usually, where the curriculum is organized by subject, like the economics curriculum, the presumed logic of the subject, more often than not, determine the order of exposition. Smith, Stanley and Shores (1957) have identified four such typical sequences of exposition:

1. The first is that which proceeds from the simple to the complex. The simple is defined as that which contains few elements or subordinate parts and the complex as that which contains more elements. For example, from the analysis of a closed economy without government participation to an open economy with government participation.
2. The second is an expository order based upon prerequisite learnings. This principle is followed particularly in subjects consisting largely of laws and principles. For example, if students understand the fundamental criteria for judging economic policies, then they could conveniently analyze and critique government's economic policies
3. The third form of exposition is that which proceeds from the whole to the part and vice versa. For example from macroeconomic analysis to microeconomic analysis and vice versa
4. The fourth kind of exposition is chronological. Facts and ideas are arranged in a time sequence so that presentation of later events is preceded by discussion of earlier ones.

Other principles of sequencing include moving from the known to the unknown, concrete to abstract, near to far, etc.

Providing for Cumulative Learning

The problem of cumulative learning is to provide for a progressively more demanding performance: more complex materials to deal with, more exacting analysis, a greater depth and breadth of ideas to understand, to relate and to apply and a greater sophistication and subtlety of attitudes and sensitivities. This may involve either short-term or long-term sequences, depending on the nature of the task.

In the view of Taba (1962) cumulative progression of learning requires that curriculum experiences be planned so that there is an increasing complexity of material to deal with, accompanied by a requirement for increasingly more mature mental reactions. It is important to note however that this cumulative progression need not necessarily be tied with a shift in content. It is conceivable that the same content can be - and often is studied on two levels, one requiring a more mature understanding, more penetrating analysis and a deeper insight than the other. The cumulative progression does not depend exclusively on content but also on maturity of thought, levels of abstraction, or sensitivity of feeling. Planning a cumulative progression in learning involves planning learning experiences to create a movement from one level of difficulty or complexity to a higher one, from a more limited use of ideas to a greater breadth and from simpler concepts to increasingly more complex ones.

Providing for Integration

It is a generally recognized fact that learning is more effective when facts and principles from one field can be related to another, especially when applying this knowledge. This recognized role of integrated knowledge has led to a continued criticism of the fatal disconnectedness of subjects, of the fragmentation and compartmentalization of the curriculum, and of the minds that can bring nothing but a specialist's orientation to bear on problems too complex for such narrow orientation. It is thus imperative for content and learning experiences to be organized such that learners will be afforded the opportunity to relate both information and experiences together to enhance attainment of curriculum objectives.

Integration as a concept of curriculum organization may be perceived as either **horizontal** or **vertical**. Horizontal integration stresses the horizontal relationship of the various areas of

curriculum to each other, such as relating what is learned in mathematics to what is learned in economics. This kind of ideology underlies the unification of subjects in various forms of integration in the school curriculum. Vertical integration may refer to the logical arrangement of content and learning experiences such that a current level of understanding is dependent on a previous level of understanding in the same field of study. It may be likened to sequencing and cumulative learning.

F. Curriculum Evaluation

One of the key elements that keep the curriculum development process running and functioning is evaluation.Evaluation has been defined by Ornstein and Lasley (2000) as "a process in which we put a value on or assign worth to something. Its purpose is to make a judgment about the quality or worth of something – in this case, the school curriculum. The use of the term covers a great variety of meanings and describes many processes to the extent that it sometimes causes confusion.

The following are some of the notable points about curriculum evaluation:

- Various aspects of the school curriculum can be evaluated
- Evaluation can be carried out at different levels of curriculum planning
- Evaluation can be carried out by different categories of people in the education enterprise.
- Evaluation is itself considered as one of the elements of curriculum development
- Evaluation could be formative or summative

Types of Curriculum Evaluation

There are two main types of curriculum evaluation, namely:

- formative evaluation and
- summative evaluation

Formative evaluation is carried out during the process of curriculum implementation. The purpose is to give feedback as to whether the programme is on track so as to enable developers at all levels to make the necessary modifications to improve the curriculum. In the classroom setting, formative evaluation can be considered as the evaluation of instruction as the instructional period continues.

Summative evaluation is carried out when the curriculum has completed its full cycle and managers want to find out whether it was successful or not. In the classroom setting, it can be explained as the evaluation of instruction after the instructional period.

Why curriculum evaluation?

Curriculum evaluation aims to examine the impact of implemented curriculum on student (learning) achievement so that the official curriculum can be revised if necessary and to review teaching and learning processes in the classroom. Curriculum evaluation establishes:

- Specific strengths and weaknesses of a curriculum and its implementation;
- Critical information for strategic changes and policy decisions;
- Inputs needed for improved learning and teaching;
- Indicators for monitoring.

Who conducts curriculum evaluation?

Curriculum evaluation can be carried out by many actors in the education enterprise, and at all levels of curriculum development as well. For the purpose of our discussion, let us consider internal and external curriculum evaluation and the actors involved.

1. It may be an internal activity conducted by the various units within the education system for their own respective purposes. These units may include national Ministries of Education, regional education authorities, institutional supervision and reporting systems, departments of education, schools and communities.
2. It may also be an external or commissioned review processes. These may be undertaken regularly by special committees or task force on the curriculum, or they may be research-based studies on the state and effectiveness of various aspects of the curriculum and its implementation. Such research studies may be carried out by academics and non-governmental organizations that may have special interest in education. These processes might examine, for example, the effectiveness of curriculum content, existing pedagogies and instructional approaches, teacher training and textbooks and instructional materials.

Evaluation of students

Evaluation of student learning has always been a powerful influence on how and what teachers teach and is thus an important source of feedback on the appropriateness of curriculum aims,

content, learning experiences, organization, and even evaluation procedures.

Evaluation of students' learning could be summative or formative, and there are various types of evaluation tools, whose selection are based on:

- The purpose of the evaluation
- The level of the evaluation
- Who is doing the evaluation
- The aspect of the curriculum being evaluated, etc.

Types of Evaluation Tools/measures

Fulfilling the diverse objectives of diagnosis, certification and accountability requires different kinds of assessment tools. A variety of tools can be used to conduct curriculum evaluation, including the following:

1. **Observation:** this is the act of recognizing and noting facts or occurrences. For example, rather than asking teachers to describe their own practices in the teaching and learning interaction in the classroom, the curriculum evaluator could arrange to observe the teacher as he/she teaches in the classroom. Teachers could also observe learners to collect relevant information for instructional decisions. Observation could be structured or unstructured, participant or non - participant observation.
2. **Interviews:** this is a conversation carried out with the intent of obtaining certain information for making decision about the curriculum. This evaluation tool could be used at all the levels of curriculum planning. Various stakeholders of education such as curriculum experts, school heads, subject associations, parents, teachers, learners, etc. could all be interviewed to provide vital information to affect curriculum planning. Interview could be structured or unstructured
3. **Tests:** this is an administered set of questions to an individual or group of individuals to obtain a score. Tests constitute one of the many types of assessment information that teachers use in class. It is one of the most frequently used measures for obtaining information for curricular decision making, especially, at the micro level of curriculum planning. There are various forms of tests employed by teachers in the classroom to evaluate the curriculum. Some of these tests include: essay tests, multiple choice tests, fill-in tests, matching tests, etc.
4. **Questionnaires:** these are instruments that present information to a respondent in writing or through the use of pictures and then require a written response - a check,

a circle, a word, a sentence, or several sentences. Such tools can be used at all levels of curriculum planning, but is only restricted to people who can read and write. In the Ghanaian context for instance, where illiteracy rate is high, curriculum evaluators face challenges using questionnaires to source information from parents and learners at low levels of education. Items on a questionnaire could be open-ended or close-

UNIT 7: CURRICULUM IMPLEMENTATION

Curriculum implementation as explained by Lewy (1977) is the open use of an educational programme throughout an entire school system. This requires full use of the planned programme by all key stakeholders concerned and this may take time, as systems respond gradually to the proposed changes. Thus as explained by Lewy (1991), implementation as a whole is a process over time by which people, events, and resources determine whether or not practice is altered when something new is attempted. In simple terms, curriculum implementation may be explained as the process of putting to work the curriculum, as planned by developers, to achieve educational objectives.

Role of Implementation in the Curriculum Change Process

Curriculum development is not static, but a continuous process with implementation stuck somewhere along a continuum between the planned curriculum and final observed changes in educational practice. Implementation can be considered as the bridge between the desired changes intended by curriculum planners and the actual changes that occur in practice. Implementation makes it possible for the needed personal interaction among implementers, and between implementers and curriculum developers. Without such interactions, curriculum change would never be possible.

Implementation helps to reduce the difference between existing practices and the practices suggested by innovators or change agents. The process of reducing these differences occurs in stages and takes time to achieve because it requires a lot of patience to win people over to a change in an educational programme.

It is very clear from the foregoing discussion that as an essential part of curriculum development process, implementation brings into existence the anticipated changes. Without implementation, curriculum change will never be possible and the planned curriculum would at best remain a white elephant on the shelves of curriculum developers or change initiators. Thus in a nutshell, we can confidently say that curriculum implementation is a key part of the curriculum development process and not an end in itself.

Factors that Affect Curriculum Implementation

There are a myriad of factors that have been identified in curriculum literature as determinants

of implementation. Fullan (1982) for instance identified characteristics of the change, local conditions, local strategies, external factors and measurement and evaluation. Some of these factors facilitate successful implementation, whereas others militate against successful implementation. The specific factors to be considered in our discussion include: the characteristics of the change, local conditions and external factors.

1. **Characteristics of the change**

   According to Fullan (1982), intensive research on the relationship between attributes of curriculum changes and subsequent implementation has led to the identification of four main characteristics of a change that are likely to foster successful implementation. These characteristics are need and compatibility, clarity, complexity, quality and practicability of change.

   a. **Needs:** The curriculum, as pointed out by Bishop (1985) "does not develop in a vacuum; one must consider the values, the traditions, the beliefs, the whole culture, or way of life, of the society" (p. 2). This presupposes that for any curriculum change to be successful there is the need to conduct a thorough needs assessment to ensure that the subsequent modifications made to the curriculum are compatible with the needs of learners, teachers and society as a whole.
   b. **Clarity:** This is an important attribute of a curriculum innovation that affects its implementation. Clarity has to do with how easily understandable the goals and means of implementing the curriculum are to curriculum implementers. Change will be resisted to the degree that the target have little information or knowledge of the change. This implies that for the change to be successful there should be clear description of roles and expectations in language curriculum implementers can understand. The goals of the change as well as means for carrying out the programme must be clearly spelt out to the user as well as the general public at large. How do you think this can be done? Usually, an effective way of ensuring clarity is through effective communication, which is a key implementation strategy in ensuring the success of the change.
   c. **Complexity:** This refers to the difficulty and extent of change required of the individual involved in implementation. Changes may create implementation problems but could as well result in more significant changes because more is being attempted. It is important to note too that the more simple the changes, the easier they are to be implemented by teachers. However, too simple a change in the curriculum may not

have the desired impact expected by major stakeholders of education.

d. **Quality and practicality of change:** This is the extent to which the innovation introduced actually brings about the desired changes intended by curriculum developers. For instance, if curriculum developers expect that students will be able to use Microsoft word after learning ICT at the senior high school level, then students must be able to do what is intended at the end of the day. However, if developers did not take cognizance of the fact that most schools do not have computers for practical work and make provision for them, then it would be impractical to implement the change.

2. Local Conditions

Local conditions refer to the roles of the school district, the community and school board, the school principal (head) and the teachers. At this stage, we may even include the role of the learners as well, since they are the direct consumers of the curriculum and therefore play a key role in the implementation of the curriculum. Without learners, there would be no need to have developed the curriculum in the first place.

a. **The school district:** The district within which the school is located plays a key role in ensuring the curriculum is implemented the way it was intended by developers. In Ghana, the district education office has oversight responsibility for what goes on in the schools within its catchment area. Among their key functions are to ensure deployment of personnel (teachers), organization of workshops and in-service training programmes for heads and teachers to ensure teachers are abreast with the new changes in the curriculum. The district education office also supervises curriculum implementation by deploying circuit supervisors to ensure fidelity of implementation and also to identify implementation challenges for the necessary action to be taken. Some districts even go to the extent of organizing district mock examinations to prepare students for the final examinations. How well the district education office plays its role in curriculum implementation affects the success of the curriculum. What challenges you face in implementing the curriculum in your district?

b. **The local community and school board:** The local community within which the school is located can affect the success of curriculum programmes. The local community is made up of parents, opinion leaders, and other key stakeholders such as business owners, who could support curriculum implementation with human, material

and financial resources. Curriculum implementation is likely to be more successful where members of the local community accept the curriculum change and provide support for it than a community where members regard the school and its activities with apathy. School boards also play a significant role in determining who and how the school is administered and can consequently influence the success of the curriculum. If the members of the board of governors of the school do not support a particular curriculum change, they may not provide the needed support to see to its successful implementation in their school.

c. **The school head:** School heads are the immediate supervisors of the school curriculum and their attitudes towards curriculum programmes as well as their leadership styles could have a great impact on whether the curriculum would be successfully implemented or not. Heads who show support for curriculum innovations would be actively involved in training workshops in order to be abreast with the changes so as to guide teachers to effectively implement the curriculum. Such heads would likely encourage and supervise teachers to apply the changes in the curriculum in their classrooms and also provide the necessary resources to support the work of teachers. Heads who do not have interest in certain curriculum innovations may treat those changes lightly and such attitude may not encourage teachers to take such curriculum innovations seriously.

d. **The teacher:** Teachers play a very important role in curriculum implementation. Without teachers, the planned curriculum may as well gather dust on the shelves of curriculum planners. After planning the school curriculum, it is the teacher who translates it into a form that can easily be assimilated by the learner. This connotes that the teacher's competence and understanding of the curriculum, as well as willingness to implement the curriculum innovation would have an effect on the success of the curriculum. At the end of the day, it is teachers who decide and select what to teach from the prescribed syllabus. If they choose to ignore the prescribed curriculum, then it would never be implemented. What this means is that teachers must be actively involved in the curriculum development process so as to whip up their interest in implementing the proposed curriculum. Don't you think so? More often than not, curriculum innovations suffer from proper implementation because either teachers do not appreciate the new changes or they think something else should be done in the classroom instead

e. **Learners:** Learners are also are also important stakeholders in curriculum

implementation. While teachers have the responsibility of breaking down the curriculum into a form which can easily be assimilated by learners, it is learners who determine how much of the planned curriculum is transmitted and adopted in the classroom. Key learner characteristics such as attitude, aptitude, interests, previous learning experiences, home background, etc. determine the extent to which the curriculum will be implemented as intended

3. External factors

External factors that affect the implementation of the curriculum refer to factors that are outside of the immediate school district and actors who are directly involved in the implementation of the curriculum. What factors outside of the immediate school environment do you think can affect the implementation of the school curriculum? In fact, there are many external factors that pose as either opportunities or constraints in the implementation of the school curriculum. Key among such factors may include: government in power, political forces, non – governmental organizations (NGOs) and external examination bodies.

a. **Government in power:** Here government plays a key role in form of provision of the requisite financial support for the implementation of the curriculum. The more government budgetary allocation to support new education programmes and innovations, the more likely that the needed resources can be provided to ensure successful implementation. Government can also pass legislation to enforce the implementation of curriculum programmes.
b. **Political forces:** Political leanings and ideology plays a key role in the implementation of curriculum innovations. Political forces such as the opposition and interest groups like teacher associations, religious bodies, etc. could engage in either constructive or destructive criticism which may in the long run affect the implementation of the curriculum. A classic case is the differences in the views of the major political parties in Ghana on the duration of senior high school education. The New Patriotic Party (NPP) government pushed for a four- year SHS programme, but the National Democratic Congress (NDC) reverted to a three-year SHS programme the moment they took over government from the NPP. Another example is the push by religious bodies in the country for Religious and Moral Education to be included as a core subject in the curriculum during the 2007 education reform.
c. **Non – governmental organisations (NGOs):** These are mostly not-for-profit

organisations that provide support to ensure the successful implementation of educational programmes. Examples of such organisations include the UNDP, the UNESCO, Compassion International, etc. These NGOs support educational programmes with both material and human resources to facilitate implementation.

d. **External examination bodies:** Examination bodies such as the West African Examinations Council (WAEC) play an advisory role through systematic appraisal of the learning process through implementation of appropriate measurement tools. They also strengthen curriculum implementation process by generating data on student performance, which is readily utilized by the curriculum planners during school curriculum appraisal. However, examination bodies also have the tendency of negatively affecting curriculum implementation by focusing the process of implementation to passing of exams. Teachers may consequently teach according to the pattern of examination questions and not what has been stipulated in the syllabus. What other external factors can you think of? Bring them up for discussion

Stages of Curriculum Implementation

Designing quality educational programmes is important, but carefully putting in place measures to ensure successful implementation of the programme is equally important. The curriculum development process is made up of a series of constant piloting aimed at fine - tuning the programme for final large scale implementation. This implies that implementation itself is actually part of the curriculum development process. A careful look at curriculum literature and curriculum practice provides certain steps, which can be considered as important stages in the curriculum implementation process. For the purpose of our discussion, we are going to consider the following stages: planning the implementation; piloting the curriculum innovation; disseminating the curriculum innovation; redesigning the examination; and putting in place quality control mechanisms.

Planning the implementation

At the implementation planning stage, key decisions are made about the feasibility of implementing the curriculum. Available human resources, support materials, environments, methods, existing infrastructure, etc., as well as all opportunities and constraints are well assessed to consider their suitability to support the implementation of the curriculum innovation. Careful plans are then put in place in terms of resource allocation and timelines for taking certain key decisions in the implementation process. Three key factors that influence

implementation planning decisions are:

- people (learners, teachers, school heads, policy makers, etc.)
- programmes, and
- processes

The questions to ask in regard to the above key factors are:

- which people are going to be part of curriculum implementation?
- what programmes would be suitable for implementing the curriculum?
- what processes must implementers go through to ensure successful implementation?

Answers to these questions provide a good basis for implementation planners to take useful decisions that would facilitate successful implementation of the school curriculum

Piloting the new Curriculum Programme

Piloting is a fine-tuning strategy used to improve the curriculum innovation and also to enhance its chances of successful implementation. Before scarce resources are committed to an educational programme, every effort must be made by developers to ensure that the programme will work as intended in order to control the wastage of resources. Piloting serves as a form of pre-implementation evaluation strategy to collect empirical data to justify the new curriculum; identify weaknesses for correction and also help take key decisions about the impending programme to facilitate effective implementation.

Piloting is done in phases, in a series of tryout activities. According to Lewy (1990), there are three phases of curriculum "tryout", which have been explained as follows:

1. **Laboratory tryout**: This first phase may begin as formative evaluation very early in the curriculum development process. Here elements of the curriculum, such as content, materials and methods may be tested with individuals or small groups in a contrived classroom situation. Facilitation may be done by curriculum developers and responses of learners observed for suggested modifications before trying out the innovation among a larger sample of schools.
2. **Pilot tryout**: A "pilot tryout" may begin in a school setting as soon as a complete, even though, a preliminary version of a course is available. Curriculum development team members may take the role of the teacher. The purpose of this phase is to identify if it is possible to implement the curriculum in a real classroom environment, and also to assess if changes are needed, as well as what conditions are required to ensure success.

3. **Field tryout**: When a revised version is completed based on the findings of the pilot tryout, "field tryouts" may be conducted where implementation is done by teachers in their classrooms without the direct involvement of the development team. This exercise attempts to establish whether the programme may be used without the ongoing support of the team and to demonstrate the merits of the programme to potential users. It is also done to ensure that the programme will be successful in all the different contexts in which the programme will be implemented. A field tryout involves a larger number of schools than a pilot tryout.

When the curriculum innovation is appropriately tried out with a cross section of key implementing agents, such as teachers, learners, and school heads; the chance of success of the programme is greatly enhanced.

Disseminating the Curriculum Innovation

What is the use of designing educational programmes if information about the programme would not get to the end users of the programme? No curriculum innovation can be effectively implemented unless there is proper dissemination. Dissemination is concerned with the spread of information about the new curriculum, including material and human resources and everything that has to do with the curriculum innovation. All stakeholders need to be appropriately sensitised about the programme before there can be wide scale use of the innovation in the entire school system. It involves planned activities intended to bring new information to people's attention for potential use. The key components in the dissemination process are: translocation, communication, animation and re-education.

- **Translocation:** This is the movement of personnel and requisite materials to the sites of curriculum implementation. It includes all the arrangements that are administratively made to ensure that those expected to implement the innovation are given everything they need in order to effectively do their job.
- **Communication:** This is the process of transferring information about the curriculum innovation to all concerned stakeholders with the view to enhance understanding, generate a positive attitude about the programme and also to clear all doubt and misconceptions about the programme. Approaches of communicating the innovation include press conferences, adverts in electronic and print media, mobile vans, official letters, and all other means of commutation.

- **Animation:** This involves the provision of a more exciting and enabling environment for smooth implementation of the curriculum innovation. It includes all measures put in place to keep implementers incentivized, motivated and committed to the implementation process.
- **Re-education:** This is concerned with ensuring that there is widespread understanding of the changes being produced and a more serious commitment on the part of all concerned with the implementation process for it to succeed. There is constant training and establishment of rapport between developers and implementers so that implementers do not lose touch with what was intended by the developers of the innovation.

Redesigning of Examination System

This is the stage of the implementation process where modifications are made in the existing system of evaluating the products of the curriculum to ensure that there is a match between what is intended by the curriculum and what learners are assessed for. The innovation may suffer a huge setback if there is a mismatch between the new requirements of the innovation and the requirements of the examination system. For instance, if students are taught how to use a computer and the examination questions require students to just label the parts of a computer, in no time, both teachers and learners may abandon the need to learn how to use a computer and learn the part of a computer by rote. This defeats the whole purpose of coming up with the curriculum innovation.

Quality Control

As curriculum users continue to use the curriculum innovation, there is always the tendency for some of them to fall into their old ways of doing things and this might cause the curriculum being implemented to vary markedly from the initially introduced innovation. There is therefore the need to put checks in place to ensure that the curriculum functions as intended. Such quality control measures ensure that obsolete aspects of the programme are replaced whenever the need arises. Quality control and follow-ups help keep curriculum users reminded of why the curriculum was changed in the first place.

UNIT 8: ANALYSIS OF THE SENIOR HIGH SCHOOL ECONOMICS SYLLABUS

Key areas to discuss:

- Rationale
- General Aims
- Profile Dimensions
- Guidelines for School-Based Assessment
- Unit Objectives as well as suggestions of teaching selected topics as stipulated in the syllabus