

CHAPTER VIII ORDERING AND PARTICULARIZING LEARNING CONTENT

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1. WHAT ARE LEARNING MATERIALS OR CONTENTS?

1.1 In the primary life situation, a child's **lifeworld** is a small, limited, uncomplicated, and simple world. And because a person is an "initiator of relationships", he/she is faced with the imperative to increasingly explore and act to acquire his/her own standpoint in the world. To later be able to live, play, and work in the world successfully also means he/she must acquire contents. It is expected that the contents will later become part of his/her frame of reference and that his/her initial open, spontaneous, and receptive relationship to the world and persons, by acquiring contents which later will become beacons or fixation points on his/her life horizon, gradually becomes a relationship of a more closed and qualified character.

We are all aware that the lifeworld, with its contents, is large and extensive, and if a child is merely delivered to it, it is also hazardous. Therefore, his/her parents and educators arrange it so that, in his/her first years of life, he/she is faced with the everyday, conspicuous forms of life, skills, and deeds of persons. However, his/her educators will not keep him/her in this simple, everyday sphere of contents and, therefore, they select contents which are **future-directed**, directly **confront** a child with them, and explicitly or implicitly indicate the multiple or complex lifestyle which later will be expected of him/her in the adult world.

However, the contents of the lifeworld are not disordered and kaleidoscopic but are **ordered** and **become ordered** into contents which must contribute to a child's being educated. This fact also puts a person in contact with the designated norms to be made available to a child in terms of which his/her activities then should be governed in the small community of his/her family and the immediate neighborhood, but later also in the complex relationships with persons, and the larger "environment". From this, a child can only establish a "personal world" if there are lasting and normative relationships with persons (Mitwelt) and objects (Umwelt).

1.2 The secondary situation

Since the lifeworld is an encyclopedia of knowledge, skills, and proficiencies which are too many and too extensive for a child to master, an adult chooses those aspects of the lifeworld contents which correspond to a child's stage of becoming and which will and should have meaning for him/her. In **school**, these activities are presented where curriculum compilers and teachers have chosen slices from **reality** which will be

unlocked (presented) as 'elementals' for the pupils, in systematic and ordered ways. The pupil is now under the imperative to open him/herself to reality and learn the contents so later they will function in his/her own frame of reference as 'fundamentals'. Through actualizing teaching and learning activities, categorical forming then ought to occur.

About this, Van der Stoep (1973, p 20) says the following: "The subject sciences we know today are nothing more than an accurate, radical, and systematic study of certain aspects of reality. To strengthen a person's grasp of them, for the sake of convenience, they are divided into subject areas with the aim of making them surveyable and coherent". This provides an opportunity to differentiate reality into the historical, geographical, physical, biological, religious, and more. Later we nuance (vary) these aspects into school subjects, such as history, biology, and general science.

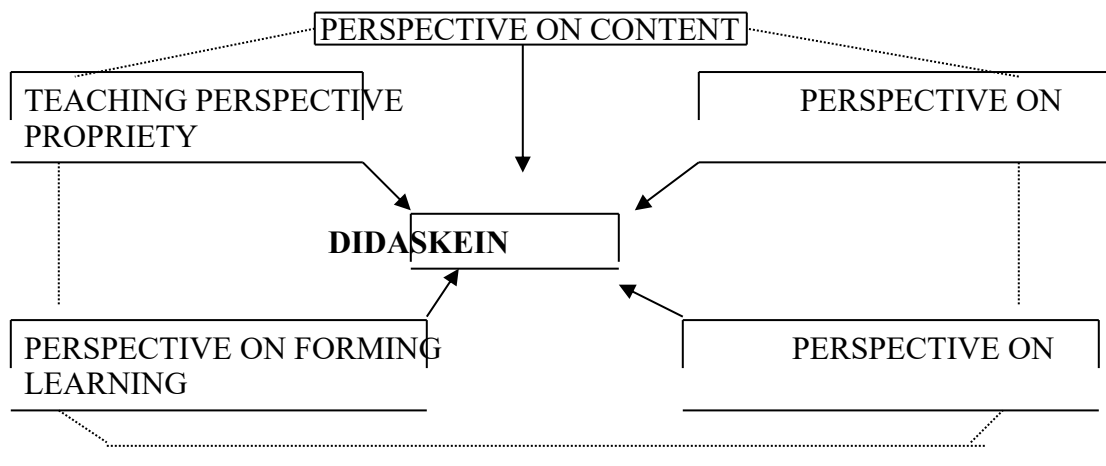
De Corte (1974, p 118) describes learning material (learning content) as follows: "By learning material one means that part of the present cultural goods, more particularly, the so-called systems of cultural forms [e.g., reading, writing--G.Y.], which are presented to the pupils with the aim of attaining the stated teaching aim". The contents of the school subjects, thus, represent the subject knowledge which humans have established for themselves. For this reason, we can understand that, as educating progresses, an increasing emphasis is placed on instructing. Consequently, Van der Stoep and Louw (1976, p 114) say: "Because the learning content selected and offered by the adults represents the whole of reality, this means that the teacher in his presentation (lesson design) re-presents an aspect of known reality which influences a child's forms of living and which, eventually make decisions possible regarding his lifestyle". Thus, each responsible teacher also will strive in his/her lessons to actualize in his/her teaching activities the educative ideal and change the pupil's situation of not being aware or knowing to one of being aware and of knowing. Therefore, the **aim** of the learning contents should never be thought of apart from a child's destiny [becoming an adult].

2. THE ROLE OF CONTENTS IN RELATIONSHIP TO THE OTHER PERSPECTIVES ON DIDASKEIN (TEACHING)

Didactic **categories** are used to describe the essentials of didaskein (teaching) and, if one of these categories is absent, what remains is no longer didaskein. S. J. Gous (1972, p 20) has ordered these categories into coherent groups. Such a group of categories acquires mutual coherence from the **perspective** which, together, they shape. However, this does not mean merely a sum of mutually independent categories and, therefore, there is a categorical structure (see Figure 1).

Figure 1

Schematic representation of the categorical structure of the didactic-pedagogic situation



As far as the perspective on content is concerned, it need only be mentioned that didaskein (teaching, instructing, learning) is unthinkable without learning content. A teacher and pupils encounter each other through the dynamic interactive event surrounding the learning content. And because didaskein begins in a child's experiential world, a pupil must be encountered in the situation where he/she is (beginning situation), and not where he/she is presumed to be, hoped to be, or ought to be. Thus, his/her world of meaning must be understood by a teacher. These learning contents are also selected so that they contribute to his/her entering the lifeworld of adults with and among whom he/she must live. A cognitive mastery of the world, however, also transforms it into a verbalized and conceptualized world and, therefore, the naive lifeworld becomes objectified, formalized, and reduced. As indicated above, school subjects arise from the ordinary lifeworld. Lastly*, Gous (1972, p 47) indicates that each person also cannot avoid **asking** about the ultimate aim (the last aim of all of us), and about eschatology (final and deepest foundation of reality). The answer [for a Christian believer] to the ultimate question of meaning is sought and answered in the Transcendent and Absolute reality. The answer includes faith and a view of life which is compelling and has ultimate validity for the educator and which, therefore, also figures prominently in the learning content (see Maree and De Lange, 1976, p 27).

3. THE PLACE OF CONTENTS IN CURRICULUM DEVELOPMENT

Also, in designing and planning curricula, i.e., on a **macro** as well as **micro** field of tasks, selecting and ordering contents play essential roles because the acquisition of these contents provides a strong guarantee for future adulthood and occupational independence.

* What follows is a reflection of the educational context in South Africa with a commitment to Christian Nationalism. Consequently, these ideas have to do with philosophy of life content and may not be relevant to an American audience. (G.Y.)

The importance of learning content, as a component of the curriculum, along with other components such as aims, learning experiences, learning opportunities, and evaluation should not be undervalued. Indeed, all curriculum compilers must pay strict attention to and consider the criteria used to select the learning contents, to create learning experiences and opportunities, as well as to integrate these aspects with the content. Wheeler (1967, p 39) agrees with this when he says: "When subject matter is the focus of attention, it is inevitable that subject matter will provide the criteria for the selection process necessary in developing a curriculum. Content is important only in so far as it helps to bring about intended outcomes". Others run the risk of falling into the same stereotypic activity about which De Corte (1974, p 120) says: "Committee work that traditionally consists of deleting some learning material to include others as a consequence of an evolution within a particular area of knowledge will be based on other criteria than the 'content' of the area of knowledge itself".

Van der Stoep and Louw (1975, p 115) say: "As far as learning content is concerned, the core of the didactic-pedagogic task is in selecting, ordering and presenting it so that it will unlock the child to authentically participate in what the teacher wants to offer".

4. ORDERING LEARNING CONTENT IN THE LESSON SITUATION

Also, on the level of the micro field of tasks (classes or groups of pupils he/she must deal with) a teacher must be accountable for the content component of his/her teaching. About this, De Graeve et al. (1973, p 66) says: "In aiming to transfer the learning material, one also aims for its **logical structure** being assimilated with the pupil's cognitive system. Two facets are distinguished:

- (a) the distinction between essential and detail;
- (b) the internal relationships of the components of the whole".

It is especially during the middle phase of the lesson, and more particularly during exposing content, that a teacher directs his/her pupils to those **essentials (the elementals) of the learning material** to which he/she arrived when reducing the **learning content**.

Van der Merwe (1977, p 93) draws attention to three aims a teacher must pay careful attention to:

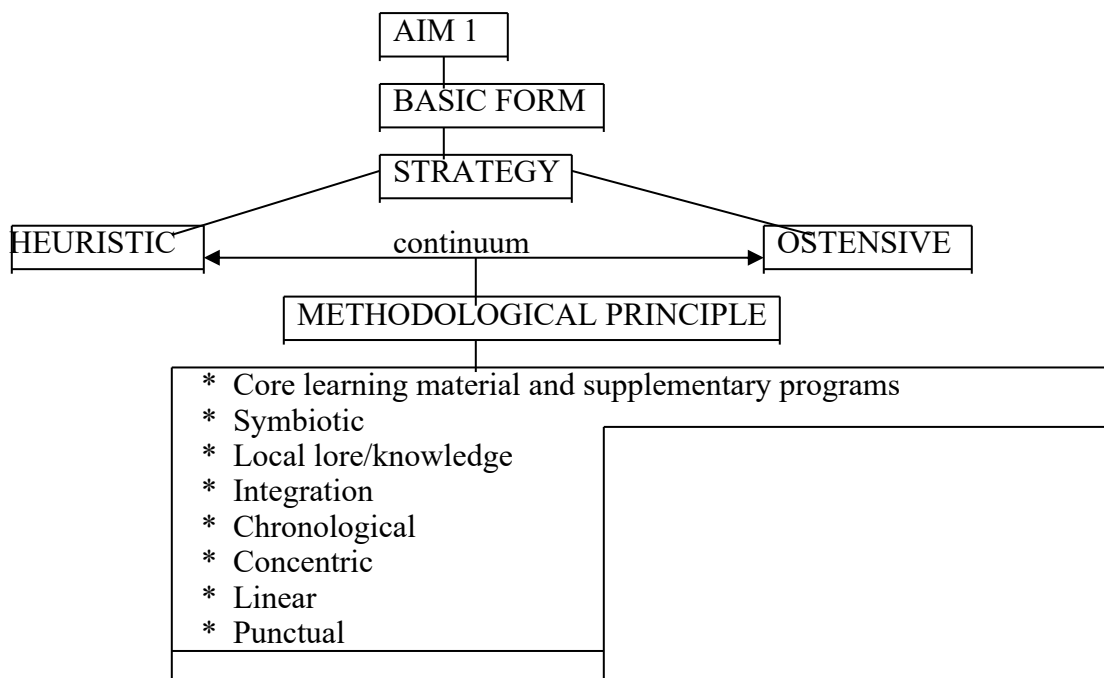
- (a) A subject-specific, or content aim;
- (b) a striving for a change in relationship and in personality; and
- (c) forming, which is actualized as an elevation in a child's level of involvement (ability, skills, proficiencies and techniques) with reality.

As far as the subject-specific or content aim is concerned, a teacher must try to unlock the essentials ('elementals') of the learning material for the pupils. For effective unlocking (presentation), he/she must make a choice of appropriate didactic ground forms (conversation, play, example, and assignment). In addition to this, he/she must choose a strategy or method which will co-define the teaching-learning event. The strategy

determines beforehand if a **heuristic** (e.g., discovery) or **ostensive** (e.g., demonstration) approach can be followed. Usually, any lesson takes its course between these two poles: sometimes the lesson is more heuristic and then preponderantly ostensive; one can represent the course of a lesson as a movement on a continuum between these two poles.

In addition, it also is important that a teacher order the learning contents he/she has selected according to certain principles. The nature of the learning content and the developmental level of the pupils will determine the principle of ordering used. When learning contents are ordered following these principles, the presentation (unlocking) takes a specific form. Basson (1973, pp 37 et seq.) distinguishes some of these principles for ordering learning material and, for the sake of context, we represent them schematically.

FIGURE 2



We now attend to each of these principles:

4.1 Core learning material and supplementary programs

Basson says that the fundamental insight of this principle is in the idea of core learning material as well as in the further orientation of the entire group of pupils, or only some, by bringing in supplementary programs. Besides the possibility of clarity and illustrative nature, the core learning material also must possess the quality of an example reflecting a general structure or presenting a concept. Roth (1959, p 276) indicates that, in this teaching core, points (core learning material) must be sought on which to concentrate. This means that the 'elementals' will be concentrated on and unimportant contents will be presented early and quickly. Situations also are planned where a child's astonishment and wonder can arise and individualization can be done justice.

4.2 The symbiotic principle

The concept symbiotic comes from the Greek **sum**, meaning "with", and **bios**, meaning "life". Thus, the literal translation is living-with. Consequently, symbiotic teaching means that, as far as is possible and desirable, a child is brought into touch with reality itself.

4.3 The principle of local lore/knowledge*

The word **home** is derived from the German **Heimat** (home, village, locale). By the concept **home**, Aarts (1963 p 197) means the material and spiritual environment within which one lives and to which one relates. For teaching, this means that a child's familiar and available experiential world is a teacher's point of departure. However, this ordering of content must correspond to a child's level of becoming and readiness to learn.

4.4 Principle of integration

This principle is directed at eliminating divisions among different fields of learning. Here the choice of themes and ways of ordering are focused on learning material which can be built up from a unit into a coherent whole. Then, the learning material shows a definite coherence stemming from a core problem. This coherence is what a child lived experiences in real life and, in this respect, it is related to the idea of symbiosis. A child must discover the coherence through learning activities.

4.5 The concentric principle

The fundamental idea underlying concentric ordering is that a certain subject or subjects are taught over a period of several years with the level of difficulty becoming progressively more difficult. According to this principle, the content itself does not acquire an excessive autonomy because a child's preparation for learning is primarily considered.

4.6 The linear principle

With this principle, there is an attempt to build up to the learning aim in a direct way, and it is assumed that the lesson theme can be dealt with at the same time. Now the reduction of the learning content is placed clearly in view. Here, a teacher must not only analyze the learning material but penetrate to the essentials or "elementals" of the matter. The linear principle of ordering generally appears in programmed instruction.

4.7 The punctual principle

* The meaningfulness of a reference to "home" (local lore/knowledge) is lost in the translation of this passage. At this point, the essence of this principle is captured for me in the last two sentences of this paragraph. (G.Y.)

This means that a teacher, in designing a lesson, tries to give a systematic explanation of the topic from a selected central point (position). From a complex theme, several part-structures are delimited, each of which is alternately dealt with and after which the main theme is returned to as point of departure.

4.8 The chronological principle

According to this principle, the learning content is exposed and dealt with successively in the same sequence it was discovered and described by scientists through the centuries. This principle can be fruitfully applied in the natural sciences, especially in helping pupils delimit the parts (part-perspectives) of a theory in the course of its history. By implementing this principle, the pupils can acquire insights into the sense and meaning of a theory from the past. After this, the course of development can be brought in, if the purpose is to give the pupils a broader perspective on the subject.

4.9 Summary

Implementing principles of ordering in designing a lesson is not done in isolation. The principles must always be selected by considering the lesson and learning aims and they must be implemented in relation to the contents as well as the didactic ground forms of the teaching strategies and other didactic modalities. Naturally, some principles lend themselves more than others to bringing about the reciprocity or interaction between form and content (Calitz, 1977 p 20).

5. PARTICULARIZING AND SUBJECT-DIDACTICS

Whoever is familiar with didactic theory knows that designing a lesson must proceed from an already introduced or proposed lesson structure. The lesson structure makes the mutual relationships among groups of functions easily surveyable. This surveyable, general statement is known as a **macrostructure**. Although each lesson structure serves as the focal point of pedagogical theory, it is only the framework within which some **microstructures** must be worked out for the school subject and for the individual group of pupils. Above all else, this **microstructure** is a matter of **particularizing** to which **subject-didactics** can contribute.

Thus, this also means that subject-didactics must stay very close to school practice and apply its unique formulations and insights to it. The abstract and sometimes vague terms of general didactic theory must be superseded and particularized by subject-didactics. In this act of particularizing, subject-didactics offers an important contribution because it addresses the "can" of the practice more than didactic theory, which is nearer to the "knowing" side. This particularizing also is especially shaped by the aim which must be brought to life by nuancing it. By a meaningful integration of **pedagogical** and **school subject knowledge**, a teacher can penetrate to the essentials or **elementals** of the theme and determine the **entry level** which can be anticipated in a classroom of a group or of a few pupils.

In my opinion, the procedure by which a teacher particularizes is the following (See figure 3):

(1) In designing a lesson, he/she must be able to do a thorough **situation analysis** to determine what the beginning situation (level of becoming, foreknowledge, etc.) is of the pupils he/she is going to teach;

(2) Then, in terms of the teaching aim, he/she can formulate a lesson and learning aim which also can be operationalized;

(3) **Macro-analysis:** about this, Van der Merwe (1977, p 31) says: "Before unlocking new contents (concepts, relationships) the teacher must first orient himself to the purpose, role and meaning of a particular syllabus theme in relationship to allied themes and structures in the subject to have a clear lesson aim in view". During this activity, above all, he/she must think about a preliminary reduction of learning contents, ground forms, strategies, pupils' learning activities, as well as teaching and learning aids;

(4) He/she must have a thorough knowledge of the **macrostructure** within which he/she is going to perform his/her task, i.e., he/she must be thoroughly grounded in didactic-pedagogical theory so he/she can interpret subject-didactic proposals, generalizations and pronouncements. Therefore, he/she also must be an authority on the lesson structure and its components which, although generally valid for all subjects, must be interpreted for his/her own subject area. Rich and nuanced knowledge of subject contents must also be an important component of his/her frame of reference;

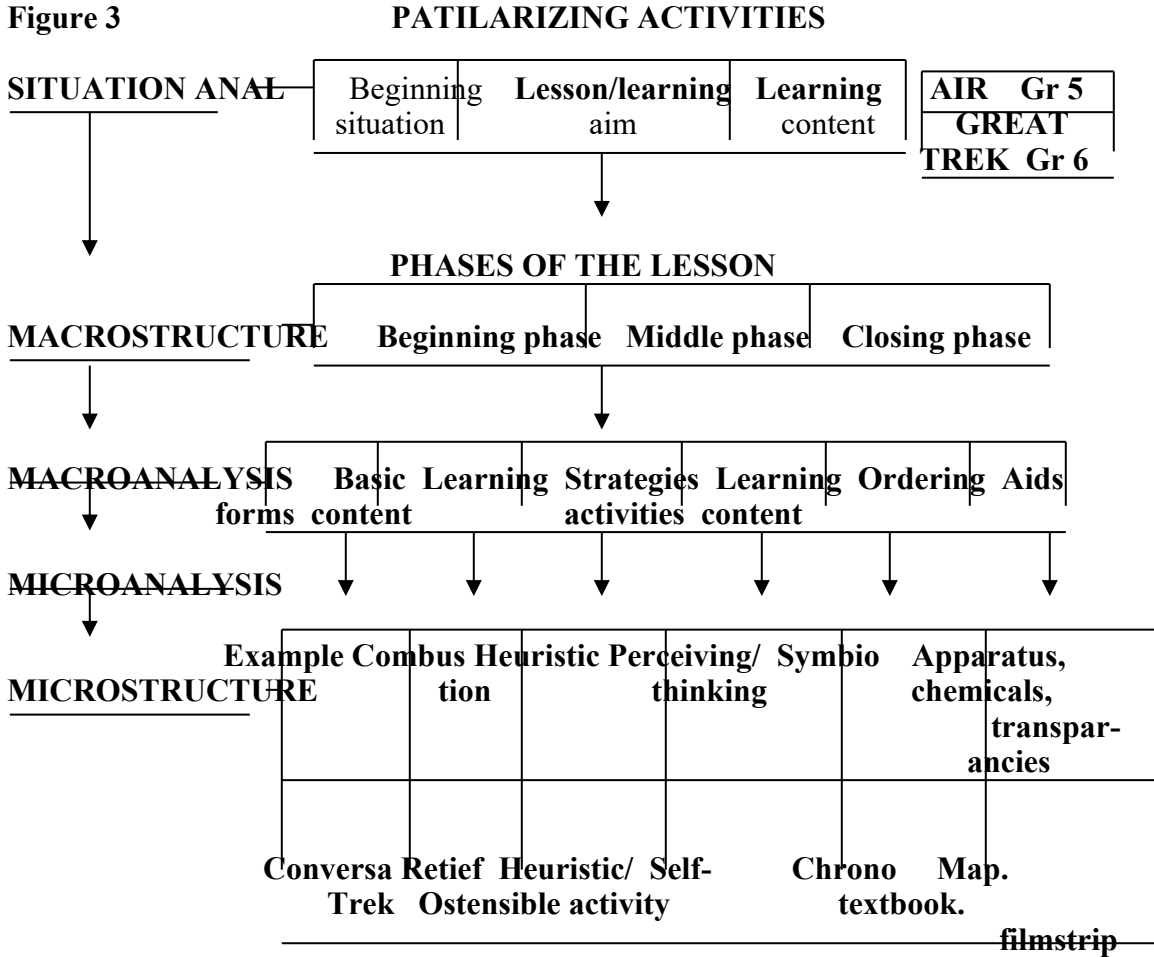
(5) After this analysis of his/her area, he/she must estimate the value of spontaneous and contemporary nuances to build up a unique **microstructure** for a school subject;

(6) From the **microstructure**, the subject-didactician (in compliance with the unique nature of the theme and his/her aims) can bring about multiple variations and combinations of components which will guarantee the required suppleness and mobility in implementing and managing them. Also, this ought to enable him/her to anticipate the potentialities of his/her class or group of pupils;

(7) What holds for the **form** of the lesson design also holds for the **learning contents**. The subject-didactician and teacher must be able to work broadly in terms of their subject knowledge and to distinguish and differentiate among material and meaning relationships, logical, visual, and causal relationships. This dealing with the content also particularly affects the nuances of the principles of ordering the learning material and the methods he/she selects to reach his/her aim. Consequently, here there also is a **microanalysis** of the lesson theme.

What has been said above to this point is schematically represented as follows:

Figure 3



6. CONCLUDING REMARKS

From what has been said, the lesson structure can be enlivened because subject-didactics takes up its components and implements their possibilities in terms of subject contents (Van Dyk, 1977 p 141). Each subject-didactician and teacher should be able to achieve the harmony which ought to exist between form and content if he/she is able to meaningfully integrate his/her lesson design and its presentation with didactic theory, knowledge of the subject matter, and subject-didactic particularizations.

As Van der Merwe (1977 p 2) rightly says, in planning a lesson, the task of subject-didactics is to search for ways and means of making the particulars meaningful and causal connections (subject specific learning aims) into life content for a child. The developing practice, thus, only acquires a true gestalt when its content and form are harmonized with each other in a lesson model.

Each teacher preparation program must take note of the significance and place of **contents** in the teaching-learning event and must purposefully and systematically create learning opportunities where student teachers could plan and design lessons. In addition, numerous teaching and learning experiences must contribute to the student teacher being

able to think about, analyze, and synthesize the learning contents within the framework of a macrostructure. This can occur by means of micro-lessons, demonstration lessons, and example teaching. In my opinion, a student must also receive explicit preparation in **particularizing**, where he/she is given the opportunity to arrive at a microstructure of his/her school subject through macro- and micro-analyses so he/she can achieve a suppleness in setting aims, selecting and implementing ground forms, strategies, methodological principles, principles of ordering the learning material, learning activities of the pupils, and teaching and learning aids (i.e., by designing a lesson in accordance with the didactic-pedagogic structure of a lesson).

It is important for each teacher to continually keep his/her pedagogical-theoretical and subject knowledge current. Only when he/she can furnish the macro-structure with an effective microstructure can his/her teaching and learning situation come to the optimal attainment of what is planned (learning results based on an authentic learning aim as an aim of the content).

7. REFERENCES

Basson, N. J. S. (1973). **Leerstofordening in die lessituasie**. Johannesburg: McGraw-Hill. **English translation:** georgeyonge.net

Calitz, L. P. and D. A. Gresse (1977). **Die strukturele komponente van 'n les**. Supplementary study material. Johannesburg: Rand Afrikaans University.

De Corte, E. (Ed.) (1974). **Beknopte didaxologie**. Groningen: Tjeenk Willink.

De Graeve, Maria (1973). **Lesvoorbereiding en evaluatie op basis van didactische analyse**. Amsterdam: Standaard Wetenschappelijke Uitgeverij.

Gous, S. J. (1972). **Verantwoording van die didakties-pedagogiese**. Johannesburg: Preskor.

Kokemoer, D. J. P. (1978). **Die lesstruktuur en sy komponente**. Johannesburg: Study Committee, Gold City Teachers College.

Maree, P. J. and J. P. De Lange (1976). **Opvoedkunde IIA**. Study Guide. Johannesburg: Rand Afrikaans University.

Smit, R. J. and C. J. G. Killian (1973). **Onderwysende opvoeding**. Pretoria: N. G. Boekhandel. **English translation:** georgeyonge.net

Van Dyk, C. J. and F. Van der Stoep (1977). **Inleiding tot die vakdidaktieke**. Johannesburg: Preskor.

Van Gelder, L. et. al. (1972). **Didactische analyse**. Reader 1. Groningen: Wolters-Noordhoff.

Van der Stoep, F. and W. J. Louw (1976). **Inleiding tot die didaktiese pedagogiek.** Pretoria: Academica. **English translation:** georgeyonge.net

Van der Stoep, F. et al. (1973). **Die lesstruktuur.** Johannesburg: McGraw-Hill. **English trnslation:** georgeyonge.net

Wheeler, D. K. (1976). **Curriculum process.** London: Hodder and Stoughton.